## COLLEGE OF ARTS AND SCIENCES

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## PROGRAM OF STUDY

## Introduction

The College of Arts and Sciences is a community of about 4,300 undergraduates and 525 faculty members. It is also a graduate school and research center. Altogether it attracts faculty members whose research and scholarly and creative work require first-rate academic facilities and who bring to all their students the profound questioning and exciting ideas of current scholarship. Finally, the college exists within a university of other colleges at Cornell-about 19,500 undergraduate and graduate students and 1,594 faculty members. This wider community provides depth and diversity of applied and professional studies beyond what a college of the liberal arts and sciences alone can offer.
Students studying the liberal arts and sciences may draw upon the knowledge and facilities of the other colleges at Cornell to complement their studies. Abundant variety and outstanding quality in many fields, including interdisciplinary fields, and emphasis on individual academic freedom and responsibility give the college and the university their distinctive character.
The richness of the college's undergraduate curriculum is extraordinary; there is no course that all students must take, and there are nearly 2,000 from which they may choose. By choosing courses each semester, students design their own education. They develop known interests and explore new subjects. An education in the liberal arts and sciences means honing one's critical and imaginative capacities, learning about oneself in nature and culture, and gaining experience with views of the world radically unlike one's own. All this is highly individual, and the college relies on each student and faculty advisor to design a sensible, challenging, and appropriate course of study.
Yet the college faculty believes that each student's education should have certain common qualities. These include familiarity with several different ways of knowing that
are reflected in the various disciplines and fields of study. In addition to these general areas of knowledge, students acquire effective writing and quantitative skills, study foreign languages, achieve cultural breadth, and concentrate on one particular field through which they deepen their imaginative and critical thinking as fully as possible. To accomplish these objectives, the college has certain requirements for graduation.

## The College of Arts and Sciences awards one undergraduate degree, the Bachelor of Arts degree.

## Summary of Requirements

1. First-year writing seminars: two courses. (See "John S. Knight Institute for Writing in the Disciplines," p. 581.)
2. Foreign language: completion of one course at the nonintroductory level or above (Option 1) or at least 11 credits in one language (Option 2).
3. Distribution: nine courses (may overlap with courses counting toward a major).
4. Breadth: two courses (may overlap with courses for distribution, major, or electives).
5. Major (see individual department listings for major requirements).
6. Electives: four or five courses (at least 15 credits) not used to fulfill other requirements (other than the breadth requirements) and not in the major field.
7. Residence: eight full-time semesters, unless a student can successfully complete all other requirements in fewer than eight semesters and meet the additional criteria to accelerate graduation. (See "Acceleration" below.)
8. 34 courses: a 3 - or 4 -credit course counts as one course. A 2 -credit course counts as half a course; a 1 -credit course does not normally count toward the requirement; a 6 -credit language course counts as one and one-half courses. (See "Courses and Credits" for some 1-credit courses in music, dance, and theatre performance that can be cumulated to count as one-half course.)
9. Credits: a total of 120 academic credits, of which 100 must be taken in the College of Arts and Sciences at Cornell. (See "Noncredit Courses" below for courses that do not count as academic credits or courses.)
10. Physical education: completion of the university requirement (passing a swim test and two 1 -credit nonacademic courses). Note: Physical education credit does not count toward graduation or toward the 12 -credit minimum required for good academic standing each semester.
11. Application to graduate. (See "Graduation.")

## Explanation of Requirements

## Foreign Language Requirement

The faculty considers competence in a foreign language essential for an educated person. Studying a language other than one's own helps students understand the dynamics of language, our fundamental intellectual tool, and enables students to understand another culture. The sooner a student acquires competence, the sooner it will be useful. Hence, work toward the foreign language requirement should be undertaken in the first two years. Courses in foreign languages and/or literature are taught in the College of Arts and Sciences by the following departments: Africana Studies and Research Center, Asian Studies, Classics, German Studies, Linguistics, Near Eastern Studies, Romance Studies, and Russian.
The language requirement may be satisfied in one of the following ways:
Option 1: Passing (a) a nonintroductory foreign language course of 3 or more credits at Cornell at the 200 level or above or (b) any other nonintroductory course conducted in a foreign language at Cornell. OR
Option 2: Passing at least 11 credits of study in a single foreign language (taken in the appropriate sequence) at Cornell.
Any exceptions to these rules will be noted elsewhere in individual department descriptions.
Students whose speaking, reading, and writing competence in a language other than English is at the same level we would expect our entering freshmen to have in English (as shown by completing high school in that language or by special examination during their first year here at Cornell) are exempt from the college's language requirement.

## Placement

Entering students who have had two or more years of high school study in a language, who have been awarded credit for language work at another college or university, or who are native speakers, bilingual, or have spoken the language at home, may enroll in a course in the same language only after being placed by examination. The placement exam may have been taken in high school (SAT II, taken after the last course, or AP, if the score was 4 or 5) or at Cornell (LP test). Students may, but need not, retake a language test if a year or more has passed since last taking it. Being placed by examination into the first course at a nonintroductory level does not earn credit toward the degree. Degree credit is earned only for demonstrated mastery of work equivalent to the first course at an intermediate level at Cornell and placement into the second intermediate course. Students should seek to satisfy the language requirement in their first years at Cornell. Those with test scores one or more years old may be required to take a Cornell placement test if the instructor deems the student is not adequately prepared for the level in which he or she has enrolled.


## Placement Tests and Advanced Placement <br> Credit

1. The following language placement and advanced standing tests are scheduled at the beginning of each semester:

- Chinese (Cantonese and Mandarin), Hindi, Japanese, and Korean (schedule available from Department of Asian Studies, 350 Rockefeller Hall);
- German (schedule available from Department of German Studies, 183 Goldwin Smith Hall);
- French, Italian, and Spanish (schedule available from Department of Romance Studies, 303 Morrill Hall);
- Russian (schedule available from Department of Russian, 226 Morrill Hall).
The advanced standing examination in French, German, Italian, Russian, and Spanish, is called the CASE (Cornell Advanced Standing Examination). Eligibility for the CASE may be determined from the placement tables. In Russian only, all students seeking placement take the CASE.
Native speakers of Spanish who have completed their secondary education in a Spanish-speaking country do not take the CASE. For these students, the Spanish program offers a walk-in service, the Native Language Accreditation for Spanish, in the third week of September and the first week of February. Students interested in this service should contact Brisa Teutli in 414 Morrill Hall, bt54@ cornell.edu. Speakers of Spanish who completed their secondary education in a non-Spanish-speaking country are required to present either SAT II or AP or LPS scores for placement, or for eligibility to take the CASE exam.

2. Arabic: departmental examination, Department of Near Eastern Studies, 409 White Hall.
3. Greek, ancient: departmental examination, Department of Classics, 120 Goldwin Smith Hall.
4. Hebrew: departmental examination, Department of Near Eastern Studies, 409 White Hall.
5. Latin: departmental examination, Department of Classics, 120 Goldwin Smith Hall.
6. Persian: departmental examination, Department of Near Eastern Studies, 409 White Hall.
7. Turkish: departmental examination, Department of Near Eastern Studies, 409 White Hall.

Substitutions to the Language Requirement Outright waivers of the requirement are never granted. However, rarely and as appropriate, alternatives to language acquisition are approved. Legitimate requests for substitutions require strong, convincing evidence of inability to learn foreign languages in a classroom setting. A poor grade in a Cornell introductory language course or taking the LP
exam repeatedly and unsuccessfully is not adequate evidence of disability.
Students who wish to request a substitution for this requirement should contact the Office of Undergraduate Admissions and Advising, 172 Goldwin Smith Hall. If the college determines that the request has merit, the student meets with the Language Substitution Review Committee. This committee makes the final decision for or against a substitution. If a substitution is allowed, the committee works with the student to select appropriate substitute courses.

## Distribution Requirements

In satisfying the distribution requirements, students become acquainted with a broad range of subject matter and points of view among disciplines in the college and explore areas that may be entirely new to them. Or, to look at it the other way, as first-year students explore subjects that interest them, they begin to satisfy distribution requirements. Consequently, first-year students should take courses to prepare for possible majors and to explore subjects new to them and take no course only in order to satisfy a distribution requirement. Although students may complete distribution requirements over eight semesters, they can take advanced courses in subjects they (perhaps unexpectedly) find intriguing only if they have completed the introductory prerequisites. Consequently, students should not postpone satisfying distribution requirements until the last semesters. Once sure of a major, students should consider which distribution requirements are yet unfulfilled and how to fulfill them with courses that complement their overall program. Courses in the major may be applied to the distribution requirements (unless prohibited by one of the restrictions noted under restrictions on applying AP credit, transfer credit, and Cornell courses to distribution requirements).

Students must complete four courses in science and quantitative reasoning, identified below under the categories Physical and Biological Sciences (PBS) and Mathematics and Quantitative Reasoning (MQR). In addition, they must complete five courses of 3 or more credits each from five categories of courses in the humanities and social sciences; they must include at least one course from four different categories and no more than three in the same department. The five categories of courses fulfilling the distribution requirements in humanities and social sciences are: Cultural Analysis (CA-AS), Historical Analysis (HA-AS), Knowledge Cognition and Moral Reasoning (KCM-AS), Literature and the Arts (LA-AS), and Social and Behavioral Analysis (SBA-AS). How an individual course is categorized is indicated with the appropriate abbreviation in its description under its department.
It is important to recognize that only courses with the proper designation in the Arts and Sciences section of the catalog can be used toward fulfilling the distribution requirements in Arts and Sciences.

- Cultural Analysis (CA-AS)

Courses in this area study human life in particular cultural contexts through interpretive analysis of individual behavior, discourse, and social practice. Topics include belief systems (science, medicine, religion), expressive arts and symbolic behavior (visual arts, performance, poetry, myth, narrative, ritual), identity (nationality, race, ethnicity, gender, sexuality), social groups and institutions (family, market, community), power and politics (states, colonialism, inequality).

- Historical Analysis (HA-AS)

Courses in this group interpret continuities and changes-political, social, economic, diplomatic, religious, intellectual, artistic, scientific--through time. The focus may be on groups of people, dominant or subordinate, a specific country or region, an event, a process, or a time period.

- Knowledge, Cognition, and Moral Reasoning (KCM-AS)
Offerings in this area investigate the bases of human knowledge in its broadest sense, ranging from cognitive faculties shared by humans and animals such as perception, to abstract reasoning, to the ability to form and justify moral judgments. Courses investigating the sources, structure, and limits of cognition may use the methodologies of science, cognitive psychology, linguistics, or philosophy. Courses focusing on moral reasoning explore ways of reflecting on ethical questions that concern the nature of justice, the good life, or human values in general.
- Literature and the Arts (LA-AS)

Offerings in this area explore literature and the arts in two different but related ways. Some courses focus on the critical study of artworks and on their history, aesthetics, and theory. These courses develop skills of reading, observing, and hearing and encourage reflection on such experiences; many investigate the interplay among individual achievement, artistic tradition, and historical context. Other courses are devoted to the production and performance of artworks (in creative writing, performing arts, and media such as film and video). These courses emphasize the interaction among technical mastery, cognitive knowledge, and creative imagination.

- Social and Behavioral Analysis (SBAAS)
Courses in this area examine human life in its social context through the use of social scientific methods, often including hypothesis testing, scientific sampling techniques, and statistical analysis. Topics studied range from the thoughts, feelings, beliefs, and attitudes of individuals to interpersonal relations between individuals (e.g., in friendship, love, conflict) to larger social organizations (e.g., the family, society, religious or educational or civic institutions, the economy, government) to the relationships and conflicts among groups or individuals (e.g., discrimination, inequality, prejudice, stigmas, conflict resolution).
- Physical and Biological Sciences (PBS)
In fulfilling the four courses in science and quantitative reasoning, students must take at least two science courses. At least one of these must be from the primary list of courses in science departments in the College of Arts and Sciences:


## Primary list:

(The courses listed individually are all crosslisted in an A\&S science department.)
Animal Science
427 Fundamentals of Endocrinology
Anthropology
208 Anthropology of Human Mating
371 Human Paleontology
474 Lab and Field Methods in Human Biology
Applied and Engineering Pbysics
217 Physics II: Electricity and Magnetism
330 Modern Experimental Optics
363 Electronic Circuits
450 Introduction to Solid-State Physics
470 Biophysical Methods
Astronomy: all 3- or 4-credit courses
Biological Sciences: all 3- or 4-credit courses (including any combination of two courses from BIO 101-104) except BIO G 209, 299, 498; BIOEE 362; BIOMI 172; BIOBM 321; BIONB 321, 420, 423, 442, and BIOSM 204. BIO G 200 and 499 require permission from the Office of Undergraduate Biology.
Biological and Environmental Engineering
456 Biomechanics of Plants
471 Introduction to Groundwater
Biology and Society
214 Biological Basis of Sex Differences

- 447 Seminar in the History of Biology

461 Environmental Policy
Biomedical Engineering
441 Computer in Neurobiology
Chemistry and Cbemical Biology
all 3- or 4 -credit courses
Cognitive Science
111 Brain, Mind, and Behavior
330 Introduction to Computational Neuroscience
Earth and Atmospheric Sciences
all 3- or 4 -credit courses except 150, 250, 435, 494

Engineering
122 Earthquake!
201 Introduction to the Physics and Chemistry of the Earth

## Entomology

325 Insect Behavior
400 Insect Development
440 Phylogenetic Systems
452 Herbivores and Plants
453 Historical Biogeography
455 Insect Ecology
456 Stream Ecology
Feminist, Gender, \& Sexuality Studies 214 Biological Basis of Sex Differences
Food
394 Applied and Food Microbiology
History
287 Evolution
415 Seminar in the History of Biology

## Horticulture

243 Taxonomy of Cultivated Plants

Music
204 Physics of Musical Sound
Natural Resources
303 Introduction to Biogeochemistry
(previously NTRES 321)
456 Stream Ecology

## Nutritional Sciences

475 Mammalian Developmental Defects

## Pbysics

all 3- or 4-credit courses except 209
Plant Pathology
409 Principles of Virology
Psychology
111 Brain, Mind, and Behavior
322 Hormones and Behavior
324 Biopsychology Laboratory
330 Introduction to Computational
Neuroscience
332 Biopsychology of Learning and Memory
396 Introduction to Sensory Systems
424 Neuroethology
429 Olfaction and Taste: Structure and Function
431 Effects of Aging on Sensory and
Perception Systems
460 Human Neuroanatomy
492 Sensory Function
Science and Technology Studies
287 Evolution
447 Seminar in the History of Biology
Students may select additional science courses from the following supplementary list:
Animal Science
100 Domestic Animal Biology I
150 Domestic Animal Biology II
212 Animal Nutrition

## Anthropology

101 Human Evolution: Genes, Behavior, and the Fossil Record
370 Environmental Archaeology
390 Primate Behavior and Ecology
463 Zooarchaeological Method
464 Zooarchaeological Interpretation
Applied and Engineering Pbysics
110 Lasers and Photonics

## Arcbaeology

370 Environmental Archaeology
463 Zooarchaeological Method
464 Zooarchaeological Interpretation

## Cognitive Studies

220 The Human Brain and Mind

## Dance

312 The Moving Body; Form and Function
Electrical Engineering
430 Lasers and Optical Electronics

## Engineering

110 Lasers and Photonics

## Entomology

201 Alien Empire: Bizarre Biology of Bugs ( 3 cr .)
210 Plagues and People ( 3 cr .)
212 Insect Biology
277 Natural Enemies: An Intro to Biological Control (3 cr.)
315 Spider Biology
Food
200 Introductory Food Science
Human Development
220 The Human Brain and Mind
Materials Science and Engineering 281 The Substance of Civilization

## Natural Resources

201 Environmental Conservation
210 Introductory Field Biology
420 Forest Ecology
Nutritional Sciences
115 Nutrition and Health
361 Biology of Normal and Abnormal Behavior
Psychology
223 Introduction to Biopsychology
326 Evolution of Human Behavior
361 Biology of Normal and Abnormal Behavior

- Mathematics and quantitative reasoning (MQR)
In completing four courses in science and quantitative reasoning, students must take at least one of the following courses (note that EDUC 115 Introductory College Mathematics counts neither toward the college degree nor toward distribution):
Applied Economics and Management 210 Introductory Statistics
Biochemistry, Molecular and Cell Biology 321 Numerical Methods in Computational Molecular Biology


## Biometry

301 Statistical Methods
City and Regional Planning
321 Introduction to Quantitative Methods
328 Quantitative Methods in Policy Planning

## Cognitive Science

172 Computation, Information, and Intelligence
424 Computational Linguistics
476 Decision Theory
Computer Science
100 Introduction to Computer Programming
172 Computation, Information, and Intelligence
211 Computers and Programming
280 Discrete Structures
312 Data Structures and Functiona! Programming
321 Numerical Methods in Computational Molecular Biology
324 Computational Linguistics
421 Numerical Analysis and Differential Equations
486 Applied Logic
Earth and Atmospheric Sciences
435 Statistical Methods in Meteorology and Climatology
Ecology and Evolutionary Biology
362 Dynamic Models in Biology

## Economics

319 Introduction to Statistics and Probability
320 Introduction to Econometrics
321 Applied Econometrics
325 Cross Section and Panel Econometrics
327 Time Series Econometrics
368 Game Theory
405 Auction Seminar
431 Monetary Economics
476/477 Decision Theory I and II

## Engineering

115 Engineering Applications of OR\&IE
172 Computation, Information, and Intelligence
211 Computers and Programming
321 Numerical Methods in Computational Molecular Biology

Industrial and Labor Relations
210 Introduction to Statistics
212 Statistical Reasoning

## Information Science

172 Computation, Information, and Intelligence

## Linguistics

424 Computational Linguistics
483 Intensional Logic
485 Topics in Computational Linguistics

## Mathematics

all 3- or 4-credit courses except 101 and 109

## Pbilosopby

231 Introduction to Deductive Logic
330 Foundations of Mathematics
331 Deductive Logic
431 Mathematical Logic
432 Topics in Logic
436 Intensional Logic

## Pbysics

209 Relativity and Chaos
Policy Analysis and Management
210 Introduction to Statistics

## Psychology

350 Statistics and Research Design

## Sociology

301 Evaluating Statistical Evidence

## Statistical Science

210 Introduction to Statistics
If students choose two courses from this list to satisfy part of the distribution requirement, those two courses may not have significant overlap. For example, students may not choose two beginning courses in statistics. Nor may they earn credit toward the degree for overlapping courses: AEM 210 Introductory Statistics, ILRST 210 Introduction to Statistics, ILRST 212 Statistical Reasoning, MATH 171 Statistical Theory and Application in the Real World, PAM 210 Introduction to Statistics, PSYCH 350 Statistics Research and Design, SOC 301 Evaluating Statistical Evidence, STSCI 210 Introduction to Statistics.

## Breadth Requirements

Students must include in their undergraduate program at least one Arts and Sciences course that focuses on an area or a people other than those of the United States, Canada, or Europe and one course that focuses on an historical period before the 20th century. Courses that satisfy the geographic breadth requirement are marked with an @ when described in this catalog. Courses that satisfy the historical breadth requirement are marked with a \#. Many courses satisfy both requirements, and students may in fact use the same course to satisfy both. Students may use courses satisfying distribution, major, or elective-but not writing-requirements in satisfaction of either of the breadth requirements. They may also apply Cornell courses (not credit from an examination) conferring proficiency in a nonWestern language toward the geographical breadth requirement.

## Restrictions on Applying AP Courses and Credit from Other Institutions to the Distribution Requirements

Students may not apply AP credit or transfer credit from another institution to the breadth requirements or to any distribution requirement.

Students who transfer to the college from another institution are under the above rules for advanced placement credit, but are eligible to have credit for post-high school course work taken during regular semesters (not summer school) at their previous institution count toward all distribution requirements. Transfer students receive a detailed credit evaluation when they are accepted for admission.

## Restrictions on Applying Cornell Courses to the Distribution and Breadth Requirements

1. First-year writing seminars may not count toward any other college requirement.
2. No single course may satisfy more than one distribution requirement.
3. Students may count courses in their major toward distribution and breadth.
4. Only courses with the proper designation in the Arts and Sciences section of the catalog can be used toward fulfilling the distribution requirements in Arts and Sciences.

## The Major

In their last two years, students devote roughly one-half of their time to acquiring depth and competence in a major subject. The major does not necessarily define a student's intellect or character or lead directly to a lifetime occupation, although it sometimes does some of each. Through the major, students focus and develop their imaginative and intellectual capacities through a subject they find especially interesting.
Most departments and programs specify certain prerequisites for admission to the major; they are found on the following pages in the descriptions of each department and program.
Students may apply for acceptance into the major as soon as they have completed the prerequisites and are confident of their choice. This may be as early as the second semester of freshman year, and must be no later than second semester of sophomore year. To apply, they take a copy of their official transcript to an appointment with the director of undergraduate studies in their prospective major. A department or program may refuse admission into the major if the applicant's performance does not meet established standards. A student without a major at the beginning of the junior year is not making satisfactory progress toward the degree. That student must meet with an advising dean or they may not be allowed to continue in the college.

## Available majors

Majors are offered by each of the departments. There are also majors in American Studies, Archaeology, Biology and Society, Information Science, Religious Studies, Science of Earth Systems, and Feminist, Gender, and Sexuality Studies.

Some students want to pursue a subject that cannot be met within an established major. They may plan, with the help of their faculty advisor, an independent major that includes courses from several departments and even colleges. See "Independent Major Program," under "Special Academic Options." Whatever the major-chemistry, math, philosophy, or
music-graduates from the College of Arts and Sciences earn the one degree the college awards, a Bachelor of Arts.

## Double majors

Only one major is required for graduation. Some students choose to complete two or even more majors. No special permission or procedure is required; students simply become accepted into multiple majors and find an advisor in each department. All completed majors are posted on the official transcript. However, even though courses in a second major count among the required 15 credits of electives (see immediately below), double majoring can constrict the variety of electives that might be valuable for an education in the liberal arts and sciences. Students should "double major" only if their intellects and deep interests direct them to do so.

## Electives

Of the 34 courses and 120 credits required for graduation, almost one-third are free electives. How students use these electives frequently makes the difference between an ordinary and a truly interesting course of study. Students must complete at least four courses and at least 15 credits offered outside the major field and not used to fill another requirement except breadth. AP credits not otherwise used may fulfill elective requirements. Students may group electives to complete one of the established interdisciplinary concentrations or may form their own unofficial concentration or "minor" separate from their major. Students may also group electives into a second major. Since only one major is required, students may count courses in a second major as electives. Some students choose to explore a variety of subjects; some develop a concentration in a department or subject outside Arts and Sciences to gain applied training or specialized knowledge.

## Residence

The College of Arts and Sciences is a residential community for students who devote their energy and spirit to full-time study. The faculty believes that integrated, fulltime study for a defined period best promotes intellectual and creative development and best prepares people for citizenship and careers.
Consequently, eight semesters of full-time study in the College of Arts and Sciences are integral to earning the B.A. degree. Even if the minimum requirements can be met in fewer semesters, the faculty of the college expects students to take advantage of the resources of the university for eight full semesters and obtain as rich and advanced an education in the liberal arts and sciences as possible. Students may complete their undergraduate degrees with credits earned at other institutions or as part-time or summer students at Cornell only if they have completed their eight full-time semesters of residence or satisfied the criteria listed below under "Parttime study in final semester."
For transfer students from other institutions, each full semester of study at their previous institution counts as one of the eight semesters of residence. However, even if transfer students have completed more than four full semesters at their previous institution, they must spend a minimum of four semesters on the Cornell campus in Ithaca enrolled in
the College of Arts and Sciences. Internal transfers from other colleges at Cornell must spend four semesters on campus in Ithaca as students in the Internal Transfer Division or in the college.
Approved study abroad, SEA Semester, Urban Semester, FALCON, and Cornell in Washington are considered semesters of residence but not semesters on the Cornell campus. Students may spend no more than two semesters on such programs and must be on campus during their last semester. Semesters of extramural study in Cornell's School of Continuing Education, semesters of study at other institutions while on leave from Cornell, and summer sessions anywhere do not count as semesters of residence

## Acceleration

Some students decide that they do not need eight semesters of residence to obtain a solid undergraduate education. These students must compress the first four semesters and spend four full semesters in the major. Benefitting from opportunities for advanced, seminar, and independent (sometimes honors) work is what best characterizes undergraduate education in the college. Students considering acceleration should discuss their plans with their major advisor.
Accelerants apply to graduate one semester before their intended new graduation date. They submit an online "Application to Graduate" for this purpose. Accelerants must complete:

1. All graduation requirements except for the residency requirement ( 120 total credits, 100 Arts and Sciences credits, 34 courses, all college requirements, and the university's physical education requirement).
2. Either condition $a$ or $b$ :
a. 60 credits before beginning their last four semesters in the college and the prerequisites for admission to the major in time to spend four semesters in the major.
b. 48 credits in College of Arts and Sciences courses numbered 300 and above and prerequisites for admission to the major in time to spend four semesters in the major. Upper-level courses taken in other colleges at Cornell University may count toward the 48 only if approved as part of the major.
3. 100 credits at Cornell at "C" (not C-) or above. Courses completed with a grade of "S" will count toward the 100 credits. Advanced placement and transfer credits do not count toward this requirement.
4. Students may not use credits earned while on leave of absence to reduce their terms of residence. In other words, they must be eligible to accelerate without applying any credit toward the degree that they earned while on leave.
5. Accelerants may not finish the degree with credits earned through part-time study (unless they meet the guidelines for part-time study), or at an off-campus program, including Cornell in Washington, SEA Semester, Urban Semester, or study abroad. That is, they may not exit through any program other than a regular, fulltime Cornell semester in Ithaca.

Students matriculating as freshmen may not compress their undergraduate education into fewer than six semesters of residence. Transfer students, both from other institutions and from other colleges at Cornell, must satisfy the eight-semester residence requirement and must spend at least four semesters in the college on campus in Ithaca.

## Ninth semester

Students who can graduate in eight semesters should do so. If a worthy academic plan for a full ninth or tenth semester is approved, the student enrolls in the college as a special student for the additional work. Such a status allows enrollment in a full schedule of courses and full access to campus resources for full tuition, but allows financial aid only from loans or outside agencies, not from Cornell funds. Students who need fewer than 12 credits in a ninth or tenth semester to graduate should complete the outstanding courses and pay prorated tuition. Students may spend a ninth semester with Cornell aid only with permission of the Committee on Academic Records. Such permission is normally granted only to:

1. Students who have been ill or experienced other untoward circumstances beyond their control.
2. Students who were academically underprepared for the curriculum at Cornell and needed to begin with a lighter schedule of courses than normal. (See Dean Turner, Office of Undergraduate Admissions and Advising, 55 Goldwin Smith Hall, about this option.)

## Part-time study

Students in good acackemic standing may take a personal leave of absence and enroll in the School of Continuing Education, but such semesters of extramural study do not count as terms of residence and credits from such semesters may not be used to reduce the terms of residence.

## Part-time study in special circumstances

The college and university support students (with financial aid and services) as best they can to make full-time study possible. Occasionally, however, extraordinary but nonfinancial personal, academic, or medical circumstances make studying part-time temporarily necessary and appropriate. Students in good academic standing who face extraordinary situations may petition the Committee on Academic Records for a part-tine schedule and proration of tuition in the college.

## Part-time study in final semester

Students may complete their degrees with part-time study and pay prorated tuition at Cornell after fewer than eight semesters of full-time residence only if:

1. They have completed all requirements by the end of the sixth or seventh semester, met the criteria for accelerated graduation, and are remaining to complete study beyond what is required for the degree.
2. They are writing an honors thesis in the eighth semester and can complete all degree requirements by taking exactly two courses, one of which is the thesis itself. They must register for the thesis and one additional course.
Stuclents must oltain approval of an advising dean and complete the prorated tuition form
in the semester before or during the first three weeks of the semester and confirm their status and registration with college registrar Sally O'Hankon in 55 Goldwin Smith Hall.

## Courses and Credits

## Counting courses and credits

Students must complete at least 34 courses to graduate-that is, an average of four courses during each of six semesters and five courses during each of two semesters. A 3- or 4 -credit course counts as one course; a 2-credit course counts as one-half course. Single-credit courses do not count as part of the 34 except in certain cases when they form a part of a series and (wo in the same series can be aggregated to count as one-half course (certain offerings in the Department of Music and Department of Theatre, Film and Dance fall into this category). Three 1 -credit courses do not aggregate to count as one course. A 6credit language course counts as $11 / 2$ courses, while the summer FALCON Programs in Asian languages count as 8 credits and two courses each and regular semester FALCON counts as 16 credits and four courses. Archateology and geology fieldwork for more than 6 credits counts as two courses each. BIOGD 281 counts as $11 / 2$ courses. Other 5 or 6 -credit courses count as one course. Courses students place out of with AP credit count toward the 34. A course identified as a prerequisite for a subsequent course may not be taken for credit once a student completes that subsequent course.
Students must also complete 120 credits, 100 of which must be from courses taken in the College of Arts and Sciences at Cornell. Liberal arts courses approved for study abroad during a semester or academic year of full-time study (not summer study) and courses taken in certain off-campus Cornell residential programs, may be counted toward the 100 credits required in the college. Advanced placement credits, credits earned in other colleges at Cornell, or credits earned in any subject at institutions other than Cornell do not count as part of the 100 . The only exceptions to the above restrictions are for courses (usually no more than three) that certain departments accept from other colleges at Cornell as fulfilling major requirements (and substituting for A\&S courses) and for up to two courses that an advisor accepts as part of a completed and formally established crosscollege, interdisciplinary concentration.
Using courses toward more than one requirement
A course may fulfill more than one college requirement in the following situations:

1. A course may be used to fulfill a distribution, breadth, and also a major requirement (except as noted under previous section of restrictions on applying AP credits, transfer credits, and Cornell courses to distribution requirements).
2. A one-semester course in foreign literature (not language) or culture that is acceptable for achieving proficiency or certifying Option I in that language may also be applied to the relevant distribution recpuirement and, if appropriate, to the breadth requirement.
3. Courses may count toward breadth recquirements and toward any other
requirement except first-year writing seminars.
4. Courses in a second major may count as electives.

## Auditing

The college encourages its students to take advantage of its rich curriculum by sitting in on courses that interest them but that they prefer not to take for credit. As long as the instructor agrees, students are welcome to visit courses. Small seminars and language courses are sometimes not open to visitors. Audited courses do not appear on the student's schedule or transcript.

## Repeating courses

Students occasionally need to repeat courses. If the instructor certifies that the course content is different, credit is granted a second time. If the content is the same, both grades nonetheless appear on the transcript and are included in any GPA that is calculated, but the course and credit count toward the degree only once. Repeated courses do not count toward the 12 credits required for good standing. Students considering repeating a course under this circumstance should discuss the matter with their advisor and an advising dean. Students who plan to repeat a course submit a petition to the college registrar, Sally O'Hanlon, 55 Goldwin Smith Hall. If the original course grade was $F$, no petition is necessary.

## Courses that do not count toward the degree

The college does not grant credit toward the degree for every course offered by the university. Courses in military training, training as emergency medical technician, service as a teaching assistant, physical education, remedial or developmental reading, precalculus mathematics (including EDUC 115), supplemental science and mathematics offered by the Learning Strategies Center, English as a second language, keyboarding, and shorthand are among those for which degree credit and credit toward the 12 credits required for good academic standing are not given. Additional information can be found at: www.arts.comell.edu/stu-adv/ coursesdontcount.php.
Students enrolled in courses for undergraduate teaching assistants may petition once to have the nondegree credits count toward good academic standing. This would allow continued eligibility for graduating with distinction in all subjects, but would disqualify the student from being on the dean's list that semester.
In addition, many courses have significantly overlapping content. Studients may receive credit for only one. For instance, SOC 101 Introduction to Sociology and D SOC 101 Introduction to Sociology cannot both be taken for credit.

## Advanced placement credit

See p. 8. Advanced placement credits count as part of the 120 credits and 34 courses required for the degree. They do not count as part of the 100 credits required in Arts and Sciences at Cornell; their application to distribution and breadth requirements is restricted or prohibited, as explained previously under "Restrictions." AP credits are posted on the transcript during the summer between the freshman and sophomore years, after students have decided whether to accept the credit or
forfeit it by taking the Comell course they had placed out of.

## Summer session credit

A student may earn credit toward the degree by completing courses in Comell's summer session or by successfully petitioning for credit for summer courses at other colleges. Students should consult their advisors regarding summer study plans.
Credit for summer courses not taken at Cornell must be approved by the appropriate Cornell department. Approval forms and information are available online, www.arts. cornell.edu, and in the Office of
Undergraduate Admissions and Advising, 55 or 172 Goldwin Smith Hall. Transcripts for completed work at other institutions must be sent to Robin Perry, 172 Goldwin Smith Hall. Credit approved for summer courses away from Cornell (including summer courses abroad) counts toward the 120 credits and 34 courses required for the degree, but not toward the 100 credits required in the college at Cornell. It may not be applied to breadth requirements but may be applied to elective requirements and to major requirements (with the approval of the department).

Entering students who want to receive credit toward the degree for courses completed before matriculation in a summer session away from Cornell should obtain approval forms as soon as possible and have transcripts sent to Robin Perry, 172 Goldwin Smith Hall.
Credits completed in Cornell summer sessions will be awarcled automatically.
Summer session at Cornell or elsewhere does not count toward the eight-semester residence requirement. Students are permitted to earn up to 12 credits in one summer.

## Transferring credit earned away from Cornell while on leave of absence

## See "Leaves of Absence."

Transferring credit (for transfer students from another institution or from another Cornell college)
Transfer students must satisfy all normal requirements for the degree, including eight semesters of full-time study. They must always complete at least 60 credits and 16 courses at Cornell and be in residence on campus in the college for at least four regular semesters (summer session does not count toward the residence requirement). The college evaluates credit and residence earned either at another school or college at Cornell University or at another accredited institution of collegiate rank and determines the number of credits and courses the student may apply toward the various requirements for the bachelor of arts degree at Cornell. In addition, it reevaluates advanced placement credit allowed by another institution, including another college at Cornell. Evaluations of transfer credits are normally provided when students are notified of their admission. Once matriculated in Arts and Sciences at Cornell, transfer students must adhere to the same rules for transferring credit earned on leave as all other students.

## SPECIAL ACADEMIC OPTIONS

## Degree Programs

The following four programs allow students to alter the regular college or major requirements or to work toward more than one degree.

## College Scholar Pragram

The College Scholar Program is meant to serve students whose interests and talents would benefit from a little more academic freedom than other students have, who demonstrate exceptional promise, and who show the maturity to plan and carry out, with the help of their advisor, a well-designed program of study. College Scholars design idiosyncratic programs: some pursue diverse interests; others integrate a variety of courses into a coherent subject. Up to 40 students in each class are accepted into the program.
College Scholars must complete 120 credits of course work ( 100 in the college), 34 courses, and, unless they receive permission from the program to accelerate, eight full terms of undergraduate study but are not required to fulfill the other usual college requirements for the degree. They must, however, also complete the university's physical education requirement. All college scholars must complete a senior project. Although they are not required to complete or fulfill the general education requirements, members of the College Scholar Advisory Board believe that the spirit of those requirements is good.
Each applicant to the College Scholar Program is asked to write an essay, which is due the last Wednesday of classes before final exams in spring of the freshman year. Students should contact Dean Ken Gabard, Office of Undergraduate Admissions and Advising, 55 Goldwin Smith Hall, for further information.

## Dual-Degree Program with Other Colleges

The Dual-Degree Program enables especially ambitious undergraduate students to pursue programs of study in two colleges. Dualdegree candidates may earn both a Bachelor of Arts degree from the College of Arts and Sciences and: (1) a bachelor of science degree from the College of Engineering; or (2) a bachelor of fine arts degree from the Department of Art in the College of Architecture, Art, and Planning; or (3) a bachelor of science degree in urban and regional studies from the Department of City and Regional Planning in the College of Architecture, Art, and Planning; or (4) a bachelor of science degree in architectural history from the Department of Architecture in the College of Architecture, Art, and Planning. Students enter one of these colleges as freshmen or sophomores and begin the DualDegree Program with the second college in the second or, in some cases, the third year. The Dual-Degree Program ordinarily takes five years to complete, and students are eligible for 10 semesters with financial aid. For further information contact Dean Kay Wagner in the Office of Undergraduate Admissions and Advising, 172 Goldwin Smith Hall.

## Independent Major Program

The Independent Major Program allows students to design their own interdisciplinary majors and pursue a subject that cannot be found in an established major. Proposals for an inclependent major must be equivalent in
coherence, breadth, and depth to a departmental major, well suited to the student's academic preparation, and consistent with a liberal education. Proposals must also be supported by a faculty advisor and are assessed by a board of faculty members. Independent majors substitute for established majors, lout students must still satisfy all the other requirements for the bachelor's degree. Students should contact Dean Jim Finlay, Office of Undergraduate Admissions and Advising, 55 Goldwin Smith Hall, for further information. Deadlines for submitting independent major proposals are listed on the calendar supplement for the College of Arts and Sciences.

## Double Registration with and Early Admission to Professional Schools

Registration in the senior year of the College of Arts and Sciences and the first year of Cornell Law School or the Johnson Graduate School of Management is occasionally possible. A very few exceptionally wellprepared students who have earned 105 credits before the start of the senior year and have been accepted by one of the abovenamed professional schools may be permitted to register simultaneously in the college and in one or another of these professional schools during the seventh and eighth terms. They earn the B.A. degree after the first year of professional school.
Students with 8 or fewer credits and two or fewer courses to complete may apply to enter the Master's of Engineering program during (but no earlier than) their eighth semester; dual-degree students may enter this program no earlier than the ninth semester. They earn the bachelor degree(s) after one semester of graduate school.
Students interested in the joint program with the Law School or the Graduate School of Management, or in early admission to the master's of engineering program should apply to the relevant program. All candidates should confirm their eligibility with an advising dean, Office of Undergraduate Admissions and Advising, 172 Goldwin Smith Hall.
Double-registered students must, of course, complete all requirements for the B.A. degree, including 100 credits in Arts and Sciences courses.

## Teacher Education

Students at Cornell may pursue teaching credentials in agriculture, biology, chemistry, earth science, general science, mathematics, and physics. Cornell students from any college are encouraged to apply for admission to the Cornell Teacher Education Program during their sophomore or junior year. Those who are admitted complete their undergraduate major in an agricultural science, mathematics or science and a minor (concentration) in education. They are then able to complete a master of arts in teaching (MAT) in one year and earn centification in New York State. Students in agricultural science may be able to complete all certification requirements as undergraduates, although this option is not recommended.
For more information, contact the program clirector, Deborah Trumbull, at 255-3108 or dit2@cornell.edu.

## Special-Interest Options

The following options enable students to pursue special interests within the usual degree programs.

## Concentrations

Established interdisciplinary concentrations, described in alphabetical order along with departments in the pages following, provide structures for organizing electives. Completed concentrations are noted on the transcript.

## Informal Minors

Some students organize electives within a discipline or department in Arts and Sciences or another college. Such informal minors can be developed with the help of the departmental directors of undergraduate studies. They are not noted on the transcript.

## Independent Study

Independent study affords students the opportunity to pursue special interests or research not treated in regularly scheduled courses. A faculty member, who becomes the student's instructor for the independent course, must approve the proposed study and agree to provide continuing supervision of the work. Students must prepare a proposal for independent study (proposal forms are available in the Office of Undergraduate Admissions and Advising, 55 and 172 Goldwin Smith Hall). In one semester students may earn up to 6 credits with one instructor or up to 8 credits with more than one instructor. Students who are being paid for assisting faculty in research cannot earn course credit for that work.

## Undergraduate Research

An excellent way to benefit from being an undergraduate at a research university, at Cornell in particular, is to become an apprentice in ongoing faculty research. About 400 students participate each year in creating new knowledge and earn independent study credit for what they learn and contribute. They sharpen their critical and creative abilities and test their interest in pursuing a research career. Sometimes they publish their work.
The Cornell Undergraduate Research Board, an undergraduate organization, conducts an annual open house to help students get started in research and an annual forum at which undergraduates present their work. See www.rso.cornell.edu/curb/.
Students interested in this program should consult Dean David DeVries in the Office of Undergraduate Admissions and Advising, 172 Goldwin Smith Hall, or consult www.research. cornell.edu/undergrad/.

## Language Study

## FALCON (Full-Year Asian Language

Concentration). FALCON allows students who are interested in the Far East to study Chinese or Japanese exclusively for one year. They gain proficiency in the language and familiarity with the culture. Students who are interested in the Far East should be aware of the opportunities to pursue rapid and thorough beginning studies on campus with the objective of studying abroad in China or Japan. Students interested in this program should contact the Department of Asian Studies, 388 Rockefeller Hall; e-mail: falcon@ cornell.edu.

## Language House Program

A complement to classroom cultural and linguistic instruction, the Language House Program combines residential and academic opportunities for developing and practicing conversational skills in French, German, Italian, Japanese, Mandarin Chinese, and Spanish. It helps prepare students who plan to study abroad and helps returning students share their cultural experiences while further increasing their language skills. Students interested in this program should contact the director of the program, 726 University Ave., 255-6453.

## Prelaw Study

Law schools seek students with sound training in the liberal arts and sciences; they neither require nor prefer any particular program of study. Students should therefore study what they love and do well. While doing that, they should also develop their powers of precise, analytical thinking and proficiency in writing and speaking. Students in the College of Arts and Sciences who are applying to law school may consult Lisa Harris in the Office of Arts and Sciences Career Services, 55 Goldwin Smith Hall.
The college offers a concentration in law and sociery. This program offers a broad scope, complements almost any major, and attracts many students not intending to become lawyers as well as a subset of those intending to.

## Premedical Study

The breadth and depth afforded by a liberal arts education are invaluable for students planning medical careers, whether they intend to practice or go into research. Such education has a profound effect on the doctor's understanding of the world and hence usefulness to patients, and it affords the flexibility of mind that is needed for major research undertakings. Medical and dental schools do not prescribe or even prefer a particular major; they do, however, require particular undergraduate courses, and most students are well advised to begin chemistry in their freshman year. Students who are interested in medical careers are urged to visit the Health Careers Office, 203 Barnes Hall.
The advisor for students in the College of Arts and Sciences who are planning careers in medicine is Dean Janice Turner, Office of Undergraduate Admissions and Advising, 55 Goldwin Smith Hall.

## Off-Campus Programs

Many students find it important to their majors or to their overall academic programs to study off campus or abroad for one or two semesters. When it makes academic sense, the college encourages its students to pursue such studies and grants credit toward the degree for work satisfactorily completed. It rarely approves students' participation in more than one off-campus program.

## Study Abroad

The College of Arts and Sciences encourages study, both on campus and abroad, that provides a greater understanding of the world's peoples, cultures, economies, and environments, and prepares graduates for the challenges of international citizenship in the 21st century. Study abroad is open to students in any major who meet the college
requirements and have a strong academic goal. Well-chosen and well-planned study abroad contributes a global or comparative dimension to your chosen field, enhances critical thinking and communications skills, and provides firsthand immersion in and appreciation of another culture. Focused academic work in the right institution abroad can be excellent preparation for advanced study or honors work in your final semesters at Cornell, and can lead to a career with a global component.

## Requirements

- acceptance into a major
- area-studies course work
- fulfillment of the College of Arts and Sciences residence requirement
- GPA of 3.0 or higher and good academic standing
- language study at the required level
- fulfillment of the requirements of the foreign university or program
Cornell Study Abroad students must study alongside degree candidates in their host institutions rather than in self-contained programs that offer courses specially designed for foreigners. The college will approve only those study-abroad proposals that demonstrate realistic and coherent academic goals that are consistent with the philosophy of a liberal arts education.
The college advocates study abroad that enables students to become competent in another language, so that they can engage fully in daily life in another culture, develop social relationships, and complete formal course work in that language. To study abroad in a country where the host language is not English, the student must demonstrate competence in the language as a prerequisite.
For study abroad in Western Europe and Latin America, students must complete at least two semesters of the appropriate foreign language at the 200 level at Cornell; additional course work is strongly encouraged and will increase students' chances for acceptance into the most highly competitive programs. Consult this catalog for the required level of course work in specific languages. For study abroad in Asia, Eastern Europe, the Middle East, and parts of Africa, course work entirely in the host language is not always practical, even after several semesters of language preparation at Cornell. Students should still plan to complete as much language preparation as possible within the Cornell curriculum, at least one to two years of study, and may be approved for languageintensive programs (at least half of the permitted 15 credits) with appropriate course work in English. If Cornell does not offer instruction in the language of the proposed host country, the student may be approved for a program that combines intensive language instruction with subject course work in English. All students must continue to formally study the language of the host country while abroad.
For study abroad in English-speaking countries, direct university enrollment is approved and expected. Cornell students will engage in a full course of study, generally in their major field, alongside regular degree candidates in the host country. In general, the college requires that at least 50 percent of the
classes the student enrolls in be advancedlevel course work in their major field.
Students will need to acquire background knowledge of the country or region where they intend to study. At least one area-studies course or one course in the history, culture, economics, politics, or social relations of the country of destination ( 3 or more credits) in addition to language study should be part of every student's preparation for study abroad. Some especially competitive programs require substantial prior course work in the proposed course of study as a prerequisite to acceptance. Students who intend to enhance their major with study abroad may need advanced course work in that field. As with language study, area-studies preparation beyond the minimum is highly recommended.
All A\&S students must be formally accepted into a major before going abroad, and should ideally be accepted into a major before beginning the application process. Most students plan a significant amount of academic work toward the major while abroad. Whether or not students intend to earn major credit, the college requires that time spent abroad will not impede their progress toward the degree. The student's faculty advisor and departmental director of undergraduate studies must review and approve the study-abroad plans before the application is submitted to the college.
Study abroad can earn up to 15 A\&S credits per semester of full-time course work as long as the curriculum abroad is consistent with that of the college. Completion of one trimester of study earns a maximum of 10 credits. Two terms at Oxford or Cambridge may earn up to 20 credits. You must carry a full course load as defined by the host institution, which should be equivalent to at least 15 credits at Cornell, and all courses must be taken for a letter grade. Courses that fall outside the scope of the liberal arts and sciences may only be taken with the prior approval of Dean Wasyliw, and will earn non-A\&S credits. Some foreign universities offer courses for visiting students that do not carry any academic credit. Students may not earn additional credit for enrolling in extra courses during the semester or year abroad.
Credit for study abroad will be awarded only after completion of the semester abroad, and after the college receives your official transcript. To receive credit, students must fill out a Request for Credit from Study
Abroad form and submit it to the advising office along with a copy of their transcript. All courses taken abroad will appear on the Cornell transcript and grades earned are reported in the system of the host institution. Grades earned through course work abroad do not become part of the Cornell GPA, since grades at other institutions are rarely equivalent to grades at Cornell. Students must save all written work from all courses until their grades are received and recorded on their Cornell transcript.
The maximum length of study abroad that can count toward A\&S degree requirements is two semesters, which is also the amount of time recommended for true immersion in another culture and language. Approved semesters away from campus include Cornell in Washington, Urban Semester, and SEA Semester as well as all Cornell Abroad destinations. Students who transfer to Cornell must complete a minimum of four semesters
of residence on campus in Ithaca and may not study abroad during any of those four semesters. Internal transfers must complete four semesters of residence on campus in the Internal Transfer Division and/or the College of Arts and Sciences. Students interested in the Cornell in Rome Program should contact Dean Wasyliw.
All applicants for study abroad during the academic year must go through the Cornell Abroad office after being approved by the College of Arts and Sciences. For more information, see Dean Patricia Wasyliw, 55 Goldwin Smith Hall. The full A\&S study-abroad policy can be found on the Cornell Abroad web site.

Summer Residential Programs in Archaeology
During the summer months students may participate in a Cornell-sponsored archaeological project. In recent years the program has organized archaeological projects in Central America, Greece, Israel, Italy, Turkey, and New York State. Students should contact the Archaeology Program for information about the sites currently available. Students planning on attending field schools organized by other institutions should contact Professor Thomas Volman, 201 McGraw Hall, or tpv1@cornell.edu.

## Marine Science

Shoals Marine Laboratory is a seasonal field station that offers a variety of courses and experiences designed to introduce undergraduates to the marine sciences. The laboratory is located on Appledore Island, six miles off the Maine/New Hampshire coasts. Students should contact the Shoals Marine Laboratory Office, G14 Stimson Hall, for further information.

## Cornell in Washington

The Cornell in Washington program offers students from all colleges in the university an opportunity to earn full academic credit for a semester in Washington, D.C. Students take courses from Cornell faculty members, conduct individual research projects, and work as externs. The Cornell in Washington program offers two study options: (1) studies in public policy, and (2) studies in the American experience. The program also offers unique externship opportunities: students serve as externs in a federal agency, congressional office, or nongovernmental organization and take part in a public policy or humanities seminar. They define and carry out individual research projects under the supervision of Cornell faculty members. Potential externships are arranged through, and approved by, the Cornell in Washington program. For further information, see p. 21 or inquire at M101 McGraw Hall, 255-4090. Study in Washington during a final semester of residence is allowed rarely and only by petition. Students should consult with a dean, Office of Undergraduate Admissions and Advising, 172 Goldwin Smith Hall.

## ACADEMIC INTEGRITY

Academic integrity is the heart of intellectual life-both in learning and in research. All members of the university community simply must support each other's efforts to master new material and discover new knowledge by
sharing ideas and resources, by respecting each other's contributions, and by being honest about their own work. Otherwise the university will fail to accomplish its most central and important goals.
Cornell's Code of Academic Integrity and policy about acknowledging the work of others are among the documents new students receive. Students should read them carefully and not assume they understand what integrity and cheating are and are not. Academic integrity implies more here at the university than it usually did in high school. The standards of integrity are those that prevail in professional life. This means that students must acknowledge and cite ideas they adopt from others (not just direct quotations) and help they receive from colleagues or parents. With productive emphases on collaborative learning and writing, students must understand the general standards and policies about academic integrity and be sure they understand the expectations in individual courses as well. When in doubt, ask the instructor. For more information, consult http://cuinfo.cornell.edu/ Academic/AIC.html.

## Forgery or Fraud on Forms

Forging signatures or credentials on college forms is an academic offense and constitutes academic fraud. In all cases of forgery on academic forms, the effect of the forged documents shall be negated; such incidents will be recorded in the Academic Integrity Hearing Board's confidential file for forgeries. If the student forges more than once, or if the forgery would advance the student's academic standing unfairly or fraudulently, or if for any reason the situation requires some response in addition to the uniform penalty, the Academic Integrity Hearing Board might recommend further action, such as a notation on the student's transcript, suspension, or dismissal.

## ADVIIING

The following advisors and offices provide academic advising, help with problems, and information on college procedures and regulations.

## Faculty Advisors

Each new student is assigned a faculty advisor. Advisors help students plan programs of study and advise them about ways to achieve their academic goals. Advisors may also help students with study or personal problems or may direct them to other offices on campus where help is available. Academic difficulties may frequently be solved or avoided if students and advisors recognize and address problems early.
Advisors and new advisees meet first during orientation week to discuss course selection. New students are encouraged to see their advisors again early in the semester, before it is too late to drop courses, to discuss their academic progress and to become better acquainted. Advisors and advisees meet at least once each semester to discuss courses for the following semester, and more often if advisees wish to discuss academic or personal issues or to petition for an exception to college rules.

## Student Advisors

Student advisors pass on lore about the college and life at Cornell and help new students understand requirements and negotiate the university.

## Major Advisors

After acceptance into a major, students are assigned a major advisor, a faculty member in the major department, with whom they shape and direct their course of study. The advisor eventually certifies the completion of the major. Students should consult their major advisor about all academic plans, including honors, study abroad, acceleration, and graduate study. The advisor's support is especially important if a student petitions for an exception to the normal procedures or requirements.

## Office of Undergraduate Admissions and Advising

This office, located in 55 Goldwin Smith Hall, 255-5004, and 172 Goldwin Smith Hall, 2554833 , is a resource for faculty and student advisors and for individual students and their parents. Advising deans are available to help students define their academic and career goals, to help with special academic options and exceptions to college rules, and to help when problems arise:
David DeVries, associate dean for undergraduate admissions and advising and undergraduate research, 255-3386
Yolanda Clarke, juniors, seniors, internal transfers, and minority students, 255-4833
Juliette Corazón, minority students and liaison to Latino Studies Program, 255-4833
Maria Davidis, juniors, seniors, Tanner Dean's Scholars, Cornell Presidential Research Scholars, Mellon Mays Fellows, and postgraduate fellowships, 255-4833
James Finlay, first- and second-year students, Independent Major Program, Tanner Dean's Scholars, Cornell Presidential Research Scholars Fellowships, undergraduate research, and peer advisors, 255-5004
Ken Gabard, first- and second-year students and College Scholar Program, 255-5004
Lisa M. Harris, career services and pre-law advising, 255-6926
Ray Kim, first- and second-year students, student ambassadors, 255-4833
Irene Komor, career counseling, 254-5295
Diane J. Miller, career services, 255-6924
Sally O'Hanlon, registrar, 255-5004
Janice Turner, minority students and pre-med advising, 255-9497
Catherine Wagner, juniors, seniors, and dualdegree students, 255-4833
Patricia Wasyliw, first- and second-year students, academic integrity, study abroad, 255-5004

## Committee on Academic Records

The college faculty's standing Committee on Academic Records has two main tasks: (1) to decide on students' petitions for exceptions to college requirements or rules and (2) to review the records of students who fail to maintain good academic standing and to take appropriate action. It accomplishes both those
tasks without formulae and with attention to each individual situation. Its overriding goal is to help students achieve the best undergraduate education possible.

## Petitions

The college faculty takes graduation requirements seriously, and the faculty's Committee on Academic Records virtually never waives a requirement outright. However, some students, with the support of their advisors, propose structuring their educations or fulfilling the spirit of college requirements in ways other than the specified norms. The Committee on Academic Records decides on such requests. Students who find that their undergraduate education would be better realized by satisfying requirements or proceeding in a way that requires an exception to normal rules should meet with an advising dean in the Office of Undergraduate Admissions and Advising. The deans are expert in the college's expectations and procedures and can help the student formulate a petition, if appropriate. The committee decides petitions on the basis of their educational merit.

## Actions

The College of Arts and Sciences has no minimum grade requirement for graduation beyond the guideline that at least 100 Cornell credits of the 120 total required for graduation be passed with grades of $C$ (not C-) or above. Consequently, only through actions of the Committee on Academic Records, described below under "Academic Standing," does the college maintain the quality of the degree and attend to individual situations when things academic are not going well.

## REGISTRATION AND COURSE SCHEDULING

## Enrollment in Courses in the College of Arts and Sciences

## New Students

During orientation week, new students attend briefings and other information sessions, meet with faculty advisors, and sign into courses. The college reserves spaces in courses for its incoming students.

## Continuing Students

Continuing students select and schedule up to five courses of 3 or more credits and as many 1 - and 2 -credit courses as they would like during the semester before the one in which the courses will be taken. Students who do not "pre-enroll" during the designated period must wait until the beginning of the semester and may have difficulty securing places in the courses they most want. Before enrolling in courses, students plan their programs and discuss long-range goals with their faculty advisors. In addition, all students are welcome to discuss programs and plans with an advising dean in the Office of Undergraduate Admissions and Advising, 55 or 172 Goldwin Smith Hall.
At the beginning of each semester, students find their schedules on "Just the Facts." Periodically during the semester, they should confirm the accuracy of their records.

## Limits on Numbers of Courses and Credits

To meet the 34 -course requirement, students must normally take four courses during each of six semesters and five courses during each of two semesters. To meet the 120 -credit requirement, students must average 15 credits per semester. (Note: AP credit and/or summer credits may reduce the average numbers of courses and credits required each semester.)
Minimum number of credits per semester
To maintain good academic standing as a fulltime student, students must complete at least 12 degree credits per semester; if for compelling personal or academic reasons students need to carry fewer than 12 credits, they should consult their faculty advisor and an advising dean. Permission is by petition only.
Maximum number of credits per semester
First-semester freshmen must petition to enroll in more than 18 credits; other students may enroll in up to 22 credits if their previous semester's average was 3.0 or higher and they are in good academic standing. No more than 22 credits may be taken in a regular semester without permission of the college faculty's Committee on Academic Records. Students who fail to receive approval for excess credits from the committee may count only 18 or 22 credits, depending on their previous semester's average, toward the degree for that semester.

## Attendance

Attendance in classes is expected. Absences are a matter between students and their instructors. If a student cannot attend classes because of illness or family crisis, the Office of Undergraduate Admissions and Advising will notify instructors at the request of the student or the family. Nonetheless, the student must arrange to make up examinations or other work with each instructor. A student who will be absent because of religious holidays or athletic competitions must discuss arrangements for making up work with his or her instructors well in advance of the absence. A student who must miss an examination must also consult with the professor in advance. Alternative arrangements are at the discretion of the instructor.
Student athletes should discuss scheduled absences with their instructors at the beginning of the semester. Courses vary in their tolerance of absences. Instructors are not obligated to approve absences for purposes of participating in extracurricular activities, although most will be as flexible as is sensible for a student's academic program.

## Adding and Dropping Courses

After course enrollment (also known as preenrollment), students may not adjust their schedules until the new semester begins. During the first three weeks of the semester, students may change courses without petitioning. (Note: the add period for first-year writing seminars is only two weeks.)
After the third week of classes, students must petition to add courses and may add them only for a letter grade. They may drop courses through the seventh week of the semester if no issue of academic integrity is at stake. Between the seventh and 12th weeks students may petition to withdraw from courses, if (1) the instructor approves; (2) the advisor
approves; (3) an advising dean approves; (4) the drop does not result in fewer than 12 credits; and (5) no issue of academic integrity is at stake. Students must meet with an advising dean to obtain petition forms.
Courses officially dropped after the seventh week will be noted on the transcript by a "W" where the grade would normally appear. This is a matter of record and cannot be petitioned. Petitions to withdraw from courses may not be submitted after the end of the 12 th week in the semester. Deadlines for short courses will be adjusted according to the length of the courses.
The effective date of all course changes will be the day the student submits all completed paperwork to the Office of Undergraduate Admissions and Advising.

## Leaves of absence (LOAs)

Taking time off from college to gain experience or funds, or to find direction, is sometimes useful. In general, students arrange in advance for leaves to take effect the following semester. Students in good academic standing may take a personal leave of absence up to the beginning of the semester (defined as the first day of classes). Students not in good academic standing may pursue a conditional leave of absence from the college up to the first day of classes. If medical issues are involved, students must consult Gannett: Cornell University Health Services about the advisability of a medical leave of absence.
Any student who wishes to take a leave of absence must consult with an advising dean in the Office of Undergraduate Admissions and Advising, 55 or 172 Goldwin Smith Hall.

Students sometimes find it necessary to take a leave of absence at some point during the semester. In addition to the serious financial consequence of taking leaves after the semester has begun (see the Proration Schedule for Withdrawals and Leaves of Absence in the General Information section of this catalog), all leaves taken during the semester are granted at the discretion of the college. Students should discuss their need for a LOA with an advising dean.

## Leaves of Absence are of four types:

1. Personal leaves impose no conditions concerning reentering the college except for the five-year limit (see "Return from Leave," below). Readmission is automatic upon written request made by August 1 for a fall semester, or January 1 for a spring semester.
2. Conditional leaves are granted by the college for students who wish to take a leave but are not in good academic standing, or for students who wish to take a leave during the current semester. In consultation with the student, an advising dean and the Committee on Academic Records set the conditions for the student's return. Students may not return from conditional leaves for at least two semesters and/or until specific and individual conditions, such as completing unfinished work, have been met. Students may be granted conditional leaves after the 12 th week of a semester only under extraordinary circumstances and with the approval of the faculty's Committee on Academic Records.
3. Medical leaves are granted by the college only upon the recommendation of Gannett: Cornell University Health Services, and are usually issued for at least six months. The college may attach additional conditions appropriate to the individual situation. The student's academic standing is also subject to review at the time of the leave and on return. Students must then receive clearance from both Gannett and the college to be readmitted to study. Students wishing to return from a medical leave should contact Gannett several months in advance to initiate the return process, and only then contact the college.
4. Required leaves. The Committee on Academic Records may require a leave of absence if a student is not making satisfactory progress toward the degree. See "Academic Actions."
Students on conditional or required leaves of absence (LOA) may not attend any classes at Cornell through the School of Continuing Education and Summer Sessions. Students on a medical LOA may not register for classes at Cornell unless they obtain the permission of the college and a recommendation from Gannett. Courses taken without college permission will not count toward degree requirements.

## Return from Leave

Students wishing to return from leave must contact the college and, where appropriate, provide documentation that all conditions for readmission have been satisfied. All requests for readmission must be received by the college by August 1 for the fall semester and January 1 for the spring semester. In the case of conditional and/or medical leaves, substantial advance consultation with both the college and Gannett. On readmission, the student's graduation date will be recalculated. Five years is the maximum length of time a student may be on leave before being withdrawn from the college.

## Transferring Credits Earned While on Leave

Students who take courses elsewhere in the United States while on leave may petition to have credits transferred. Petitions are available in 55 and 172 Goldwin Smith Hall and at www.arts.cornell.edu. Approval depends on acceptable grades and the judgment of the relevant departments about the quality of the courses. If approved, these credits may be applied toward the 120 credits and 34 courses needed for graduation, but not toward the 100 credits required in the college. They may be applied to elective requirements or to the major, as allowed by the department, but not to any of the breadth or distribution requirements. Credits earned during a leave do not count toward the eight semesters of residence and may not be used to reduce the terms of residence below the required eight. See "Residence."

## Study Abroad and International Students on Leave of Absence

Study abroad undertaken during a leave of absence will not receive academic credit. International students on leave of absence from the College of Arts and Sciences may enroll in courses at a college or university in their home country only, as such enrollment
is not defined as study abroad. They may petition for transfer of credit upon return to Cornell. If approved, the credit will count as described in the previous paragraph.

## Withdrawals

A withdrawal is a permanent severance from the university and from candidacy for the degree. Students planning to withdraw should consult an advising dean. Students not requesting a leave and failing to register for a semester will be withdrawn from the college. The college faculty's Committee on Academic Records may require a student to withdraw because of a highly unsatisfactory academic record.

## Transferring within Cornell (Internal Transfer)

Internal transfer from one college or school at Cornell into another is attractive for many students whose intellectual interests change (or become more focused). Students who want to transfer should discuss their eligibility with a counselor in the new school or college.
In some cases, students who want to transfer into the College of Arts and Sciences may transfer directly. In other cases, they may be referred to the Internal Transfer Division. During the semester immediately preceding transfer into the College of Arts and Sciences, students should complete at least 12 credits of courses in the College of Arts and Sciences with a 3.0 average and with no grades of Incomplete, S-U grades (unless only S-U grades are offered for that particular course), or grade below C (C- is below C). Satisfying this minimum requirement does not, however, guarantee admission. Admission to the college is based on consideration of the student's entire record at Cornell and the high school record, not just the work of one semester. It is also based on ability to complete the B.A degree within a reasonable time. Internal transfers are required to spend four semesters in Arts and Sciences and thus should initiate the transfer process no tater than the second semester of sophomore year. They also must complete at least 100 credits at Cornell with grades of C (not C-) or above. Interested students should see Dean Yolanda Clarke, 172 Goldwin Smith Hall.

## ACADEMIC STANDING

Students are in good academic standing for the semester if they successfully complete at least 12 degree credits by the end of the semester and earn no more than one D and no $F$ or U grades. If a student completes only three courses, all grades must be above D. In addition, students are expected to make satisfactory progress toward satisfying requirements for the degree and to earn grades of C (not C-) or better in at least 100 of the 120 credits for the degree. Courses listed under "courses that do not count toward the degree" do not count toward good academic standing in a semester.

## Academic Actions

Students who are not in good academic standing will be considered for academic action by the college faculty's Committee on Academic Records or by one of the advising deans of the college. Students are urged to explain their poor academic performance and submit corroborating documentation. Students
may appeal a decision or action of the committee if they have new relevant information and documentation. They must consult an advising dean about appealing.

## Warning

Any student who fails to maintain good academic standing will, at a minimum, be warned. A warning is posted on a student's college record but is not reported to the university registrar and does not appear on official transcripts.

## Required leave of absence

A student in serious academic difficulty may be required by the faculty Committee on Academic Records to take a leave of absence, normally for a full year. Usually, but not always or necessarily, the Committee on Academic Records warns students before suspending them. Before being allowed to return and reregister in the college, students must document what they did on leave and how they resolved their problems, and they must submit a plan for completing the degree In some cases students will be required to furnish evidence that they are ready to return or satisfy other conditions before being allowed to reregister in the college. Students who request to return in less than a year must present to the committee extraordinarily convincing evidence of their readiness to return. "Required leave" is posted on the student's official transcript.

## Required withdrawal

The faculty Committee on Academic Records may dismiss a student from the college because of a highly unsatisfactory record for one semester or for failure to make satisfactory overall progress in grades, credits, or degree requirements. This action expels the student permanently from the college.
"Required withdrawal" is posted on the student's official transcript.

## GRADES

## Letter Grades

See "Grading Guidelines," p. 15.

## S-U Grades

The S-U (satisfactory-unsatisfactory) option allows students to explore unfamiliar subjects or take advanced courses in subjects relatively new to them without being under pressure to compete with better-prepared students for high grades. Students are expected to devote full effort and commitment to a course and complete all work in a course they take for an S-U grade. The S-U option is contingent upon the instructor's willingness to assign such grades. Students must select their grading option and obtain the instructor's approval for the S-U option during the first three weeks of the semester. No exceptions to this deadline are permitted, and consequently students adding courses after the third week of the semester must add them for a letter grade. A grade of S is equivalent to a grade of C - or higher; a grade of U , which is equivalent to any grade below C-, is a failing grade equal to an F. S means the student receives the credit specified for the course. U means no credit is given. A few courses in the college are graded exclusively

S-U; in that case, the final grade appears on the transcript as SX or UX.
Prerequisite courses for graduate school and courses counting toward the major should not be taken for an S-U grade, unless the department grants permission. Students may elect the S-U option in courses used to satisfy distribution and elective requirements, provided that such courses do not also count toward major requirements or serve as prerequisites for admission to the major. Firstyear writing seminars and most language courses disallow the S -U option. In any case, students are advised to use the S-U option sparingly, if they intend to apply to graduate school or for transfer to another college. There is no limit on the number of courses each semester for which students may elect the S-U grade, but within the 120 credits required for the degree, a minimum of 80 credits must be in courses for which a letter grade was received

## Note of Incomplete

An incomplete (INC) signifies that a course was not completed before the end of the semester for reasons beyond the student's control and acceptable to the instructor. Students must have substantial (normally at least 50 percent) equity in the course, be able to complete the remaining work, and have a passing grade for the completed portion. When a grade of incomplete is reported, the instructor submits a form stating what work must be completed, when it must be completed, and the grade (or permanent-"frozen"-incomplete) earned if the work is not completed by that date. When a final grade is determined, it is recorded on the official transcript with an asterisk and a footnote explaining that this grade was formerly an incomplete.
Students must resolve (make up or "freeze") any incompletes with their instructors before graduation

## Note of R (Yearlong Courses)

$R$ is recorded for satisfactory progress at the end of the first semester of a two-semester course. Students enroll in such courses both semesters, each time for the full number of credits for the whole course. The grade recorded at the end of the second semester evaluates the student's performance in the course for the entire year.

## Grade Reports

Grade reports are available online on Just the Facts; they are not mailed to students. Students should periodically check their courses and grades to be sure that they are recorded correctly.

## Class Rank

The college does not compure class rank.

## Dean's List

Inclusion on the Dean's List is an academic honor bestowed by the dean of the college semester by semester. Based on grades, the criteria include about the top 30 percent of students and vary with the number of credits the student completes. The criteria are subject to slight changes from semester to semester and are available at www.arts.cornell.edu/stuadv/deanslist.asp and in the Office of

Undergraduate Admissions and Advising, 55 Goldwin Smith Hall.

## GRADUATION

## The Degree

The College of Arts and Sciences grants only one degree (no matter the student's major): the A.B. (or B.A.). A.B. is the abbreviation of the Latin name for the degree, "artium baccalarius," or translated into English, B.A. "Bachelor of Arts."

## Application to Graduate

In the first semester of their senior year, students complete an application to graduate The application allows the college to check each student's plan for fulfilling college requirements. This process is intended to help seniors identify problems early enough in the final year to make any necessary changes in course selection to satisfy those requirements Nonetheless, meeting graduation requirements is the student's responsibility; problems that are discovered, even late in the final semester, must be resolved by the student before the degree can be granted.

## Degree Dates

There are three degree dates in the year: May, August, and January. Students who plan to graduate in August may attend graduation ceremonies in the preceding May. Students graduating in January are invited to a special recognition ceremony in December; they may also attend graduation ceremonies the following May.

## Honors

## Bachelor of Arts with Honors

Almost all departments offer honors programs for students who have demonstrated exceptional accomplishment in the major and succeeded in research. The honors programs are described by individual departments. The degree of Bachelor of Arts cum laude, magna cum laude, or summa cum laude will be conferred upon a student who, in addition to having completed the requirements for the degree of Bachelor of Arts, has been recommended for a level of honors by the major department, the Independent Major Program, or the College Scholar Program. Concentrations do not offer honors programs.

## Bachelor of Arts with Distinction

The degree of Bachelor of Arts with distinction in all subjects will be conferred on students who have completed the requirements for the degree of Bachelor of Arts, if they have met the following requirements by the end of their final semester:

1. completed at least 60 credits while registered in regular sessions at Cornell;
2. achieved a GPA in the upper 30 percent of their class at the end of the seventh semester, or next-to-last semester for transfers and accelerants;
3. received a grade below C - in no more than one course:
4. received no failing grade;
5. have no frozen Incompletes on their records; and
6. maintained good academic standing, including completing a full schedule of at least 12 credits, in each of their last four semesters. (Students who have been approved to be pro-rated for the final semester in order to complete an honor's thesis are considered to be in good academic standing and therefore eligible to receive distinction.)

## CALENDAR SUPPLEMENT

All of the dates in the university calendar at the front of this volume apply to all Cornell students. Listed below are some additional dates that are of importance for students in the College of Arts and Sciences.

| Fall | Spring |
| :--- | :--- |
| 2007 | 2008 |
| Sept. 14 | Feb. 8 |
| Sept. 7 | Feb. 1 |
| Sept. 14 |  |
|  |  |

Last day for adding courses without petition
Last day for adding a first-year writing seminar

Last day for changing grade option to S-U or letter

First deadline for submitting independent major requests. Go to 55 Goldwin Smith Hall for further information.
Last day for dropping courses without petition
Last day to petition to withdraw from a course

Second deadline for submitting independent major requests. Go to the Office of Undergraduate Admissions and Advising, 55 Goldwin Smith Hall, for further information.
Deadline for requesting internal transfer to the College of Arts and Sciences for the following semester.
Deadline for applying to the College Scholar Program.
Deadline for applying Office, to study abroad
Course enrollment (preregistration) for the following semester.

Departments, Programs, and Courses

## AFRICANA STUDIES AND RESEARCH CENTER

S. Hassan, Director (254-1592); N. AssiéLumumba, L. Edmondson, R. Harris, A. Mazrui, A. Nanji, J. Turner. Offices: 310 Triphammer Road, 255-4625 or 255-4291
The Africana Studies and Research Center is concerned with the examination of the history, culture, intellectual development, and social organization of Black people and cultures in the Americas, Africa, and the Caribbean. Its program is structured from an interdisciplinary and comparative perspective and presents a variety of subjects in focal areas of history, literature, social sciences, and African languages. African languages such as Swahili are consistently offered fall and spring semesters and also taught during summer/ winter session.
The center offers a unique and specialized program of study that leads to an undergraduate degree through the College of Arts and Sciences and a graduate degree, the Master of Professional Studies (African and African-American), through the university's Graduate School.
A student may major in Africana Studies; however, another attractive alternative is the center's minor concentration program. This program enables the student to complete a major in any of the other disciplines represented in the college while at the same time fulfilling requirements for a minor in Africana Studies. This requires only a few more credits than is usually the case when one completes a single major course of study. Courses offered by the center are open to both majors and nonmajors and may be used to meet a number of college distribution requirements, including historical/temporal breadth (\#) and geographical breadth (@) requirements, such as first-year writing seminars, languages, expressive arts, humanities, social sciences, and history.
The center also brings distinguished visitors to the campus, sponsors a colloquium series, and houses its own library.

## The Africana Major

The undergraduate major offers interdisciplinary study of the fundamental dimensions of the African-American, African, and Caribbean experiences. Because of the comprehensive nature of the program, it is to students' advantage to declare themselves Africana majors as early as possible. The following are prerequisites for admission to the major.
Students should submit:

1. a statement of why they want to be an Africana Studies major;
2. a tentative outline of the area of study they are considering (African, AfricanAmerican, or Caribbean) for the major; and
3. a full transcript of courses taken and grades received.
The center's director of undergraduate studies, A. Nanji, will review the applications and notify students within two weeks of the status of their request.

After acceptance as a major in the Africana Center, a student must maintain a C+ cumulative average in the center's courses while completing the major program. The Africana major must complete 36 credits in courses offered by the center, to include the following four core courses: AS\&RC 205, 231, 290 , and 422 . Beyond the core courses, the student must take 8 credits of center courses numbered 200 or above and 15 credits numbered 300 or above. The program of an undergraduate major may have a specifically African American or African focus.

## Joint Majors (Minor Concentration)

The center encourages joint majors (minor concentration) in the College of Arts and Sciences and in other colleges. Joint majors are individualized programs that must be worked out between the departments concemed. The center's director of undergraduate studies, A. Nanji, will assist students in the design and coordination of joint major programs. However, in any joint major program, the center will require that at least 16 credits be taken in Africana Studies courses, including AS\&RC 290.

## Double Majors

In the case of double majors (as distinct from joint majors) students undertake to carry the full load of stipulated requirements for a major in each of the two departments they have selected.

## Certificate in African Studies

In conjunction with the Institute for African Development, the Africana Studies and Research Center administers an undergraduate Certificate in African Studies program. The certificate is offered as a minor concentration available to students in all of the undergraduate colleges at Cornell. Many of the courses in the program might be used to fulfill other course distribution requirements. By pursuing this certificate, students acquire an interdisciplinary understanding of Africa. After developing a foundation of knowledge on the culture, society, and development of Africa in the core course, AS\&RC 191 Africa: The Continent and Its People, students pursue 15 credit hours in a humanities or development studies track or a combination of the two, including an additional core course, either AS\&RC 205 African Civilizations and Cultures or CRP 477/677 Issues in African Development. The requirements for the certificate are a minimum of 18 credit hours, including the core courses. Students interested in the certificate program must contact A. Nanji (the center's director of undergraduate studies), who will register them in the program and assign them a faculty advisor from their own college. The faculty advisor will be responsible for determining completion of the certificate requirements.

## Honors

The honors program offers students the opportunity to complete a library research thesis, a field project in conjunction with a report on the field experience, or a project or experiment designed by the student. The requirements for admission to the honors program for all students-regular majors, joint majors, and double majors-are a Bcumulative average in all courses and a B+ cumulative average in the center's courses. Each student accepted into the honors
program will have an honors faculty committee consisting of the student's advisor and one additional faculty member, which is responsible for final evaluation of the student's work. The honors committee must approve the thesis or project before May 1 of the student's junior year. The completed thesis or project should be filed with the student's faculty committee by May 10 of the senior year.

## Language Requirement

Courses in Swahili, Arabic, Yoruba, and Zulu may be used to satisfy the College of Arts and Sciences language requirement. In Swahili, successful completion of AS\&RC 202 satisfies Option 1. For Yoruba, successful completion of AS\&RC 203 satisfies Option 1. For Arabic, AS\&RC 212 and AS\&RC 312 satisfy Option 1. For Zulu, AS $\&$ RC 240 satisfies Option 1 AS\&RC majors are not required to take an African language, but the center recommends the study of an African language to complete the language requirement.

## ASARC 111/112(1104/1105) Elementary

 Arabic I and 11 (also NES 111/112[1201/1202])Fall/spring. 4 credits. M. Younes.
For description, see NES 111/112.

## Ass RC 113/212(1106/2101) Intermediate

 Arabic I and II (also NES
## 113/210[1203/2200])

Fall/spring. 4 credits. AS\&RC 212 @
satisfies Option 1. M. Younes
For description, see NES 113/210.

## AS\&RC 121/122(1108/1109) Introduction to Yoruba I and II

Fall/spring. 4 credits. A. Ademoyo. A two-semester beginner's course in Yoruba Language and Culture. Organized to offer Yoruba language skills and proficiency in speaking, reading, listening, writing, and translation. Focus is placed on familiar informal and formal contexts, e.g. home, school, work, family, social situations, politics, etc. Course uses Yoruba oral literature, proverbs, rhetoric, songs, popular videos, and theatre, as learning tools for class
comprehension. First semester focuses on conversation, speaking and listening. Second semester focuses on writing, translation and grammatical formation. Through the language course students gain basic background for the study of an African culture, arts, and history looth in the continent and in the diaspora. Yoruba language is widely spoken along the west coast of Africa and in some African communities in diaspora. Yoruba video culture, theatre, music, and arts have strong influence along the west coast and in the diaspora.

## AS\&RC 123(1110) Intermediate Yoruba I

## Fall. 4 credits. A. Ademoyo

The intermediate course extends the development of the main language skills, reading, writing, listening, and conversation. The course deepens the development of correct native pronunciation, the accuracy of grammatical and syntactic structures; and the idionatic nuances of the language. Students who take the course are able to (i) prepare, illustrate and present Yoruba texts such as poems, folktales, advertisements, compositions, letters, (ii) read Yoruba literature of average complexity, (iii) interpret Yoruba visual texts of average difficulty, (iv) comprehend Yoruba oral literature and philosophy-within the context of African oral
literature and philosophy-of basic
complexity. Through the Yoruba language students appreciate African oral literature and philosophy. The primary textual media are Yoruba short stories, poems, short plays, films, songs, and newspapers.

## AS\&RC 125(1125) Elem Arabic for Native

 Speaker (also NES 125[1205])Fall. 3 credits. M. Younes.
For description, see NES 125.
AS8RC 130(1130) Intro Quranic and Classical Arabic (also NES 133[1211], RELST 133[1211])
Fall. 4 credits. M. Younes.
For description, see NES 133.

## AS\&RC 131(1100) Swahili

Fall. 4 credits. Language lab times THAA. A. Nanji.

Beginner's Swahili. Part 1-Grammar for speaking, reading, and writing. Requires no knowledge of language. Swahili is spoken in the East and Central parts of Africa.

## AS\&RC 132(1101) Swahili

Spring. 4 credits. Prerequisite: AS\&RC 131 A. Nanji.

Continued study of the basic grammatical formation of the language and the introduction of reading material ranging from songs to short stories. A great many drills are used in this course to help develop the student's comprehension of the language. Swahili tapes are used during all of these sequences.

## AS\&RC 133(1102) Swahili

Fall. 4 credits. Prerequisites: AS\&RC 131
and 132. A. Nanji.
Advanced study in reading and composition.

## AS\&RC 140/141(1114/1115) Elementary

 Zulu I and IIFall/spring. 4 credits. S. Mkhonza. Zulu, known by native speakers as IsiZulu, is one of the 11 official languages of South Africa. Out of the four Nguni languages (Zulu, Xhosa, Swati, and Ndelele), Zulu is the most widely spoken. The advantage of learning IsiZulu is that it forms the basis for understanding the other Nguni languages. This is a two-semester elementary course which introduces students to the basic structures of the language which are applied to rapidly develop the primary speaking, reading, and writing skills of the Zulus. The class will also explore traditional and contemporary cultures of the Zulu people.

## AS\&RC 145(1116) Intermediate Zulu I

Fall. 4 credits. S. Mkhonza.
The course will help students to expand their understanding of the Zulu language through the communicative approach. We will focus on the four skills, speaking, listening, reading and writing. Intermediate work focuses on reading and speaking spontaneously. We will introduce composing in Zulu more reading.

## ASaRC 171(1600) Black Families and

 the Socialization of Black Children (SBA-AS)Fall. 3 credits. Faculty.
Examination of the evolution of the Black family from its roots in Africa, the evolution of family forms, the impact of social policy, and a consideration of the literature stressing family and child well-being. Among the major topics considered are male/fenale relationships, childbearing and parental roles, the extended family, and economic and health issues. The component of the course focusing
on youth primarily covers child and adolescent development.
AS\&RC 191(1300) Africa: The Continent and lis People 0 (HA-AS)
Fall. 3 credits. Faculty.
Introductory interdisciplinary course focusing on Africa's geographical, ecological, and demographic characteristics; indigenous institutions and values; the triple cultural heritage of Africanity, Islam, and Western civilization; main historical developments and transitions; and contemporary political, economic, social, and cultural change. Africa's ties with the United States (from trans-Atlantic slavery to the present), its impact on the emerging world order, and its contribution to world civilization are also explored.

## AS\&RC 202(2100) Swahili Literature ©

 (LA-AS)Fall. 4 credits. Satisfies Option 1.
Prerequisite: AS\&RC 134. A. Nanji.
Students gain mastery over spoken Swahili and are introduced to the predominant Swahili literary forms.

## ASPRC 203(1111) Intermediate Yoruba

 II ${ }^{-1}$Spring. 4 credits. Satisfies Option 1.
A. Ademoyo.

The Intermediate Yoruba II is a follow-up to Intermediate Yoruba I. It is a fourth semester Yoruba Language course. The course assists students to acquire advanced level proficiency in reading, speaking, writing and listening in Yonuba language. Students are introduced to grammatical and syntactic structures in the language that will assist them in describing, presenting, and narrating information in the basic tenses. At the end of the course, students will be able to listen to, process and understand programs produced for native speakers in media such as television, radio, films etc. They will be able to read and understand short stories, novels, plays written for native speakers of the language.

## ASARC 205(2300) African Cultures and

 Civilizations \# © (CA-AS)Spring, summer. 3 credits. A. Bekerie. Concerned with the peoples of Africa and the development of African cultures and civilizations from the earliest times to the present day. Focuses on the near modern civilizations of Africa south of the Sahara, and the ancient civilizations of Egypt and the Nile Valley, together with their contributions to the development of the major world civilizations. Also deals with the sociopolitical organization of African societies, their kinship systems, cross-cutting ties, rites of passage, gender relations, and arts (including music, clance, folklore, architecture, sculpture, painting, and body decoration).

## AssRC 212(2101) Intermediate Arabic II

 (also NES 210[2200])Spring. 4 credits. Satisfies Option 1.
M. Younes.

For description, see NES 210.
AS\&RC 231(2601) Afro-American Social and Political Thought (SBA-AS)
Spring. 3 credits. J. Turner.
This is an introductory course that reviews and analyzes the major theoretical and ideological formulations developed and espoused by African-Americans in the struggle for liberation. We focus specifically on the political philosophy and historical significance of Malcolm X, and the work and movement of Marcus Garvey, as the prime movers of
nationalism and pan-Africanism among Black people in this century. Such themes as slave resistance, nationalism, Pan-Africanism, emigration, anti-imperialism, socialism and internal colonialism, and the political and social views of Black women are discussed Black political thought is viewed in its development as responses to concrete conditions of oppression and expression.

ASaRC 240(1117) Intermediate Zulu II Spring. 4 credits. Satisfies Option 1. Prerequisite: AS\&RC 145. S. Mkhonza. The course will help students to expand their understanding of the Zulu language through the communicative approach. We will focus on the four skills, speaking, listening, reading and writing. Intermediate work focuses on reading and speaking spontaneously. It will also introduce students to culture and the idiom.

## ASaRC 256(2303) The Past and Present of Pre-colonial Africa (also HIST

 255[2550]) © (HA-AS)Spring. 4 credits. S. Greene.
For description, see HIST 255.

## ASaRC 277(2504) Literatures of the

 Black Atlantic (also ENGL 277[2770]) (LA-AS)Spring. 4 credits. D. Woubshet.
For description, see ENGL 277.
Asse 290(2602) The Sociology of the
African-American Experience (SBAAS)
Fall. 3 credits. J. Turner.
This is an introductory course to the field of Africana Studies. It assumes a historical/ sociological approach to the examination of the African-American experience. The course surveys the African beginnings of humankind and the classical role of Black people in world civilization and the making of early culture. The course treats issues in the humanities, social sciences, and history. The course is required for all undergraduate students majoring at the Africana Center.

## AssRC 301(3200) Politics of Clobal Africa (also AS\&RC 501[6200]) © (SBA-AS)

Fall. 3 credits. A. Mazrui.
How does the concept of "Global Africa" differ from the concept of "the Black World"? This course will combine the study of Africa with the study of two Diasporas. The Diaspora of Enslavement concerns enslaved Africans and descendants of slaves in both the Western and Eastern Diaspora. The Diaspora of Colonization concerns demographic dispersal as a result of colonialism. African Americans are in their majority part of the Diaspora of Enslavement. By contrast recent Algerian immigrants into France are part of the Diaspora of Colonization. Jamaicans and Trinidadians in Britain are a double-Diaspora-products of both enslavement and colonialism. This course will also examine the debate about whether the African peoples are owed reparations by either the West or the Arabs or both. African studies and Diaspora studies will converge. Africans of the soil belong to the African continent but not necessarily to the Black race. Africans of the blood belong to the Black race but not necessarily to the African continent. This course will address the following areas of comparative Black experience: the politics of race, gender, religion, liberation, language, civil rights and postcoloniality.

AS\&RC 308/312(3100/3101) Advanced Intermediate Arabic I and It (also NES $311 / 312[3201 / 3202])$ e
Fall/spring. 4 credits. ASERC 308 satisfies Option 1. M. Younes.
For description, see NES 311/312.

## As\&RC 310(3501) Introduction to African Art (also ART H 378[3510]) © (LA-AS)

Fall. 3 credits. S. Hassan.
Survey of the visual art and material cultural traditions of sub-Saharan Africa. Aims at investigating the different forms of visual artistic traditions in relation to their historical and sociocultural context. Explores the symbolism and complexity of traditional African art through the analysis of myth, ritual, and cosmology. Uses in-depth analysis of particular African societies to examine the relationship of the arts to indigenous concepts of time, space, color, form, and sociopolitical order. Also explores new and contemporary art forms associated with major socioeconomic changes and processes of assimilation and acculturation. These include tourist art, popular art, and elite art.

## AS\&RC 312(3101) Advanced Intermediate Arabic II (also NES 312[3202]) <br> Spring. 4 credits. D. Bakhri.

 For description, see NES 312.
## AS\&RC 375(1603) Black Child and

 Adolescent Development (also PSYCH 375[3750]) (SBA-AS)Spring. 3 credits. Faculty.
This course will survey Black child and adolescent development and focus on conceptual and theoretical aspects of psychological development within an African Diasporic context. In particular, we explore how Black culture and Black communities have been instrumental in shaping the lives of Black youth. Within this context, we will focus on how social identity (i.e. race, ethnicity, gender, social class, sexuality) and sociocultural factors relate to Black child and adolescent development. Specifically, we will examine the complexities of color in Black children's experience; socio-historical/-political contexts of Black child/adolescent development; parenting, racial socialization, and education for Black children and adolescents; racial attitudes and socialization in children; Impact of Hierarchical Social Structures on Youth of Color; Black adolescents and Black racial identity development; and contemporary models of psychological development for I3lack youth.

## AS\&RC 380(3300) African History:

Earliest Times to 1800 e" (HA-AS)
Fall. 3 credits. May be used for bistory requirement; satisfies geographical and bistorical breadth requirement.
A. Bekerie.

As the second largest continent with vast and varying geographical and sociocultural conditions combined with recently established fact as an original home of human species, Africa provides a rich and diverse oral and written early history. The course covers some of the major historical signposts from the origins of human species to 1800 . Among the topics for discussion are: Physical and Economic Geography of Africa, the Cradle of Humankind, the Peopling of Africa, Historical Perspectives and Sources, the Nile River Cultural Complex, Berber, Carthage and Maghreb of North Africa, Upper Guinea and Western Sudan of West Africa, cities of the

East African Coast, and Great Zimbabwe and other sites of Southern Africa.

## AS\&RC 404(4200) Afrocentricity:

 Paradigm and Critical Readings (CA-AS)Fall. 4 credits. A. Bekerie.
What is Afrocentricity? It is a theoretical framework designed to study and interpret the histories and cultures of peoples of Africa and African descent by locating them at the center of their experiences. In other words, it is a method of knowing the life experiences of African peoples from the inside out. The course examines-through the writings of Asante, Keto, Clarke, Jean, Myers, Amin, Mazrui, Gates, Appiah, Richards, Schlesinger, and Thiongo--the conception and depth of the paradigm, its relevance in the production and utilization of knowledge, particularly emancipatory knowledge, the history of the paradigm, and the debate it generates among a wide range of thinkers and scholars.
[AS\&RC 408(4504) Exhibiting Cultures (also AS\&RC 608[6508], ART H/AM ST 408[4508], ART H 608[6508]) (CAAS)
Fall. 4 credits. Next offered 2008-2009. C. Finley.

For description, see ART H 408.]

## As\&RC 409(4505) The Black Arts Movement: Art, Literature, Film, Music (also ART H 409/609 [4509/6509], AM ST 409/609 [4509/6509])

Fall. 4 credits. C. Finley.
For description, see ART H 409.
AS\&RC 410(4300) African American Polltics (also AS\&RC 611[6504]] (HA-AS)
Fall. 4 credits. J. Turner.
The central thesis of African-American politics has been its movements for political change and democratic access and human rights. This development since the seventeenth century is a complex political legacy. This course conducts a close study of African-American political practice and theoretical analysis of the American political system. Implications of the political systems for prospects and limitations to participation by Black people are analyzed. Critical historical stages in the process of Black politics are examined. The development of electoral offices in federal and statewide politics in critical industrial centers, as well as rural hamlets, center the course. Presidential politics-the Jesse Jackson campaigns-and new political formations including Black Republicans/conservatives constitute the emphasis on contemporary events. The course reviews the development of the literature in African-American politics.

ASanC 420(4605) Public Policy and the African-American Urban Community (SBA-AS)
Spring. 4 credits. J. Turner.
The socioeconomic conditions of the AfricanAmerican urban community are the central focus of the course. Community development models are explored in relationship to the social needs of the African-American population. The changing configuration of internal organization of the African-American community nationally is examined.

AS\&RC 426(4526) Rastafari, Race, and Resistance (also ART H 425[4525], VISST 425[4625])
Fall. 4 credits. P. Archer-Straw.
For description see ART H 425.

## AS\&RC 435(4502) African Cinema (also ART H 478[4578]) © (LA-AS)

Spring. 4 credits. S. Hassan.
This course offers an overview of African cinema and filmmaking. It surveys historically the evolution of African cinema from its early days to the present. Through screening of selected African films, different trends within African cinema will be explored, such as
"Return to the Sources" and the rediscovery of the pre-colonial past; the "Social Realist" narrative and critique of post-independence Africa; reconstructing the story of colonialism from the perspective of the colonized; and the entertainment genre. Techniques, styles, and aesthetics of African cinema will also be discussed. The course offers a unique opportunity of looking at African culture and society, and at issues of social change, gender, class, tradition, and modernization through African eyes.

## [AS\&RC 451(4600) Polltics and Social

 Change In the Caribbean © (SBA-AS)Fall. 4 credits. Next offered 2008-2009.
L. Edmondson.

Study of the historical, geostrategic, political, economic, and social (including racial and cultural) forces affecting the domestic and international experiences of Caribbean societies.]

## AS8RC 459(4601) Education Innovation in Africa and the Diaspora (also EDUC 459[4590]) © (SBA-AS)

Fall. 4 credits. N. Assiê-Lumumba. This course deals with educational innovations geared to promoting equal opportunity based on gender, race and class, in Africa and the African Diaspora. After an introduction of the concepts of education and innovations and the stages of innovation as planned change, the course focuses on concrete historical and contemporary cases of educational innovations. The case studies in the United States include the creation and expansion of historically black institutions such as Lincoln University, Spelman College, Tuskegee Institute (now Tuskegee University), and other schools in the South, and the Westside Preparatory School in Chicago. The African cases studied include African languages for instruction with a focus on a Nigerian case, Ujamaa and education for self-reliance in Tanzania, and the case of Cote d'Ivoire, which adopted television as a medium of instruction.
AS\&RC 463(4201) Islam in Africa and Its Diaspora (CA) (also NES 471 [4710], AS\&RC 663[4205]) (CA-AS)
Spring. 4 credits. A. Mazrui.
It has been estimated that one-third of the Muslim population of the world is in Africa and the African Diaspora. This course addresses the historical dimension of Islam in the Black experience examining Global Africa as a whole. Within the African continent, Islam is part of the triple religious heritage, which includes rivalry with Christianity and co-existence with African indigenous religions. In the Americas, Islam is up against Western secularism and Christianity. We are concerned with how Islam has affected the politics and cultures of the African peoples worldwide, issue of slavery and Islam, and the interaction between Islam and contemporary ideologies
of socialism, nationalism and race consciousness in the Black experience.

## AS\&RC 468-469(4900-4901) Honors

 Thesis468, fall; 469, spring. Prerequisite: permission of AS\&RC director of undergraduate studies. Africana Center faculty.
For senior Africana Studies majors working on honors theses, with selected reading, research projects, etc., under the supervision of a member of the Africana Studies and Research Center faculty.

## AS\&RC 478(4606) The Family and Society In Africa (also SOC 478[4780]) © (SBA-AS)

Fall. 4 credits. N. Assié-Lumumba. The family, as a social institution, is structured according to historical, socioeconomic, political, and cultural factors. Course topics include the concepts of the nuclear and extended family, the roles, rights and obligations of different age groups and generations; and marriage and its related issues, including parenthood, child rearing, and gender roles. Other issues examined are reproductive health, family planning, sexuality and fertility (particularly during adolescence), family codes, and legal implications. The course deals also with structural change and continuity, the impact of westernization, urbanization, formal education, and the contemporary economy on the structure and challenges of the family in Africa. Finally, the legacy of African family values and traditions in the African Diaspora, with a focus on the African-American experience, is discussed.

## AS\&RC 479(4602) Women and Gender

 Issues in Africa © (SBA-AS)Spring. 4 credits. N. Assiê-Lumumba. There are two contrasting views of the status and role of women in Africa. One view portrays African women as dominated and exploited by men. According to another view women have a favorable social position in Africa: indigenous ideologies consider women to be the foundation of society, they are economically active and independent and they have an identity independent of men. In this seminar we discuss the status and role of women in Africa historically as well as in the contemporary period. Topics include women in non-westernized/precolonial societies; the impact of colonial policies on the status of women; gender and access to schooling, participation in the economy and politics; women and the law; women and health issues; gender issues in southern Africa; womanism and feminism; the United Nations Decade of Women; and the four World Conferences on Women (Mexico 1975, Copenhagen 1986, Nairobi 1985, and Beijing 1995).

## ASERC 484(4603) Politics and Social Change In Southern Africa ${ }^{\text {(3) }}$

 (SBA-AS)Spring. 4 credits. L. Edmondson. Focuses on the legacies of apartheid and the challenges of transformation toward a postapartheid society in South Africa. Topics include the rise and decline of apartheid; the historical continuity of Black resistance against racism; women under, against, and after apartheid; South Africa's relations with its neighbors; geo-political, economic, and racial dimensions of the American connection; politics of negotiation and transition to majority rule; prospects for stability,
democracy, and equality; and South Africa's new role in the African continental and global arenas. Instructor's lectures are supplemented by films and class discussions.

## AS\&RC 490(4302) Nile Valley Civilization:

 Ethiopla, Nubia, and Egypt © (HA-AS) Spring. 4 credits. A. Bekerie.Focuses on Nile Valley civilizations and their contributions to African and world history. Since natural and human resources provide the foundation for civilizations, the course also examines the ecological and cultural compositions of the river. Concentrates on the Aksumite civilization of Ethiopia, Nubian civilizations of the Sudan, and the Kemetic civilizations of Egypt. Uses archaeological, literary, oral, biological, and religious sources to study civilization centers along the Nile. Students discuss civilizations as artifacts that have material, spiritual, social, and philosophical dimensions. Students are introduced to the Ethiopic writing system as a practical lesson in the conception and understanding of aspects of African civilizations.

## AS\&RC 491(4911) Honors Seminar I (also ENGL 491[4910])

Fall. 4 credits. W. Woubshet.
For description, see ENGL 491 [4910].
AS\&RC 498-499(4902-4903) Independent Study
498, fall; 499, spring. Africana Studies
faculty.
For students working on special topics, with selected reading, research projects, etc., under the supervision of a member of the Africana Studies and Research Center faculty.

## AS\&RC 501(6200) Global Africa-Black

Experience (also AS\&RC 301[3200])
Fall. 4 credits. A. Mazrui.
For description, see AS\&RC 301

## AS\&RC 502(6600) Education and Development in Africa

Spring. 4 credits. N. Assié-Lumumba. Human capital theory establishes a positive and linear relationship between formal education and individual productivity and socioeconomic attainment and economic growth and development of nations. While enjoying considerable popularity in industrial and developing countries, including African countries, education has also been perceived as a hindrance to development. The concept of human capital and paradigms of development including modernization, dependency, and Third World Forum are first introduced. Specific issues discussed include schooling and nonformal education; the role of primary, secondary, and higher education in development; and language, access, output, and outcome based on social class, ethnicity, race, and gender. Employment, migration and international brain drain, the information and communication technologies, indigenous knowledge systems, and the role of higher education in regional and international cooperation are also examined.

## AS\&RC 503(6506) African Aesthetics

 [also ART H 571[5571]]Spring. 4 credits. S. Hassan. The goal of this course is to investigate in depth the principles of aesthetics and philosophy of African visual arts. The course offers a critical survey of the different writings and the growing body of research on this relatively new area of inquiry. The objectives of the course are to review how African
aesthetics have been studied to date, to provide a critical analysis of the different approaches to the subject and related issues, and to suggest future directions of research. In-depth analysis of particular African societies is used to examine the relationship of arts and aesthetics to indigenous concept of time, space, color, form, and sociopolitical order. In addition, issues related to African aesthetics and arts such as style, gender, class, and social change are also explored.

## [AS\&RC 504(6201) Political Change in Africa (also AS\&RC 311 [3600]) SBA-AS)

Spring. 4 credits. Next offered 2008-2009. A. Mazrui.

The study of African can be approached dialectically (focusing on the tension between opposing forces) or thematically (focusing on themes as chapters of experience).]

AS\&RC 506(6500) Contemporary African Dlaspora Art (also ART H 506[5505])
Spring, 4 credits. C. Finley
For description, see ART H 506.
AS\&RC 598-599(6900-6901) Independent Study
598, fall; 599, spring. Variable credit.
Prerequisite: graduate standing. Africana Studies faculty.

AS\&RC 601-602(6902-6903) Africana Studies Graduate Seminar
601, fall; 602, spring. 4 credits. Africana Studies faculty.
Designed for first-year AS\&RC graduate students. The seminar is coordinated and supervised by one professor but team-taught by three or four faculty members per semester. Each participating faculty member is responsible for a topical segment of the course related to her or his areas of specialization or an area of interest pertaining to theory and methodology of Africana Studies.

## [AS\& RC 608(6508) Exhibiting Cultures

 (also AS\&RC 408[4504], ART H 408[4508], ART H 608[6508])Fall. 4 credits. Next offered 2008-2009. C. Finley.

For description, see ART H 608.]

## AS\&RC 609(6509) The Black Arts Movement: Art, Literature, Film, Music (also ASaRC 409[4505], ART H 409/609[4509/6509], AM ST 409/609[4509/6509])

Fall. 4 credits. C. Finley
For description, see ART H 609.

## AS\&RC 611(6301) African American

 Politics (also AS\&RC 410[4300])Fall. 4 credits. J. Turner.
African American Politics and the American Electoral System. Fashioning a politics of freedom and social justice has been/is a distinctive character of African American History. Black Politics is informed by a tradition, constructed to promote agency and advocacy for social change, to transform the architecture of racialized social orders by which to achieve a non-racial polity. Universal, unqualified democratic rights are a core principle of Black Politics. Protest and opposition to exclusion from the political processes, and movement for participatory democracy are central to African American political cultural. Ideological formulations are contextualized by the objectives of anti-racism, self-determination, human rights, equality and
unfettered participation in all aspects of civil society. African Americans have fostered social movements to redefine constitutional law and reform political practice in the country. Therefore, Black Politics has constituted the leading force for Civil Rights. The quest for universal freedom, however, posed a fundamental contradiction in the Bill of Rights, Preamble to the Constitution, and the legal institution of racial slavery and apartheid that were largely definitive of United States political history.

## ASRRC 615(6604) Psychology of Black Identity (also FGSS 615[6150])

Spring. 4 credits. Faculty.
This course will provide students with an opportunity to examine the psychology of Black identity with a focus on critical works in this area (i.e., Daryl Michael Scott's Contempt and Pity: Social Policy and the Image of the Damaged Black Psyche, 1880-1996, William E. Cross, Jr.'s Shades of Black: Diversity in African-American Identity, Tiffany Patterson's Zora Neale Hurston and the History of Southern Life, Thomas Glave's Words to Our Now: Imagination and Dissent). Earlier work on Black identity focused on a Black selfhatred theme, locating Black identity in a self-hatred/deficit paradigm. With the advent of socio-historical and -political movements (i. e., Civil Rights and Black Power Movements), critical work on Black identity began to (re)emerge in the field of Black psychology. Through the development of Nigrescence, or the developmental process of becoming Black, Black racial identity theory has moved in the direction of exploring how Black identity influences Black people's perceptions, mental health, and behavior. In this course, students will examine a range of topics including theorizing Black identity in the African Diaspora; conceptualizing the psychology of Black identity in historical perspective; the intersection of Black, gender, and queer identities; Black identity and the psychology of Nigrescence; Black aesthetics; the impact of Black dialect on the identity and culture for Black youth

## AS\&RC 620(6602) Black Communities and Politics and Health (also FGSS 621[6210], HD 622[6220])

Fall. 4 credits. Faculty.
This course will provide sudents with an opportunity to examine how socio-historical, -political, and -economic social structures have an impact on the politics of health in Black communities. Specifically, major health topics will focus on critical works in this area (i.e., Darlene Clark Hine's Black Women in White: Racial Conflict and Cooperation in the Nursing Profession, 1890-1930, Cathy Cohen's Boundaries of Blackness: AIDS and the Breakdown of Black Politics, Angela Davis' Are Prisons Obsolete? Dorothy Roberts' Sbattered Bonds: The Color of Cbild Welfare, Wesley Crichlow's Buller Men and Batty Bwoys: Hidden Men in Toronto and Halifax Black Communities). Building on a critical approach to the field of health, a critical emphasis will be placed on how power relations structure organizations and communities within their broader socio-historical, -political, -economic, and -cultural contexts. Students will engage in critical analysis and thoughtful reflection in exploring and challenging their values, assumptions, perceptions, and biases related to health care, as well as a critique of service of micro- and macro sociopolitical processes that influence asymmetrical power
relationships in Black communities (i.e., role of medical authority, development and professionalization of medicine).

## AS\&RC 663(4205) Islam in Africa and Its

 Diaspora (also AS\&RC 463[4201], NES 671[6710])Spring. 4 credits. A. Mazrui.
For description, see AS\&RC 463.
AS\&RC 698-699(8900-8901) Thesis
698, fall; 699, spring. Prerequisite: AS\&RC graduate students. Africana Studies faculty.

## AKKADIAN

See "Department of Near Eastern Studies."

## AMERICAN STUDIES

N. Salvatore, acting director; G. Altschuler, E. Baptist, R. Bensel, S. Blumin, M. P. Brady, D. Chang, E. Cheyfitz, J. Cowie, J. Frank, J. E. Gainor, M. C. Garcia, F. Gleach, S. Haenni, A. Hammer, R. Harris, M. JonesCorrea, K. Jordan, M. Kammen, M. Katzenstein, J. Kirschner, R. Kline, I. Kramnick, C. Lai, F. Logevall, T. J. Lowi, B. Maxwell, K. McCullough, L. L. Meixner, R. Mize, R. L. Moore, V. Nee, M. B. Norton, J. Parmenter, R. Polenberg, S. Pond, A. Sachs, N. Salvatore, S. Samuels, M. E. Sanders, V. Santiago-Irizarry, M. Shefter, A. Simpson, A. M. Smith, T. Tu, S. Villenas, N. WaligoraDavis, M. Washington, S. Wong, M. Woods, D. Woubshet. Affiliated faculty: J. E. Bernstock, M. Hatch, J. Jennings, J. Peraino, P. Sawyer. Emeritus: J. Brumberg, D. E. McCall, J. Silbey

## The Major

The major in American Studies, appropriate for a wide array of future professions, began as a program of coordinated study in the history, literature, and politics of the United States. These remain the core elements, but American Studies aims to be inclusive in its subject matter. Given the nation's diverse population and cultures, the program wants its majors to examine American experience in broad terms, drawing on the materials and methods of a variety of disciplines.
Students who contemplate becoming American Studies majors are encouraged to speak with the program director as early as possible to arrange for a major advisor.

All students majoring in American Studies must take a minimum of 12 courses selected from the American Studies roster. No more than six of these courses can come from any one discipline. Of the 12 courses at least three must have a substantial focus on material before 1900 , at least two must deal with American diversity (AM ST 109 and 110 are especially recommended), and at least one must be a 400 -level seminar, either an American Studies 430 course or an appropriate substitute seminar at the 400 level (AM ST 500/501, taught in Washington, D.C., does not fulfill the seminar requirement though it counts as one course toward the major). Note: A single course may satisfy more than one of these requirements: e.g., a course on Native Americans in the 1800 s is both a course dealing substantially with pre-1900 material and one dealing with American diversity.

Although a good bit of freedom is encouraged in the selection of courses, American Studies majors, in consultation with their advisor, must define an area of concentration and complete six courses in that area. The area of concentration can be designed to fit the particular interests of a student, but it must include subjects in at least two disciplines. Possible areas of concentration include "visual studies," "cultural studies," "race and ethnicity," "legal and Constitutional studies," "American institutions," "class and social structure," "the American environment." (Courses taken to satisty the concentration may be used to fulfill other requirements for the major.)
Students may find courses relevant to American experience that they wish to take but that are not on the American Studies course list. With their advisor's approval, students may count two such courses toward fulfilling the major.

## Honors

Candidates for honors must maintain an average of $B+$ in courses pertinent to the major and have taken at least one course in which they wrote a research paper. Normally, at the end of the junior year students who wish to write a senior honors essay must approach a member of the American Studies faculty and discuss their ideas for a project. With approval from the faculty member students may then register in the fall of their senior year for AM ST 493, the honors essay tutorial. At the end of the fall semester, honors candidates meet with their advisor and a second member of the American Studies faculty to discuss their progress. If satisfactory, honors students complete their honors essays in the spring by enrolling in AM ST 494.

## American Studies 430 Seminars

AM ST 430.02(4302) Topics in American Studies (also HIST $411[4111]$ )
Fall. 4 credits. Prerequisite: permission of instructor. E. Baptist.
Topic for fall 2007: South as an American Problem. This seminar will study the development of ideas about masculinity, femininity, blackness, and whiteness in the U S. South from early settlement to the U.S. Civil War. We will discuss illicit sexuality, the origins of racism, interracial sex, violence, resistance, power, exploitation, and how the ideas and structures of power these phenomena helped generate shaped the everyday lives of African and European settlers and their descendants, even to the present day.

## AM ST 430.05(4301) The Rabinor Seminar (also ENGL 430[4030])

Fall. 4 credits. Prerequisite: permission of instructor. S. Samuels.
The Rabinor Seminar explores the role of diversity in the formation of a distinct American tapestry. The specific topic varies each year, but the general subject is the promise and experience of pluralism. Topic for fall 2007: This class looks at concepts of nationalism and violence in the 19th-century United States. Such concepts will engage further categories such as race, class, gender, and sexuality. We will inquire how these categories might appear folded in to the contours of landscapes of nationalism and violence. We might be overwhelmed with "folding in" genocide, imperial seizures, free-for-all modes of slaughter (of animals, of
humans), and general unabashed dehumanization. In addition to literary texts, we will ask about abstractions such as the violence of representation, questions of vision that engage Roland Barthes' articulation of sight as piercing, and American literature's normative organizing through the piercing violence of the gaze. Possibly we will also ask about legal violence in the law's rhetoric of personhood and non-personhood during the 19th century.
AM ST 430.06(4300) The Milman Seminar Fall. 4 credits. Prerequisite: permission of instructor. G. C. Altschuler.
The Milman Seminar: Baseball in American Culture. Through a reading of fiction and nonfiction, we examine the role of baseball as it has shaped and reflected the attitudes and values of Americans. Novels assigned in the course include Bernard Malamud, The Natural: Mark Harris, Bang the Drums Slowly; Philip Roth, The Great American Novel; and Robert Coover, The Universal Baseball Association. Nonfiction works may include Neil Lanctot, Negro League Basehall, Roger Kahn, The Boys of Summer, and Andrew Zimbalist, Baseball and Billions. Each student in the course writes a 25 - to 35 -page research paper.

## AM ST 430.07(4305) Topics in American Studies (also GOVT 405[4051])

Spring. 4 credits. Prerequisite: permission of instructor. D. Rubenstein.
Topic for spring 2008: The Postmodern Presidency. This course will examine the presidencies of Reagan, G.H.W. Bush, Clinton, and G. W. Bush in relation to what scholars have called "the postmodern presidency." While this term has been utilized by institutionalist students of the presidency as a periodizing hypothesis, our emphasis will be on the work of cultural critics and historians. We will address the slippage between fact and fiction in cinematic and popular representations of the presidency (biography, novels, television). The construction of gender normativity (especially masculinity) will be an attendant subtheme. The postmodern presidency will be read as a site of political as well as cultural contestation. The larger question of this approach to the presidency concerns the relationship between everyday life practices and citizenship as well as the role of national fantasy in American political culture today.
AM ST 430.08(4306) Topics in American Studies (also ART H 461[4761])
Spring. 4 credits. Prerequisite: permission of instructor. L. L. Meixner.
Topic for spring 2008: American Art and the Machine. Seminar examining early modernism in America with a particular emphasis on the machine, mechanical reproduction, and moving images including film and television Machine is defined in the broadest sense to mean the artist, city, camera, department store, and its consumer by-products including pictorial monthlies such as Life, advertisements, comic books, and political cartoons. Themes include women as urban spectacles, photography, "slumming," and social surveillance, early cinema and working class women, comic books and censorship, the construction of the "American family" through early TV sitcoms, and the 1940s genre of "women's films." Films include those of Chaplin, Hitchcock, and Bette Davis.

## Anthropology, Sociology, and Economics

[AM ST 221(2721] Anthropological Representation: Ethnographies of Latino Culture (also ANTHR/LSP 221[2721])<br>3 credits. Next offered 2008-2009.<br>V. Santiago-Irizarry.]

[AM ST 231(2300) Latino Communities (also D SOC/LSP 230[2300])
credits. Next offered 2008-2009. R. Mize.
For description, see D SOC 230.]
AM ST 235(2350) Archaeology of North American Indians (also AIS 235[2350], ANTHR 235[2235], ARKEO 235[2235])
Spring. 4 credits. K. Jordan.
For description, see ANTHR 235.
AM ST 353(3453) Anthropology of Colonialism (also AIS 353[3530], ANTHR 353[3453])
Fall. 4 credits. A. Simpson.
For description, see ANTHR 353
AM ST 375(3750) Comparative Race and Ethnicity (also D SOC/LSP 375[3750]
Spring. 4 credits. R. Mize.
For description, see D SOC 375.
AM ST 377(3777) The United States (also ANTHR/LSP 377[3777])
Fall. 4 credits. V. Santiago-Irizarry.
For description, see ANTHR 377.
AM ST 451(4510) Multiculturalism and Education (also EDUC 451[4510], LSP 451[4510])
Fall. 3 credits. S. Villenas.
For description, see EDUC 451
[AM ST 472(4272) Historical Archaeology (also AM ST 672[6272], ANTHR $472 / 772[4272 / 7272]$, ARKEO 472/772[4272/7272])
4 credits. Next offered 2009-2010.
K. Jordan.

For description, see ANTHR 472.]
AM ST 642(6424) Ethnoracial Identity in Anthropology, Language, and Law (also ANTHR 624[6424], LSP 624[6424], LAW 723[7231])
Spring. 4 credits. V. Santiago-Irizarry.
For description, see ANTHR 624.
[AM ST 672(6272) Historical Archaeology (also AM ST 472[4272], ANTHR 472/772[4272/7272], ARKEO 472/772[4272/7272])
4 credits. Next offered 2009-2010.
K. Jordan.

For description, see ANTHR 472.]

## Literature and Theatre Arts

AM ST 101(1101) Introduction to American Studies \# (LA-AS)
Fall. 4 credits. B. Maxwell.
This course is an introduction to interdisciplinary considerations of American culture. We will reflect on topics ranging from Native American relations to the land, to the European conquest of the Americas, to the development of American civic life and political culture and the ongoing African American struggle for freedom and equality. We wilt also study immigration as a (threatened) constant in national life and labor, the distinctions between mass culture and popular culture, the promise of American life, and violence as a persisting national woe.

We'll examine these themes through literature, historical writing, music, art, film, architecture, and political economy in the United States. The course will also give attention to the many methods through which scholars have, over time, developed the discipline of American Studies, and to ongoing debates over the intellectual and political stakes of those methods.

## AM ST 206(2030) Introduction to American Literature (also ENGL 203[2030])

Fall. 4 credits. E. Cheyfitz
For description, see ENGL 203.
AM ST 207(2040) Introduction to American Literature (also ENGL 204[2040])
Spring. 4 credits. D. Woubshet For description, see ENGL 204.
[AM ST 215(2150) Comparative American Literature (also COM L. 215[2150])
4 credits. Next offered 2008-2009.
B. Maxwell.

For description, see COM L 215.]

## AM ST 219(2060) The Great American

 Cornell Novel (also ENGL 206[2060])Spring. 4 credits. J. Carlacio.
AM ST 230(2760) Survey of American FIIm (also FILM 276[2760], VISST 230[2300]) (LA-AS)
Fall. 4 credits. Each student must enroll in a section and attend one screening per week. S. Haenni.
Focusing mostly on Hollywood film, this course surveys some major developments in and approaches to 20th-century American cinema. We trace changes in film aesthetics and film style, the development of the American cinema as an institution that comprises an industrial system of production, social and aesthetic norms and codes, and particular modes of reception. The course introduces methodological issues in American film history-especially questions of narrative, genre, stardom, and authorship-and focuses on the ways film shapes gender, race, class, ethnic, and national identities. Screenings include work by D. W. Griffith, John Ford, Howard Hawks, Alfred Hitchcock, and others and are supplemented by readings in film criticism and history.

## [AM ST 252|2510] 20th-Century Women Writers (also ENGL/FGSS 251[2510])

4 credits. Next offered 2008-2009.
E. DeLoughrey.

For description, see ENGL 251.]
[AM ST 253(2520) Late 20th-Century Women Writers and Visual Culture (also ENGLVISST 252[2520])
4 credits. Next offered 2008-2009.
For description, see ENGL 252.]
[AM ST 260(2600) Introduction to American Indian Literature (also ENGL 260[2600])
4 credits. Next offered 2008-2009.
E. Cheyfitz.

For description, see ENGL 260.]
AM ST 262(2620) Asian American Literature (also ENGL/AAS 262[2620])
Spring. 4 credits. S. Wong.
For description, see ENGL 262.
[AM ST 268(2680) The Culture of the 1960s (also ENGL 268[2680])
Fall. 4 credits. Next offered 2008-2009. P. Sawyer.

For description, see ENGL 263-1
AM ST 305(3050) American Abroad lalso ENGL 352[3520], FILM 305[3050])
Spring. 4 credits. S. Haenni.
How have fiction and film portrayed
Americans abroad? How are international engagements represented? How do international encounters change the way we think about being American? This course seeks to construct one possible history and genealogy of American encounters abroad, as portrayed in fiction and film. We will focus on particular geographical areas (e.g. Americans in Northern Africa or the Middle East). We will examine how different events and modalities of traveling and living abroad have provided paradigms for thinking about international encounters. Possible topics include how war (World War II, Vietnam), drug trafficking, terrorism, tourism, exploration, colonization, expatriatism and cosmopolitanism have shaped the ways we think about Americans abroad; how different genres-satire, the spy film, the Western-have represented international encounters; and how international encounters are experienced by members of minority groups. We will focus on both cinematic encounters (from early-20thcentury travelogue films, to war films le.g., Casablanca] to contemporary cinema [e.g., Lost in Translation, and on fictional examples (e.g., Mark Twain, Henry James, etc.). Our discussions of films and novels will be guided by readings in cultural history and cultural theory.

## [AM ST 335(3370) Contemporary

 American Theatre (also THETR 337[3370])Fall. 4 credits. Next offered 2008-2009. S. Warner.

For description, see THETR 337.]
AM ST 338(3440) American Film Melodrama (also FILM/ENGL 344[3440])
Spring. 4 credits. S. Haenni
For description, see FILM 344.
[AM ST 348(3480) Film Noir (also FILM $346[3460$ ], VISST 348[3480]] (LA-AS)
4 credits. Recommended: some course
work in film. Next offered 2008-2009.
S. Haenni.

Focuses on Hollywood films of the 1940s/1950s known for their stylishness and commentary on the dark side of American life, and on "neo-noir" from the 1970s to the present. Considers stylistic aspects and cultural contexts.]
AM ST 359(3600) Another World Is Possible: The American Left Since the 1960s (also ENGL 360[3600])
Fall. 4 credits. P. Sawyer.
For description, see ENGL 360.
AM ST 361(3610) Studies in the Formation of U.S. Literature (also ENGL 361[3610])
Spring. 4 credits. D. Fried.
For description, see ENGL 361
AM ST 363(3630) Studies in U.S. Literature Before 1950: The Age of Realism and Naturalism (also ENGL 363[3630])
Spring. 4 credits. K. McCullough
For description, see ENGL 363.
[AM ST 364(3640) Studies in U.S. Literature after 1850 (also ENGL 362[3620])
4 credits. Next offered 2008-2009.
N. Waligora-Davis.

For description, see ENGL 362.]
[AM ST 365(3650) American Literature Since 1945 (also ENGL 365[3650])
4 credits. Next offered 2008-2009.
B. Maxwell.]
[AM ST 366(3660) Studies in U.S. Fiction before 1900: The 19th-Century American Novel (also ENGL 366[3660])
4 credits. Next offered 2008-2009.
S. Samuels.

For description, see ENGL 366.]
AM ST 367(3670) Studies in U.S. Fiction after 1900: 20th-Century American Fiction: Major Movements and Writers (also ENGL 367[3670])
Fall. 4 credits. M. P. Brady.
For description, see ENGL 367.
AM ST 373(3620) Studies in U.S. Literature After 1950 (also ENGL 364[3640])
Spring. 4 credits. L. Donaldson.
For description, see ENGL 364.
AM ST 374(3681) Slavery in 20th-Century American Film and Fiction (also ENGL 374[3740])
Spring. 4 credits. N. Waligora-Davis.
For description, see ENGL 374.
AM ST 393(3930) International Film of the 1970s (also FILM 393[3930], VISST 393[3930])
4 credits. S. Haenni.
For description, see FlLM 393.
[AM ST 395(3970) Policing and Prisons in American Culture (also ENGL 397[3970]
4 credits. Next offered 2008-2009.
B. Maxwell.

For description, see ENGL 397.]
[AM ST 396(3981) Latino/a Popular Cultural Practices (also ENGL/LSP 398[3980])
4 credits. Next offered 2008-2009.
M. P. Brady.

For description, see ENGL 398.]
[AM ST 403(4030) Senior Seminar in Poetry: Studies In American Poetry: 1955-1980 (also ENGL 403[4030])
4 credits. Next offered 2008-2009.
R. Gilbert.

For description, see ENGL 403.]
AM ST 467(4670) Black Manhattan:
1919-1940 (also ENGL 467[4670])
Fall. 4 credits. N. Waligora-Davis.
For description, see ENGL 467.
[AM ST 468(4780) Intersections in Lesbian Fiction (also ENGL 478[4780], FGSS 477[4770])
4 credits. Next offered 2009-2010.
K. McCullough.]

AM ST 469(4690) The Paranoid Style in Contemporary American Fiction and Film (also ENGL 469[4690])
Spring. 4 credits. K. Attell.
For description, see ENGL 469.
[AM ST 475(4750) Seminar in Cinema I (also FILM 475[4750])
4 credits. Next offered 2008-2009.
D. Fredericksen.

For description, see FILM 475.]
[AM ST 477(4600) Melville (also ENGL 477[4600])
Fall. 4 credits. Next offered 2008-2009. B. Maxwell.

For description, see ENGL 477.]
AM ST 665(6650) Race, Gender, and Crossing Water in 19th-Century America (also ENGL 665[6650])
Spring. 4 credits. S. Samuels.
For description, see ENGL 665.

## Government and Public Policy

GOVT 111(1111) Introduction to American Government and Politics
Fall. 3 credits. T. Lowi.
Introduction to government through the American experience. Concentration on analysis of the institutions of government and politics as mechanisms of social control.
[AM ST 302(3021) Social Movement in American Politics (also GOVT 302[3021])
Fall. 4 credits. Next offered 2008-2009.
M. E. Sanders.

For description, see GOVT 302]
AM ST 311(3111) Urban Politics (also GOVT 311[3111])
Fall. 4 credits. M. Shefter.
For description, see GOVT 311.
[AM ST 313(3191) Racial and Ethnic Politics (also GOVT 319[3191], LSP 319 [3191])
4 credits. Next offered 2008-2009.
M. Jones-Correa.

For description, see GOVT 313.]
AM ST 315(3141) Prisons (also GOVT 314[3141])
Fall. 4 credits. M. Katzenstein.
For description, see GOVT 314.
[AM ST 316(3161) The American Presidency (also GOVT 316[3161])
4 credits. Next offered 2008-2009.
M. E. Sanders.

For description, see GOVT 316.]
AM ST 319(3181) The U.S. Congress (also GOVT 318[3181])
Spring. 4 credits. M. Shefter.
For description, see GOVT 318.
[AM ST 326(3031) Imagining America: Race and National Fantasy in European Travel Writing from De Tocqueville to Baudrillard (also GOVT 303[3031]) (CA-AS)
4 credits. Next offered 2008-2009.
D. Rubenstein.]
[AM ST 362(3655) Politics and Literature (also GOVT 365[3655])
4 credits. Next offered 2008-2009. J. Frank. For description, see GOVT 365.]
[AM ST 376(3665) American Political Thought from Madison to Malcolm X (also GOVT 366[3665], HIST 316[3160])
4 credits. Next offered 2008-2009.
I. Kramnick.

For description, see GOVT 366.]
[AM ST 389(3911) Science in the American Polity, 1960 to Now (also S8TS 391[3911], GOVT 309[3091])
4 credits. Next offered 2008-2009. J. Reppy
For description, see S\&TS 391.]
AM ST 404(4041) American Political Development in the 20th Century [also AM ST 612[6121], GOVT 404/612[4041/6121])
Fall. 4 credits. M. E. Sanders.
For description, see GOVT 404.
[AM ST 406(4061) The Politics of SlowMoving Crises (also AM ST 616[6161], GOVT 406[4061], GOVT 616[6161])
4 credits. Next offered 2008-2009.
M. Jones-Correa.

For description, see GOVT 406.]
AM ST 415(4142) Causes and
Consequences of U.S. Foreign Policy
(also GOVT 414/614[4142/6142],
AM ST 614[6142])
Spring. 4 credits. E. Sanders.
For description, see GOVT 414.
[AM ST 422(4201) War at Home (also GOVT 420[4201])
Fall. 4 credits. Next offered 2009-2010. M. Shefter.

For description, see GOVT 420.1
[AM ST 424|4241] Contemporary American Politics (also AM ST 624[6291], GOVT 424/624[4241/6291])
Spring. 4 credits. M. Shefter.
For description, see GOVT 424.
[AM ST 425(4231) The 1960s: Conceptualizing the Future from the Past (also GOVT 423[4231])
4 credits. Next offered 2008-2009.
J. Kirshner and T. Lowi.

For description, see GOVT 423.]
AM ST 428(4281) Government and Public Policy: An Introduction to Analysis and Criticism (also AM ST 628[6281], GOVT 428/728[4281/7281]]
Fall. 4 credits. T. Lowi.
For description, see GOVT 428.
[AM ST 458(4585) American Political Thought (also AM ST 658[6585], GOVT 458/658[4585/6585])
4 credits. Next offered 2008-2009. J. Frank.
For description, see GOVT 458.]
AM ST 459(4635) Feminist Theory/Law and Society (also GOVT 463[4635])
Fall. 4 credits. A. M. Smith.
For description, see GOVT 463.
AM ST 460(4625) Sexuality and the Law (also AM ST 660[6625], GOVT 462/762[4625/7625], FGSS
461/762(4610/7620])
Spring. 4 credits. A. M. Smith.
For description, see GOVT 462.
AM ST 461(4616) Interpreting Race and Racism: DuBols (also GOVT 461(4616])
Spring. 4 credits. A. M. Smith.
For description, see GOVT 461
AM ST 480(4809) Politics of '70s Film (also GOVT 480[4809])
Spring. 4 credits. J. Kirshner.
For description, see GOVT 480.

AM ST 501(4998) Politics and Policy: Theory, Research, and Practice (also CAPS 500[5000], GOVT 500[4998],
ALS 500[4998], PAM 406[4998]]
Fall and spring. 8 credits each semester.
S. Jackson.

Offered in Cornell in Washington Program.
This course, taught in Washington, D.C., forms the core of the public policy option of the Cornell in Washington Program.

AM ST 612(6121) American Political Development in the 20th Century (also GOVT 404/612[4041/6121], AM ST 404[4041])
Fall. 4 credits. E. Sanders.
For description, see GOVT 404
AM ST 614(6142) Causes and Consequences of U.S. Foreign Policy (also GOVT 414/614[4142/6142], AM ST 415[4142])
Spring. 4 credits. E. Sanders.
For description, see GOVT 414.
[AM ST 616(6161) Politics of SlowMoving Crises (also AM ST 406[4061], GOVT 406/616[4061/6161]]
4 credits. Next offered 2008-2009.
M. Jones-Correa.

For description, see GOVT 406.J
AM ST 620(6202) Political Culture (also GOVT 620[6202])
Fall. 4 credits. R. Bensel.
For description, see GOVT 620.

## AM ST 624(6291) Contemporary American Politics (also AM ST 424[4241], GOVT <br> 424/624[4241/6291]) <br> Spring. 4 credits. M. Shefter. <br> For description, see GOVT 424.

AM ST 628(6281) Government and Public Policy: An Introduction to Analysis and Criticism (also AM ST 428[4281], GOVT 428/728[4281/7281])
Fall. 4 credits. T. Lowi.
For description, see GOVT 428.
AM ST 630(6301) Institutions (also GOVT 630[6301])
Fall. 4 credits. R. Bensel.
For description, see GOVT 630.
AM ST 660(6625) Sexuality and the Law (also AM ST 460[4625], GOVT 462/762[4625/7625], FGSS
461/762[4610/7620])
Spring. 4 credits. A. M. Smith.
For description, see GOVT 462.

## [AM ST 664(6645) Democratic Theory (also GOVT 664[6645])

4 credits. Next offered 2008-2009. J. Frank. For description, see GOVT 664.]

## History

AM ST 103(1530) Introduction to American History lalso HIST 153[1530])
Fall. 4 credits. J. Parmenter.
For description, see HIST 153.
AM ST 104(1531) Introduction to American History (also HIST 154[1531])
Spring. 4 credits. D. Chang.
An introductory survey of the development of the United States since the Civil War.
[AM ST 109(1109) Introduction to American Studies: New Approaches to Understanding American Diversity, the 19th Century 㳟 (HA-AS)
4 credits. Next offered 2008-2009.
N. Salvatore.]
[AM ST 110(1110) Introduction to American Studies: New Approaches to Understanding American Diversity, the 20th Century (also AAS 111[1110]) (HA-AS)
4 credits. Next offered 2008-2009
M. C. Garcia and D. Chang.]

## AM ST 124(1240) Democracy and Its

 Discontents: Political Traditions in the United States (also HIST 124[1240]) (HA-AS)Summer. 3 credits. N. Salvatore An examination of democracy and its critics The course explores the evolution of democracy in America, focusing on some of the dramatic and important episodes in American history. It considers the struggles over the emancipation of slaves in the 19th century and expanded rights for women and working people in the 20th century, freespeech issues, the civil-rights movement, religious-based critiques of American culture, and conservative critiques of American liberalism. The course serves as an investigation of the ways in which political expression takes forms in modern American culture. In addition to lectures, the course features several afternoon programs that include guest lecturers and hands-on instruction in how to use the modern electronic research library.
[AM ST 201[2010] Popular Culture in the United States, 1900 to 1945 (HA-AS)
4 credits. Next offered 2008-2009.
G. Altschuler.

AM ST 201 deals with American popular culture in the period between 1900 and the end of World War II. As we examine bestsellers, films, sports and television, radio, ads, newspapers, magazines, and music, the goal is to better understand the ways in which popular culture as "contested terrain," the place where social classes, racial and ethnic groups, women and men, the powerful and the less powerful, seek to "control" images and themes. Topics include: the Western; Cultural Heroes and the Cult of Individualism in the 1920s; The Hays Code and the Black Sox scandal; Mae West and the "New Women" Advertising in an Age of Consumption; Gangsters and G-Men; and Jackie Robinson and the American Dilemma.]
[AM ST 202(2020) Popular Culture in the United States, 1945 to Present (HAAS)
4 credits. Next offered 2008-2009.
G. Altschuler.

AM ST 202 treats the period from 1945 to the present as we examine best-sellers, films, sports and television, radio, ads, newspapers, magazines, and music. We try to better understand the ways in which popular culture shapes and/or reflects American values. The course also depicts popular culture as "contested terrain," the place where social classes, racial and ethnic groups, women and men, the powerful and less powerful, seek to "control" images and themes. Topics include: The Honeymooners and 1950s television, soap operas; "gross-out" movies; Elvis; the Beatles and Guns in Roses; gothic romances; and People Mayazine and USA Today.]
(AM ST 203(2033) Wilderness in North American History and Culture (also HIST 203[2030]]
4 credits. Next offered 2008-2009. A. Sachs. For description, see HIST 203]
AM ST 204(2022) Court, Crime, and Constitution (also HIST 202[2020])
Fall. 4 credits. R. Polenberg.
For description, see HIST 202.
[AM ST 205(2211) Seminar: The Blues and American Culture (also HIST 221[2211])
Fall. 4 credits. Next offered 2008-2009. R. Polenberg.

For description, see HIST 221.J
[AM ST 209(2090) Seminar in Early America (also HIST/FGSS 209[2090])
4 credits. Limited to 20 students. Next
offered 2008-2009. M. B. Norton.
For description, see HIST 209.]
AM ST 210(2100) Culture and Politics in America After 1945
Spring. 4 credits. Limited to 15 students.
Priority given to sophomores. N. Salvatore. The seminar will focus on the broad changes in American life in the half-century following World War II. We will examine evolving political affiliations, including the emergence of a popular conservative movement, challenges to a liberal tradition, changing notions of faith, of the music enjoyed, and of the meaning of the individual's relationship to a larger community. We will approach these and other themes through different, even conflicting approaches encountered in novels and memoirs, historical and political analyses, and the music itself. A series of short essays and a final paper are required, as is participation in class discussion.
[AM ST 212(2120] African American Women: 20th Century (also HIST/ FGSS 212[2120])
4 credits. Next offered 2008-2009.
M. Washington.

For description, see HIST 212.]
AM ST 213(2640) Introduction to Asian American History (also HIST 264[2640], AAS 213[2130])
Fall. 4 credits. D. Chang.
For description, see HIST 264.
AM ST 217(2171) Classical Studies in American Cultural Criticism (also HIST 217[2171])
Fall. 4 credits. M. Kammen.
For description, see HIST 217.
AM ST 218(2200) Travel In American History and Culture (also HIST 220[2200])
Spring. 4 credits. A. Sachs.
For description, see HIST 220.
[AM ST 229(2290) Jefferson and Lincoln (also HIST 229[2290])
4 credits. Limited to 15 students. Priority given to underclassmen. Next offered 2009-2010. E. Baptist.
For description, see HIST 229.]
AM ST 236(2360) Native People of the Northeast, Pre-Contact to the Present (also HIST/AIS 236[2360])
Spring. 4 credits. J. Parmenter.
For description, see HIST 236.
AM ST 238(2390) Seminar In Iroquois History (also HIST 239[2390])
Fall. 4 credits. J. Parmenter.
For description, see HIST 239.
[AM ST 242(2420) Religion and Politics in American History from J. Winthrop to R. Reed (also HIST/RELST 242(2420])
4 credits. Prerequisite: permission of instructor. Next offered 2008-2009.
R. L. Moore.

For description, see HIST 242.]
AM ST 250(2501) Race and Popular
Culture (also HIST 251[2510])
Spring. 4 credits. M. Washington.
For description, see HIST 251.
AM ST 251(2110) Black Religlous Traditions from Slavery to Freedom |also HIST/ RELST 211[2110]] Spring. 4 credits. M. Washington.

## For description, see HIST 211

AM ST 259(2599) Latinos in the United States: Colonial Period to 1898 (also HIST 260[2600], LSP 260[2600])
Fall. 4 credits. M. C. Garcia.
For description, see HIST 260.
AM ST 261(2610) Latinos in the United States: 1898 to the Present (also HIST/LSP 281[2610])
Spring. 4 credits. M. C. Garcia.
For description, see HIST 261.

## AM ST 266(2660) Introduction to Native American History (also HIST/AIS 266[2660]) <br> Spring. 4 credits. J. Parmenter.

For description, see HIST 266.
[AM ST 272(2720) The Atlantic World from Conquest to Revolution (also HIST 272[2720])
4 credits. Next offered 2008-2009.
M. B. Norton and R. Weil.

For description, see HIST 272.]
AM ST 273(2730) Women In American Society, Past and Present (also FGSS/HIST 273[2730])
Fall. 4 credits. M. B. Norton.
For description, see HIST 273.
[AM ST 292(2980) Inventing an Information Society (ECE/ENGRG 298[2980], HIST 292[2920], S\&TS 2922921])
3 credits. Next offered 2008-2009. R. Kline. For description, see ECE 298.]
AM ST 303(3030) African American Women In Slavery and Freedom (also HIST 303[3030], FGSS 307[3070])
Fall. 4 credits. M. Washington.
For description, see HIST 303.
AM ST 306(3060) History of American Workers: 1960 to 1990s (also ILRCB 306[3060])
3 credits. J. Cowie.
For description, see ILRCB 306.
[AM ST 308(3003) Working-Clase America In Mass Media and Popular Culture (also ILRCB 303[3030])
3 credits. Next offered 2008-2009. J. Cowie. For description, see ILRCB 303.]
[AM ST 309(3090) The Cinema and the American City (also FILM 342[3420], VISST 309[3090]) (CA-AS)
4 credits. Next offered 2008-2009.
S. Haenni.

The emergence of the cinema in the late 19th century coincided with the emergence of a new kind of metropolis, characterized by, among other things, new traffic systems (elevated train, subway, automobile); new racial, ethnic, and sexual regimes; and new
urban planning. The cinema was inevitably affected by the ways in which the city developed, while at the same time it also made the city legible. In this course we examine how American cities and towns have been represented in film in different ways, as, for instance, musical symphonies, mysteries to be deciphered, or post-apocalyptic wastelands We explore how gender, racial, ethnic, class, and sexual identities are negotiated in the modern, cinematic city. Screenings range from silent and early sound films, such as The Crowd and 1930 s musicals, to contemporary cinema, such as Do the Right Thing and Blade Runner, our viewings are guided by readings in film and urban theory and history.]

AM ST $312(3140)$ History of American Foreign Pollcy 1912 to the Present (also HIST 314[3140])
Spring. 4 credits. F. Logevall.
For description, see HIST 314.
[AM ST 317(3180) American Constitutional Development (also HIST 318[3180]]
4 credits. Next offered 2008-2009.
R. Polenberg.

For description, see HIST 318.$]$
AM ST 318(3130) U.S. Foreign Relations, 1750-1912 (also HIST 313 [3130])
Fall. 4 credits. F. Logevall.
For description, see HIST 313.
[AM ST 321(3210) Colonial North America to 1763 (also HIST 321[3210])
4 credits. Next offered 2008-2009.
M. B. Norton.

For description, see HIST 321.)
[AM 5T 322(3250) Age of the American Revolution, 1763 to 1815 (also HIST 325[3250])
4 credits. Next offered 2008-2009.
M. B. Norton.

For description, see HIST 325.]
[AM ST 324(3240) Varieties of American Dissent, 1880 to 1990 (also HIST 324[3240]) (HA-AS)
4 credits. Next offered 2008-2009.
N. Salvatore.

The idea of dissent in American society maises a variety of images. Civil rights activists, striking workers, and student radicals of the 1960s are familiar enough symbols of dissent. But might we understand a Pentecostal believer, filled with the spirit of his or her God in critiquing contemporary society, as an example of American dissent? This course explores the varieties of economic, political, and cultural dissent in American between 1880 and 1990 , and examines how understanding dissent in its specific historical context illuminates major aspects of American life and culture.]

## AM ST 325(3231) Race and Politics in 20th-Century America (also HIST 323[3231]) <br> Fall. 4 credits. J. Sokol. <br> For description, see HIST 323.

AM ST 331(3310) Causes of the American Civil War, 1815 to 1860 (also Mist 331[3310])
Fall. 4 credits. E. Baptist.
For description, see HIST 331.
[AM ST 340(3400) Recent American History, 1925 to 1960 (also HIST 340[3400])
4 credits. Next offered 2009-2010.
R. Polenberg.

For description, see HIST 340.]
[AM ST 341(3410] Recent American History, 1960 to Present (also HIST 341[3410])
4 credits. Next offered 2008-2009.
R. Vanderlan.

For description, see HIST 341.1
AM ST 343(3430) American Civil War and Reconstruction, 1860 to 1877 (aiso HIST 343[3430])
Spring. 4 credits. E. Baptist.
For description, see HIST 343.
AM ST 345(3450) Cultural and Intellectual Life of 19th-Century Americans (also HIST 345[3450])
Spring. 4 credits. A. Sachs.
For description, see HIST 345.
AM ST 346(3460) Modernization of the American Mind (also HIST 346[3460])
Fall. 4 credits. R. L. Moore.
For description, see HIST 346.
[AM ST 349(3510) Environmental History: The United States and the World Culture (also HIST 315[3150])
4 credits. Next offered 2008-2009.
A. Sachs.]
[AM ST 351(3470) Asian American Women's History (also HIST 347[3470], AAS 347[3470], FGSS 347[3470]
4 credits. Next offered 2009-2010.
D. Chang.

For description, see HIST 347.]
[AM ST 356(3570) Engineering in American Culture (also ENGRG/HIST/ S\&TS 357[3570], S\&TS 357[3571])
4 credits. Next offered 2008-2009. R. Kline.
For description, see ENGRG 357.]
AM ST 357(3550) Latinos, Law, and Identity (also LSP/D SOC 355[3550]) Fall 3 credits. R. Mize.
For description, see D SOC 355.
[AM ST 378(3708) Topics in U.S. Women's History (also HIST/FGSS 378[3780])
4 credits. Next offered 2008-2009.
M. B. Norton.

For description, see HIST 378.]
AM ST 380(3800) Asian American Urban Experience (also CRP 395/670[3850/5850], AM ST 679[6790], AAS 380[3800])
Fall. 3 credits. C. Lai.
For description, see CRP 395.
AM ST 402 Futures of American Poetry (also S HUM 423)
Fall. 4 credits. M. Cavitch.
For description, see S HUM 419.
AM ST 405(4050) U.S.-Cuba Relations (also AM ST 605[6050], MIST 405/605[4050/6050], LAT A 405[4050], LSP 405/605[4050/6050])
Spring. 4 credits. M. C. Garcia.
For description, see HIST 405.

AM ST 419(4190) Seminar In American Social History (also HIST 419[4190]) Fall. 4 credits. Taught in Washington, D.C. S. Blumin.

For description, see HIST 419.
AM ST 420(4200) Asian American Communities (also HIST 420[4200], AAS 424[4240])
Spring. 4 credits. Limited to 15 students. D. Chang.

For description, see HIST 420.
AM ST 421(4120) Undergraduate Seminar in American Cultural History (also HIST 421[4210], ART H 421[4021])
Fall. 4 credits. Prerequisite: permission of instructor. M. Kammen.
For description, see HIST 421.
[AM ST 426(4260) The West and Beyond: Frontiers and Borders in American History and Culture |also HIST 428[4280]]
4 credits. Next offered 2008-2009. A. Sachs. For description, see HIST 426.]
[AM ST 427(4261] Sex, Rugs, Salt, and Coal (also HIST 427[4261])
4 credits. Next offered 2008-2009. A. Sachs. For description, see HIST 428.]

AM ST 439(4039) Reconstruction and the Now South (also HIST 439[4390])
Fall. 4 credits. Limited to 15 students.
M. Washington.

For description, see HIST 439.
[AM ST 444(4440) American Men (also HIST 444[4440], FGSS 445[4450])
4 credits. Next offered 2008-2009.
E. Baptist.

For description, see HIST 444.]
[AM ST 466(4660) Iroquois History (also HIST 466[4660])
4 credits. Not open to freshmen. Next
offered 2008-2009. J. Parmenter.
For description, see HIST 466.]
AM ST 473(4731) Approaches to America: Age of Civil Rights (also HIST 473 [4731])
Spring. 4 credits. J. Sokol.
For description, see HIST 473.
AM ST 482(4821) Religious and Secular in American Culture (also HIST 482[4821]
Fall. 4 credits. R. L. Moore.
For description, see HIST 482.
AM ST 485(4850) Immigration: History, Theory, and Practice (also NIST 485[4850])
Fall. 4 credits. M.C. Garcia.
For description, see HIST 485.
AM ST 497(4970) Jim Crow and Exclusion Era America (also AM ST 697[6970], HIST 497/697[4970/6970], AMS 497[4970])
Fall. 4 credits. D. Chang.
For description, see HIST 497.
[AM ST 499(4900) Now World Encounters, 1500 to 1800 (also HIST 490[4900])
4 credits. Next offered 2008-2009.
J. Parmenter.

For description, see HIST 490.]

AM ST 500(4997) Research Seminar in American Studies (also HIST 500[4997])
Fall or spring. Offered in Cornell in
Washington Program only. S. Blumin and others.
For description, see HIST 500.
AM ST 605(6050) U.S.-Cuba Relations (also AM ST 405[4050], HIST 405/605[4050/6050], LSP 405/605(4050/6050])
Spring. 4 credits. M. C. Garcia. For description, see HIST 405.
[AM ST 610(6101) African-American Historiography (also HIST 610[6101]) 4 credits. Next offered 2008-2009. M. Washington.

For description, see HIST 610.]
AM ST 655(6550) Early Modern Atlantic World (also HIST 655[6550])
Spring. 4 credits. M. B. Norton.
For description, see HIST 655.

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AM ST 679(6790) Asian American Urban Experience (also CRP 395/670[3850/5850], AM ST 380[3800], AAS 380[3800])
Fall. 3 credits. C. Lai.
For description, see CRP 395.
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AM ST 697(6970) Jim Crow and Exclusion Era America (also AM ST 497[4970], HIST 497/697[4970/6970])
Fall. 4 credits. D. Chang.
For description, see HIST 497.

## Music and Visual Studies

AM ST 105(1311) Popular Music in America: 1850 to 1985 (also MUSIC 101[1311])
Spring. 3 credits. S. Pond.
For description, see MUSIC 101.

## AM ST 222(1313) A Survey of Jazz (also MUSIC 222[1313])

Fall. 3 credits. S. Pond.
For description, see MUSIC 222.

## AM ST 223(1312) History of Rock Music

 (also MUSIC 221[1312])Spring. 3 credits. J. Peraino.
For description, see MUSIC 221.

## [AM ST 227(2091) The Immigrant

 Imagination (also ART H 209[2190])Fall. 4 credits. Next offered 2008-2009. T. Tu.

For description, see ART H 209.]
AM ST 282(2820) Photography and the Amerlcan Landscape (also LA 282[2820])
Fall. 3 credits. A. Hammer.
For description, see LA 282.

## AM ST 355(3605) U.S. Art from FDR to Reagan (also ART H 365[3605])

Fall. 4 credits. J. E. Bernstock.
For description, see ART H 365.
[AM ST 360(3740) Painting in 19thCentury America (also ART H 360[3740])
4 credits. Next offered 2008-2009.
L. L. Meixner.

For description, see ART H 360.]
[AM ST 390(3810) American Architecture and Bullding I (also ARCH 390[3810]) 3 credits. Prerequisites: ARCH 181-182 or permission of instructor. Next offered 2008-2009. M. Woods.
For description, see ARCH 390.]
[AM ST 391(3811) American Architecture and Building II (also ARCH 391[3811])
Spring. 3 credits. Prerequisites: ARCH 181182 or permission of instructor. Next offered 2008-2009. M. Woods.
For description, see ARCH 391.]
[AM ST 397(3818) Special Topics in the History of Architecture and Urbanism (also ARCH 398[3818]) 3 credits. Prerequisites: ARCH 181-182 or permission of instructor. Next offered 2008-2009. M. Woods.
For description, see ARCH 398.]
[AM ST 408/4508] Exhibiting Cultures (also AM ST 608[6508]; ART H 408/608[4508/6508]; AS\&RC 408/608[4504/6508])
4 credits. Next offered 2008-2009.
C. Finley.

For description, see ART H 408.]
AM ST 409(4509) Black Arts Movement (also ART H 409/609[4509/6509], AM ST 609[6509], ASERC 409/609[4505/6509]
Fall. 4 credits. C. Finley.
For description, see ART H 409.
[AM ST 412(4113) Race, Technology, and Visuallity (also ART H $413[4113$ ], AAS 413[4130])
4 credits. Next offered 2008-2009. T. Tu.
For description, see ART H 413.]
[AM ST 414(4114) Popular Culture and Visual Practice in Asian America (also ART M 414[4114], AAS 414(4140])
Spring. 4 credits. Next offered 2008-2009. T. Tu.

For description, see ART H 414.]
AM ST 609/6509) Black Arts Movement (also ART H 409/609[4509/6509], AM ST 409[4509], AS\&RC 409/609[4505/6509])
Fall. 4 credits. C. Finley.
For description, see ART H 409.

## Honors

Please see description of major for information about registration in these courses.

## AM ST 493-494(4993-4994) Honors Essay Tutorial

493, fall; 494, spring. Up to 8 credits each semester. See M. Jones-Correa for appropriate advisors.

## ANTHROPOLOGY

D. Holmberg, chair; J. Fajans, director of graduate studies; K. Jordan, director of undergraduate studies; A. Clark Arcadi, D. Boyer, M. Fiskesjo, F. Gleach,
D. Greenwood, J. Henderson, E. Kohn, B. Lambert, S. Langwick, K. March,
H. Miyazaki, V. Munasinghe, M. Ralph, J. Rigi, A. Riles, N. Russell, S. Sangren, V. SantiagoIrizarry, J. Schoss, J. Siegel, A. Simpson, M. Small, T. Volman, M. Welker, A. Willford. Emeritus: R. Ascher, B. J. Ishell, R. Smith.
Anthropology is one of the most diverse disciplines in the university. Spanning human evolution, the development and heterogeneity of language and culture, human history, and the diversity of cultures past and present, the field has broad scope, uses a variety of methods, addresses basic issues about human origins and human life, and maintains commitment to understanding social life and using this understanding to improve society. Anthropology is an ideal "liberal arts" major. It also serves as a major that, when well
designed by the student with his or her advisor, prepares students for a wide range of professional careers, e.g., law, medicine, foreign service, human rights, social services, international development, and business, among others.
Courses for nonmajors: Anthropology welcomes nonmajors into many of its courses. Unless prerequisites are explicitly stated, 200and 300 -level courses do not have formal prerequisites and can be taken by students without prior experience in anthropology. Such students are welcome in these upperlevel courses. For additional information to assist nonmajors and students from other colleges in selecting anthropology courses, see the anthropology department weh page (falcon.arts.comell.edu/Anthro/).

## The Major

The major is structured to provide both general grounding in three subfields of anthropology (sociocultural anthropology, anthropological archaeology, and biological anthropology) and detailed focus on a particular area of concentration. Areas of concentration include a wide variety of subjects within and between these three subfields. Topics ranging from identity politics and globalization to prehistory and human evolution can be pursued in classes focused on every major geographical region in the world. Upper-level courses span a range of topical and theoretical issues related to religion, gender, economics, colonialism, democratization, prehistoric cultures, race, behavioral evolution, and conservation, to name a few.
No prerequisites are required to enter the anthropology major. Students should see the director of undergraduate studies to apply to the major and obtain an advisor. Majors prepare a short statement about their interests and goals for the major, and then meet with their advisor. Majors and advisors collaboratively build a program of study that reflects the student's individual interests and the intellectual breadth of the field. Our goal is to provide a close and supportive advising relationship and a strong and coherent structure for the student's major.
A total of 38 credits are necessary to complete the major. Students are required to take at
least one course at any level in the curriculum in each of the three subfields (cultural anthropology, archaeology, and biological anthropology). At least fiv e courses must be at the 300 level or higher, and all majors must take a 400 -level seminar course in their senior year ( $420,458,460$, and 463 are not seminar courses and do not fill the requirement). When warranted, the advisor is free to approve up to two courses from other departments totaling up to 8 credit hours to contribute to the 38 -credit requirement.
The 400 -level seminar serves as a space where students can synthesize their undergraduate work in anthropology. Although individual classes vary to some extent, most meet weekly, are discussion-based, and are limited to 15 students. Collaboration is encouraged between students to pursue their individual interests, and some form of student presentation is a typical part of the course.
Study abroad and off-campus study programs: The Department of Anthropology encourages students to consider a semester of study abroad or off-campus study developed as an integral part of the student's major concentration. The director of undergraduate studies serves as the anthropology study abroad advisor.

The Cornell-Nepal Study Program: The Cornell-Nepal Study Program is a joint program of Cornell University and Tribhuvan University, the national university of Nepal Qualified juniors, seniors, and first- or secondyear graduate students work with faculty from both universities to prepare for and undertake field research projects in Nepal. Students receive 15 credits per semester; students may enroll for either fall or spring semester, or for the entire year; application is through Cornell Abroad. For further information, consult David Holmberg or Kathryn March in the Department of Anthropology.

Other anthropologically relevant study abroad options, using existing Cornell Abroad and off-campus options, can be worked out in consultation with the major advisor, the anthropology study abroad advisor, and Cornell Abroad.

## Honors

Honors in anthropology are awarded for excellence in the major, which includes overall GPA and completion of an honors thesis. Undergraduate students interested in working for an honors degree should apply to the chair of the Honors Committee in the second semester of their junior year (requests for late admission may be considered, but in no case later than the second week of the first semester of the senior year). It is the student's responsibility to identify an appropriate topic for a thesis and to find a faculty member willing to sponsor and supervise the research; the advisor and at least the general subject of the thesis must be identified at the time of application for admission to the Honors Program. Note that clearance from the University Committee on Human Subjects usually is required before research involving living people may begin; students contemplating such research should begin to work with their thesis advisors to design their investigations and obtain the clearance well in advance of the date when the involvement with research subjects is to begin.

Admission to the Honors Program requires an overall GPA of 3.3 or greater and a 3.5 GPA in the major. In addition, the student should have no outstanding Incompletes in courses that will be used toward the major (provisional admission with Incompletes is possible at the discretion of the chair of the Honors Committee on evidence that a good faith effort to finish them is under way). Under special circumstances, a student with an overall GPA of 3.0 may petition for admittance to the program.
Writing an honors thesis typically is a twosemester project involving 8 credits of course work; most students do this work during their senior year. During their first semester of honors work, students typically register for (1) ANTHR 483 Honors Thesis Research (3 credits); and (2) ANTHR 491 Honors Workshop I ( 1 credit). During their second semester of honors work, students typically register for (1) ANTHR 484 Honors Thesis Write-up (2 credits); and (2) ANTHR 492 Honors Workshop II ( 2 credits). The twocourse/term arrangement reflects the division of supervision over the thesis berween the thesis advisor and the chair of the Honors Committee. The thesis advisor is ultimately responsible for guiding the scholarly development of the thesis; the chair of the Honors Committee is mainly responsible for assuring timely progress toward completion of the thesis, and providing a context for students in the Honors Program to share ideas (both editorial and substantive) as their theses progress.

## Special Programs and Facilities

Collections: the department has an extensive collection of archaeological and ethnological materials housed in the Anthropology Collections. A limited number of students can make arrangements to serve as interns in the Anthropology Collections. Olin Library houses some of the most extensive collections of materials on the ethnology of Southeast Asia, South Asia, East Asia, and Latin America to be found anywhere in the United States. The biological anthropology laboratory (B65 McGraw Hall) houses an extensive collection of materials for teaching purposes, including (1) human skeletal remains, (2) articulated skeletons and cranial casts of primates, and (3) casts of important fossils in the human lineage.

Inclependent Study: specialized individual study programs are offered in ANTHR 497, Topics in Anthropology, a course open to a limited number of juniors and seniors who have obtained permission and supervision of a faculty member. Undergraduates should note that many 600 -level courses are open to them by permission of the instructor.
Colloquia: The Department of Anthropology holds colloquia almost every week of the semester on Friday at 3:30 P.M. in 215 McGraw Hall. Faculty members from Cornell and other universities participate in discussions of current research and problems in anthropology. Students are encouraged to attend.

For more complete information about the anthropology major, see the director of undergraduate studies or visit the Department of Anthropology web page (falcon.arts.comell. edu/Anthro/).

## I. Sociocultural Anthropology

Sociocultural anthropology is rooted in the precise observation and rigorous analysis of human cultural capacities and human social practices, relations, and institutions. All sociocultural anthropology involves both inquiry into the diversity of human cultures (ethnography) and comparative analysis of human social dynamics (social theory). Historically, sociocultural anthropology specialized in the study of non-western peoples, but today there are few places and domains of human activity that sociocultural anthropologists do not study. To give a few examples, sociocultural anthropologists study nuclear weapons scientists in California, the transformation of state power in Russia, and the politics of development in India. They study how television producers in Egypt contribute to nationalism, the social effects of truth commissions in Guatemala and South Africa, and the emergence of new religious and social movements in Latin America. What distinguishes sociocultural anthropology as a field is its engagement with the full abundance of human lived experience and its integrated, comparative effort to make sense of the key processes shaping this experience As such, sociocultural anthropology is an excellent, flexible choice of major. It teaches core critical, analytical, and expressive skills and important perspectives on human cultural creativity and social life that are widely applicable. Recently, our majors have gone into careers as diverse as academic scholarship, activism, advertising, consulting, design, film, journalism, marketing, medicine, NGO-work, and politics and government.

## ANTHR 102(1400) The Comparison of

 Cultures © (CA-AS)Spring. 3 credits. A. Riles. Introduction to cultural anthropology through ethnographies, or the descriptive accounts of anthropologists. Through readings and lectures, students acquaint themselves with a number of cultures from several parts of the world. The cultures range in form from those of small-scale tribal societies to those of state societies. Throughout the course, students attempt to make sense of exotic cultures in their own terms. Attention is focused on variation in cultural patterns as they are expressed in social, economic, and ritual practices. In this encounter, the principles of anthropology as a comparative enterprise that pose distinct cultural systems in belief are developed. Fiction, films, and exercises supplement the formal anthropological materials.

## ANTHR 103(1401) The Scope of Anthropology

Spring. 1 credit. Does not satisfy major requirement to take two broad
introductory courses. Pre- or corequisite:
ANTHR 101 or 102. S-U grades only. Staff. Intended for majors or prospective majors in anthropology. Each week a different member of the faculty in anthropology at Cornell makes a presentation on the nature of his or her work within the field and discusses their interests with students. The course is meant to introduce the range of approaches found within anthropology and help students in planning future course work.
ANTHR 200(1420) Cultural Diversity and Contemporary Issues (:) (SBA-AS)
Fall. 3 credits. M. Fiskejo.

Introduces students to the meaning and significance of forms of cultural diversity for understanding contemporary issues. Drawing from films, videos, and selected readings, students are confronted with different representational forms that portray cultures in various parts of the world and they are asked to critically examine their own prejudices as they influence the perception and evaluation of cultural differences. The course approaches cultures holistically, assuming the inseparability of economies, kinship, religion, and politics, as well as interconnections and dependencies between world areas (e.g. Africa, Latin America, the West). Among the issues considered are "political correctness" and truth; nativism and ecological diversity race, ethnicity, and sexuality; sin, religion, and war; and global process and cultural integrity.

## [ANTHR 210(2410) South Asian Diaspora

 (also AAS 210[2110]) (CA-AS)Spring. 3 credits. Limited to 15 students. Sophomore writing seminar. Next offered 2008-2009. V. Munasinghe.]
[ANTHR 221(2721) Anthropological Representation: Ethnographies on Latino Culture (also AM ST/LSP 221[2721]) (CA-AS)
Fall. 3 credits. Next offered 2008-2009. V. Santiago-Irizarry.]

## ANTHR 228(2428) Slavery and Human

 Trafficking \# (CA-AS)Spring. 4 credits. M. Fiskesjo.
In this course we will study slavery and trafficking in human slaves in the world today, as well as its roots and history in Asia, Africa, as well as in medieval Scandinavia, and in America and Europe today. We will make use of anthropological perspectives to look at influential historical and Classical definitions of slavery, such as Aristotle's idea of the "natural slave," and ask how ownership and domination over fellow humans have been justified in different societies. While introducing themes of gender, race, ethnicity, etc., and basic philosophical issues regarding autonomy and dependence, we also examine the economic forces of exploitation in the floating world of economic migration, people smuggling, and human trafficking

## ANTHR 230(2730) Cultures of Native North America © \# (CA-AS)

Fall. 4 credits. B. Lambert
Survey of the principal Eskimo and American Indian culture areas north of Mexico. Selected cultures are examined to bring out distinctive features of the economy, social organization, religion, and worddview. Although the course concentrates on traditional cultures, some lectures and readings deal with changes in native ways of life that have occurred during the period of European-Indian contact.

## [ANTHR 232(2432) Media, Culture, and Society (SBA-AS)

Fall. 3 credits. Next offered 2008-2009. D. Boyer.]
[ANTHR 246(2546) South Asian Religions in Practice @ (CA-AS)
Fall. 3 credits. Next offered 2009-2010. Staff.]

## ANTHR 250(2450) The Anthropology of Food and Cuisine (CA-AS

Spring. 4 credits. J. Fajans.
You are what you eat! This course examines the way food is produced, prepared,
exchanged, presented, and given meaning in
cultures around the world. It examines the symbolism of specific foodstuffs. Who prepares food and how is it done? Who feeds whom and how these relations are expressed and valued? In addition to looking at these questions we analyze ideas about commensality; how food is used in public contexts for presentation or exchange, and how food is a marker of gender, class, status, ethnicity, and identity. In addition to looking specifically at food, we analyze cultural ideas about gender, the body, and identity in terms of how these cultural patterns are produced and expressed through concrete activities like eating, fasting, and special diets. In this class we stress critical and comparative thinking about subjects we tend to take for granted.

## ANTHR 260(2560) Japanese Society Through Film © (CA-AS)

Fall. 3 credits. H. Miyazaki.
This is an anthropological introduction to Japanese society through a critical investigation of a wide range of films from Ozu Yasujiro's classic films to Miyazaki Hayao's animated films. Topics of investigation include kinship and marriage, work and workplaces, gender and sexuality, bureaucracy, crime and legal culture, nationalism and nostalgia, and techno-scientific utopia.

## ANTHR 268(2468) Medicine, Culture, and

 Society (CA-AS)Spring. 3 credits. L. Stevenson.
Medicine has become the language and practice through which we address a broad range of both individual and societal complaints. Interest in this "medicalization of life" may be one of the reasons that medical anthropology is currently the fastest-growing sub-field in anthropology. This course encourages students to examine concepts of disease, suffering, health, and well-being in their immediate experience and beyond. In the process, students will gain a working knowledge of ecological, critical, phenomenological, and applied approaches used by medical anthropologists. We will investigate what is involved in becoming a doctor, the sociality of medicines, controversies over new medical technologies, and the politics of medical knowledge. The universality of biomedicine (or hospital medicine) will not be taken for granted, but rather we will examine the plurality generated by the various political, economic, social, and ethical demands under which biomedicine has developed in different places and at different times. In addition, biomedical healing and expertise will be viewed in relation to other kinds of healing and expertise. Our readings will address medicine in North America as well as other parts of the world. In class, our discussions will return regularly to consider the broad diversity of kinds of medicine throughout the world, as well as the specific historical and local contexts of biomedicine.

## ANTHR 303(3703) Asians in the

Americas: A Comparative Perspective (also AAS 303[3030]) (CA-AS)
Fall. 4 credits. V. Munasinghe.
The common perception of ethnicity is that it is a "natural" and an inevitable consequence of cultural difference. "Asians" overseas, in particular, have won repute as a people who cling tenaciously to their culture and refuse to assimilate into their host societies and cultures. But, who are the "Asians"? On what basis can we label "Asians" an ethnic group? Although there is a significant Asian presence
in the Caribbean, the category "Asian" itself does not exist in the Caribbean. What does this say about the nature of categories that label and demarcate groups of people on the basis of alleged cultural and phenotypical characteristics? This course examines the dynamics behind group identity, namely ethnicity, by comparing and contrasting the multicultural experience of Asian populations in the Caribbean and the United States. Ethnographic case studies focus on the East Indian and Chinese experiences in the Caribbean and the Chinese, Korean, Japanese, Filipino, and Indian experiences in the United States.

## ANTHR 306(3406) Gifts and Exchange

Spring. 4 credits. H. Miyazaki
One of the core messages of anthropology is that reciprocity is a foundational principle of social life. This course critically interrogates the idea of reciprocity through an in-depth investigation of various examples of gift giving from rituals of gift giving in the Pacific Islands and East Asia to organ donations and the idea of gifts from God in Christian theology. Using these diverse examples, we will explore some of the most fundamental questions concerning the nature of giving. Are there free gifts? Can one be truly altruistic and give without expecting to be reciprocated? Why do people delay reciprocating? What moral problems does money pose when it is given as a gift? What are the differences and similarities between gifts to humans and gifts to god(s)?

## [ANTHR 310(3410) Nationalism and Revivalism (CA-AS)

Spring. 4 credits. Next offered 2009-2010. Staff.]
[ANTHR 314(3514) Learning in Japan © (SBA-AS)
Spring. 4 credits. Next offered 2009-2010. H. Miyazaki.]

## ANTHR 316(3516) Power, Society, and

 Culture in Southeast Asia (CA-AS) Fall. 4 credits. M. Welker.Southeast Asia is a region where
anthropologists have played great attention to the symbolic within cultural and social processes. While this intellectual orientation has produced contextually rich accounts of cultural uniqueness, there has been a tendency within "interpretive" ethnographies to downplay the role of power and domination within culture and society. This course aims to utilize the traditional strengths of symbolic anthropology by examining the roles of ritual, art, religion, and "traditional" values within contemporary Southeast Asian societies. In doing so, however, we examine how these practices and ideas can also structure ethnic, class, and gender inequalities. Understanding how "traditional" cultural practices and ideologies fit within contemporary nation-states requires that we also examine the effects of colonialism, war, and nationalism throughout the region. In addition to providing a broad and comparative ethnographic survey of Southeast Asia, this course investigates how culturally specific forms of power and domination are reflected in national politics, and in local and regional responses to the economic and cultural forces of globalization

## ANTHR 320(3420) Myth, Ritual, and Symbol (also RELST 323[3230]) © (CA-AS)

Spring. 4 credits. J. Fajans.
Examines how systems of thought, symbolic forms, and ritual practice are formulated and expressed in primarily non-Western societies. Focuses on anthropological interpretations of space, time, cosmology, myth, classificatory systems (e.g., color, totems, food, dress, kinship), taboos, sacrifice, witchcraft, sorcery, and rites of passage (birth, initiation, marriage, death). Examines both the roles of specialists (e.g., spirit mediums, curers, priests, ascetics) and nonspecialists in producing these cultural forms.

## ANTHR 321(3421) Sex and Gender in Cross-Cultural Perspective (also FGSS 321[3210]) © (SBA-AS)

Fall. 4 credits. K. March.
Introduction to the study of sex roles crossculturally and to anthropological theories of sex and gender. Examines various aspects of the place of the sexes in social, political, economic, ideological, and biological systems to emphasize the diversity in gender and sexrole definitions around the world.

## ANTHR 323(3423) Kinship and Social Organization (SBA-AS)

Spring. 4 credits. B. Lambert.
Much of this course is a survey of forms of the family, descent groups, and marriage systems. The role of age and sex in the social structure is also considered. The last part of the course is devoted to a history of the British and American family and to its fate in utopian communities.

## [ANTHR 325(3425) Anthropology of the

 University (SBA-AS)Fall. 4 credits. Next offered 2008-2009. D. Greenwood.]

## ANTHR 327(3427) Anthropology and the

 EnvironmentSpring. 4 credits. E. Kohn.
What is nature? Is it something objectively real or is it a culturally variable social construction? If other people do not share our ideas of nature, what does this say about concepts such as conservation or sustainable development? Because it reveals the culturally specific ways in which people engage with a world that is not fully of their making, Environmental Anthropology constitutes a privileged window onto such questions. Accordingly, we will examine these by exploring how different people-from subarctic hunters to autistic animal scientists-actually go about engaging with the nonhuman world. And, instead of just asking ourselves what constitutes nature, we will look to them for possible answers.

## [ANTHR 328(3428) Conflict, Dispute Resolution, and Law in Cultural Context (SBA-AS)

Fall. 4 credits. Next offered 2009-2010 V. Santiago-Irizarry.]
[ANTHR 335(3535) The Situation of China's Minorities: Anthropological Perspectives \# © (CA-AS)
Spring 4 credits. Next offered 2009-2010. M. Fiskesjo.]
[ANTHR 337(3537) Gender, Identity, and Exchange in Melanesia © (8BA-AS) Fall. 4 credits. Next offered 2009-2010. J. Fajans.]

ANTHR 339(3545) Peoples and Cultures of the Himalayas (also ANTHR 739[7545]) © (CA-AS)
Spring. 4 credits. K. March.
A comprehensive exploration of the peoples and cultures of the Himalayas. Ethnographic materials draw on the lifeways of populations living in the Himalayan regions of Bhutan, India, Nepal, and Tibet. Some of the cultural issues to be examined through these sources include images of the Himalayas in the West, forms of social life, ethnic diversity, political and economic history, and religious complexity.

## [ANTHR 344(3554) Male and Female in

 Chinese Culture and Society (also FGSS 344[3440]) (SBA-AS)Fall. 4 credits. Next offered 2008-2009. S. Sangren.]

## ANTHR 346(3546) Asian MInorities (also ASIAN 345[3345])

Fall. f́ credits. M. Fiskesjo.
This course surveys the present-day situation and the history of ethnic minorities in a number of Asian countries. We will study how minorities have been defined culturally and politically in Asia's modern nation-states such as China, Japan, Thailand, and Burma; we'll investigate how they have been variously exoticized, demonized, ostracized and so on, and how they have been utilized in radically different ways in the political constitution of these Asian states; and how they themselves have shaped their history, culture anci fate. Our basic approach is relational, taking into account the majorities which the minorities relate to; and comparative, opening for discussion of issues such as identity production, race, nation and ethnicity, in global terms

## ANTHR 347(3447) Sport

Spring. 4 credits. S. Sangren.
Long overlooked by anthropologists, sport and recreation are increasingly recognized as important windows into culture. Sport can be approached from a number of directionsinterpreted as a ritual; viewed as a spectacle of ethnic, regional, or national identity; seen as a metaphor for life; understood as a major industry. This course will consider these and other approaches to sport, encouraging students to bring their own involvements in sport to reflect not only upon sport itself, but also upon how such reflection can illuminate cultural, psychological, and political dimensions of social life. Why, for example, do we take sport (and other forms of recreation) so seriously? Why do many of us apparently invest more passion in such pursuits than to life's allegedly more serious activities? How is sport integrated into people's identities? Readings will draw from popular literature and media as well as academic writing from a variety of disciplines (psychology, sociology, history) in addition to anthropology.
[ANTHR 351(3451) Global Movements of Cultural Heritage (CA-AS)
Spring. 4 credits. Next offered 2008-2009. M. Fiskesjo.]

## ANTHR 353(3453) Anthropology of

 Colonialism (also AIS 353[3530], AM ST 353[3453]) (CA-AS)Fall. 4 credits. A. Simpson.
Examines the relationship between colonialism and anthropology and the ways in which the discipline has engaged this global process
locally in North America. One of the aims of this course is to gain an appreciation of colonialism both as a theory of political legitimacy and as a set of governmental practices. As such, North America is reimagined in light of the colonial project and its technologies of rule such as education, law, policy that worked to transform indigenous notions of gender, property and territory. This is done to appreciate the ways in which these forms of knowledge and practice advanced the settlement of space and place and both settled and unsettled peoples. This course is comparative in scope but is grounded within the literature from Native North America.

## ANTHR 354(3754) Amazonia and

 PersonhoodSpring. 4 credits. E. Kohn.
Why might people feed hallucinogens to their dogs before talking to them? Why were missionaries able to easily convince Amazonians of the existence of heaven but not hell? What transformations occur when an Amazonian politician dons a feather headdress in addition to a watch and a brief case? What is it like to encounter one's dead grandfather, now transformed into a jaguar, in the forest? All of these seemingly disparate examples are intimately related to Amazonian notions of personhood. As such, they challenge our own understandings of who or what counts as a person. Accordingly, in this course we will engage Amazonian ethnography to help us think through fundamental questions associated with what it means to be a person.

## ANTHR 361(3461) Anthropology of Organizations (also ANTHR 661[6461]) (SBA-AS)

Spring. 4 credits. D. Greenwood. Organizations are at once economic/social/ political/cultural entities and organizational studies are found in all these social science fields. Anthropology's approaches to the study of organizational behavior, cultures, and political economies approaches to organizations are holistic, integrative, multimethod and emphasize ethnographic fieldwork. This course emphasizes both the analysis of organizations and change-oriented strategies to transform organizations. Cases from manufacturing, service organizations, and educational institutions are used.

## ANTHR 362(3462) Democratizing Research: Participation, Action, and Research (also ANTHR 662[6462])

 (SBA-AS)Fall. 4 credits. D. Greenwood. This course poses an alternative to distanced, "objectivist" social science by reviewing some of the many numerous approaches to socially engaged research. Among the approaches discussed are those centering on the pedagogy of liberation, feminism, the industrial democracy movement, and "Southern" participatory action research, action science, and participatory evaluation.
[ANTHR 363(3463) Socialism (SBA-AS)
Spring. 4 credits. Next offered 2009-2010.
J. Rigi.]

## ANTMR 366(3466) Introduction to Anthropological Theory (CA-AS)

Fall. 4 credits. S. Sangren.
This seminar course is designed for anthropology majors to give them an introduction to classical and contemporary social and anthropological theory and to help prepare them for upper-level seminars in
anthropology. The seminar format emphasizes close reading and active discussion of key texts and theorists. The reading list will vary from year to year but will include consideration of influential texts and debates in 19th, 20th, and 21st century anthropological theory especially as they have sought to offer conceptual and analytical tools for making sense of human social experience and cultural capacities.

## ANTHR 368(3468) Marx: An Overview of His Thought (also ANTHR 668[6468]) (SBA-AS)

Spring. 4 credits, J. Rigi.
A reading and interpretation of Marx's principal writings, emphasizing both the continuities and the changes from his earlier to his later works, with attention given to contemporary developments and controversies in Marxian scholarship.

## ANTHR 377(3777) The United States

(also LSP/AM ST 377[3777]) (CA-AS)
Fall. 4 credits. V. Santiago-Irizarry.
The anthropological inquiry into one's own culture is never a neurral exercise. This course will explore issues in the cultural construction of the United States as a "pluralistic" society. We will look at the ideological context for the production of a cultural profile predicted upon ideas that are intrinsic to American images of identity such as individualism, freedom, and equality and the way these are applied in practice. The course readings will include historic documents and accounts, popular writing, and recent ethnographies on the United States.

## [ANTHR 379|3479) Culture, Language,

 and Thought (CA-AS)Spring. 4 credits. Next offered 2008-2009.
V. Santiago-Irizarry.]

## [ANTHR 382(3482) Human Rights, Cultural Rights, and Economic Rights © (SBA-AS)

Fall. 4 credits. Next offered 2008-2009. J. Schoss.]
[ANTHR 384(3684) Africa in the Global Economy (also ANTHR 784[7684]) 앙 (SBA-AS)
Fall. 4 credits. Next offered 2009-2010.
J. Schoss.]

ANTHR 388(3488) Masks of Power and Strategies of Resistance and Subversion (also ANTHR 688[6488]) © (SBA-AS)
Fall. 4 credits. J. Rigi.
The aim of the course is to provide a broad theoretical and ethnographic orientation on various forms of power relations, strategies of resistance/subversion and the role of human agency in historical change. It will explore various concepts of power on both macro and micro levels, tracing their genealogies and looking comparatively at relevant ethnographies. Although a pillar of the course will be the comparative anthropology of state, it also will examine power relations in stateless societies. Various forms of state will be contrasted to each other on the one hand and to forms of political power in the stateless societies on the other. The course will also cover micro processes of power relation related to gender relations and body politics.
[ANTHR 403(4403) Ethnographic Field Methods (also ANTHR 603[6403]) (SBA-AS)
Fall. 4 credits. Next offered 2008-2009 V. Santiago-Irizarry.]

## ANTHR 406(4406) The Culture of Lives

 (also FGSS 406[4060]) © (CA-AS)Spring. 4 credits. K. March.
This seminar will look at persons, lives, cultures, and methods in anthropological life history materials. Throughout the seminar we will attend to the evolution of interest in, forms of, and uses for life history materials in anthropology, with special attention to differences in men's and women's lives and life (re)presentations.

## [ANTHR 408(4408) Gender Symbolism © (CA-AS)

Spring. 4 credits. Next offered 2009-2010. K. March.]
[ANTHR 413(4513) Religion and Politics in Southeast Asia (also ASIAN 413[4413]) © (CA-AS)
Spring. 4 credits. Next offered 2008-2009. A. Willford.]

ANTHR 420(4420) Development of Anthropological Thought (also ANTHR 720[7420]) (SBA-AS)
Fall. 4 credits. Prerequisite: for undergraduates, two prior anthropology courses or permission of instructor. H. Miyazaki.

Examination of the history and development of anthropological theory and practice. Focuses on the differences and continuities among the various national and historical approaches that have come to be regarded as the schools of anthropology.

## [ANTHR 423(4523) Making History on the

 Margins: The China-SE Asia Borderlands (also ANTHR 723[7523]) \# @ (HA-AS)Spring. 4 credits. Next offered 2008-2009. M. Fiskesjo.]
[ANTHR 426(4426) Ideology and Social Production (also ANTHR 726[7426]) © (SBA-AS)
Spring. 4 credits. Next offered 2008-2009. S. Sangren.]

## ANTHR 429(4429) Anthropology and Psychoanalysis : (SBA-AS)

Fall. 4 credits. S. Sangren.
Psychoanalysis holds that desire emerges from the clash between individuals' predisposition and the need to accommodate to others in society. Yes anthropology has been resistant to the role that psychoanalytic theory might play in linking individual desire to culture. Does psychoanalysis have anything to offer cultural anthropology? Can understanding of collective institutions be advanced with reference to theories of individual motivation and desire? Conversely, can collective life be understood without reference to individual motivation and desire? Is desire best understood as sexual in nature, or is it better understood in more abstract and existential terms. With such questions in mind, this course surveys anthropology's engagements with psychoanalysis. We read theoretical works as well as ethnographically grounded case studies on topics ranging from religious experience, mythic narratives, the cultural construction of gender and desire, and modern popular culture.
[ANTHR 436(4436) Tourist Encounters, Tourist Spaces (5BA-AS)
Fall. 4 credits. Next offered 2009-2010. J. Schoss.]

ANTHR 437(4437) Anthropology of Development (also ANTHR 737[7437]) © (CA-AS)
Fall. 4 credits. M. Welker.
This course provides an anthropological perspective on international development. After reading orthodox theories of development and considering them in historical context, we will examine ethnographic accounts of postcolonial development that draw on political economy and poststructuralist traditions. The final portion of the course looks critically at the emergence of discourses such as participation, empowerment, social capital, civil society, and sustainability in mainstream development.

## [ANTHR 439(4439) Sovereignty and

 Biopolitics © (CA-AS)Spring. 4 credits. Next offered 2008-2009. M. Fiskesjo.]

## [ANTHR 440(4440) Ethnographic

 Approaches to Studying Professionals and Institutions (SBAAS)Spring. 4 credits. Next offered 2008-2009. D. Boyer.]

## [ANTHR 442(4542) Violence, Symbolic

 Violence, Terror, and Trauma in South Asia and the Himalayas (also ANTHR 642[6542]) © (CA-AS)Fall. 4 credits. Next offered 2009-2010. D. Holmberg.]

ANTHR 444(4444) God(s) and the Market (also ANTHR 744[7444]) © (CA-AS) Spring. 4 credits. H. Miyazaki.
This seminar is intended to bring together students interested in religion and students interested in business, economy and finance. Following a long tradition in anthropology and sociology to investigate religion and economy as parallel domains of social life, we will investigate a series of themes that encompass the two domains, such as anthropomorphism, accounting and numbers, discipline and rationality, belief and doubt and hope and redemption. The course will introduce classic anthropological and sociological texts on the intersections between religion and economy as well as more recent work on money, finance and religious fundamentalism.

## ANTHR 450(4852) Europe (also ANTHR 750[7852])

Fall. 4 credits. D. Boyer, D. Greenwood, and J. Rigi.
Rotating seminar dealing with diverse topics related to the anthropology of Europe Examples are postsocialist transitions, the ethnographic representation of transnational relations and institutions in Europe, integration in the West and disintegration in the East of Europe, immigration, regionalism, and ethnic conflict. Each year it is staffed by one of the three Europeanists in the Department of Anthropology-Dominic Boyer (post-Socialist transition), Davydd Greenwood (ethnicity and nationalism), and Jakob Rigi (pest-Socialist capitalism). The course serves to balance the area curriculum of the department by adding Europe to our offerings. It also serves the Modern European Studies Concentration and the International Relations Concentration directly as an additional, much-needed
offering at the upper levels. Because the topics and professors shift, students may take more than one of these seminats.

## ANTHR 455(4455) Anthropology in the Real World (SBA-AS)

Spring. 4 credits. M. Welker
Designed to expose students to the range of ways and fields within which practitioners employ anthropological theory, methods and perspectives. Course format includes both seminar discussions and workshop sessions with invited speakers. Both the invited speakers and the discussion topics represent different broadly defined fields in which anthropologists practice. Through class discussion and writing, students are expected to critically consider such issues as: research ethics, professional responsibility, the academic versus activist role, methodological practices, and the relationship between individual practitioners and the national, intemational, and organization contexts within which they work. Students produce a major research paper examining a particular field of "practical" anthropology of their interest.

## [ANTHR 475(4475) Governmentality,

 Citizenship, and Indigenous Political Theory (SBA-AS)Spring. 4 credits. Next offered 2008-2009. A. Simpson.]
[ANTHR 476(4476) Semiotics Beyond the Social (also ANTHR 776[7476]) (CAAS)
Fall. 4 credits. Next offered 2008-2009 E. Kohn.]

## ANTHR 478(4478) Taboo and Pollution

 Spring. 4 credits. M. Fiskesjo.This course introduces students to the anthropology of taboo, dirt, cleanliness and purification. We'll examine the latest attempts to re-think and understand these classic topics through a range of cases, including sexual and blood taboos; ideas of racial or ethnic purity and purification; taboos governing food choices or religious practices; "primitive" fear and avoidance; as well as contemporary conceptions of filth and waste and their treatment in Western societies. We'll survey a wealth of writings on these topics, from anthropology (Douglas, Valeri, and others) as well as from psychology and literary studies (Freud, Kristeva, etc.).

## [ANTHR 479(4479) Ethnicity and Identity

 Politics: An Anthropological Perspective (also AAS 479[4790]) (SBA-AS)Spring. 4 credits. V. Munasinghe. The most baffling aspect of ethnicity is that while ethnic sentiments and movements gain ground rapidly within the international arena, the claim that ethnicity does not exist in any objective sense is also receiving increasing credence within the academic community. How can something thought "not to exist" have such profound consequences in the real world? In lay understandings, ethnicity is believed to be a "natural" disposition of humanity. If so, why does ethnicity mean different "things" in different places? Anthropology has much to contribute to a greater understanding of this perplexing phenomenon. After all, the defining criterion for ethnic groups is that of cultural distinctiveness. Through ethnographic case studies, this course will examine some of the key anthropological approaches to ethnicity. We will explore the relationship of ethnicity to
culture, ethnicity to nation, and ethnicity to state to better understand the role ethnicity plays in the identity politics of today.
[ANTHR 480(4480) Anthropology and Globalization (also ANTHR 680[6480]) (CA-AS)
Fall. 4 credits. Next offered 2009-2010. Staff.]

## II. Anthropological Archaeology

Anthropological archaeology studies the diverse societies of the past using the material traces they left behind in the archaeological record. In addition to studying artifacts, archaeologists use unique methods to study the settings in which artifacts were produced and used by examining regional settlement patterns, the structure of sites and communities, the organization of activities, and ancient symbolism and social relations. The concerns of anthropological archaeology range from basic questions about continuity and change in the past, to application of hard science methods to date sites and determine the sources of artifacts, criticism of the uses to which the past is put in contemporary society, and protection of the archaeological record. Anthropological archaeology can be distinguished from other forms of archaeology (such as Classical or Art Historical archaeology) based on its emphasis on holistically studying past cultural systems, and by the theories and approaches it shares with sociocultural and biological anthropology. There are numerous career opportunities for anthropological archaeologists, including work with museums, government agencies, and historic preservation groups in addition to academic employment. Private companies engaged in federally mandated cultural resource management (or CRM) archaeology employ thousands of archaeologists in the United States, and similar management programs exist in many other countries
ANTHR 100(1200) Ancient Peoples and Places (also ARKEO 100[1200]) \# (a) (HA-AS)
Fall. 3 credits. J. Henderson
Broad introduction to archaeology-the study of material remains to answer questions about the human past. Case studies highlight the variability of ancient societies and illustrate the varied methods and interpretive frameworks archaeologists use to reconstruct them. This course can serve as a platform for both archaeology and anthropology undergraduate majors.

## [ANTHR 203(2200) Early People: The

 Archaeological and Fossil Record (also ARKEO 203[2200]) \# (HA-AS)Spring. 3 credits. Next offered 2008-2009. T. Volman.]
[ANTHR 215(2215) Stone Age Art (also ARKEO 215[2215]) \# (CA-AS)
Fall. 3 credits. Next offered 2008-2009. T. Volman.]

ANTHR 235(2235) Archaeology of North American Indians (also ARKEO 235[2235] AIS/AM ST 235[2350]) \# (HAAS)
Spring. 3 credits. K. Jordan.
Introductory course surveying archaeology's contributions to the study of American Indian cultural diversity and change in North America north of Mexico. Lectures and readings examine topics ranging from the debate over
when the continent was first inhabited to present-day conflicts between Native Americans and archaeologists over excavation and the interpretation of the past. Reviews important archaeological sites such as Chaco Canyon, Cahokia, Lamoka Lake, and the Little Bighorn battlefield. A principal focus is on major transformations in lifeways such as the adoption of agriculture, the development of political-economic hierarchies, and the disruptions that accompanied the arrival of Europeans to the continent.

## ANTHR 242(2201) Early Agriculture (also

 ARKEO 242[2201]] © (HA-AS)Spring. 3 credits. N. Russell.
Throughout most of the human career, people survived by hunting and gathering wild foods The advent of food production is one of the most profound changes in (pre)history. This course examines the current evidence for the appearance and spread of agriculture (plant and animal domestication) around the world. We will consider definitions of agriculture and domestication, the conditions under which it arises, the consequences for those who adopt it, and why it has spread over most of the world.

## [ANTHR 317(3217) Stone Age

Archaeology (also ARKEO 317[3217]) (HA-AS)
Fall. 4 credits. Next offered 2008-2009. T. Volman.]
[ANTHR 330(3230) Humans and Animals (also ARKEO 330[3230]) © (CA-AS) Fall. 4 credits. Next offered 2009-2010. N. Russell.]
[ANTHR 332(3232) Politics of the Past (also ARKEO 332[3232]) © (HA-AS) Fall. 4 credits. Next offered 2009-2010. N, Russell.]
[ANTHR 348(3248) Iroquois Archaeology (also ANTHR 648[6248], ARKEO 348/648[3248/6248], AIS 348/648[3480/6480) \# (HA-AS)
Fall. 4 credits. Next offered 2008-2009. K. Jordan.]
[ANTHR 355(3255) Ancient Mexico and Central America (also ARKEO 355[3255]) © (HA-AS)
Spring. 4 credits. Next offered 2008-2009. J. Henderson.]

ANTHR 356(3256) Archaeology of the Andes (also ARKEO 356[3256]) © \# (HA-AS)
Spring. 4 credits. J. Henderson. A survey of the rise and decline of civilizations in the Andean region of western South America before the European invasion. Key topics include the use of invasion-period and ethnographic information to interpret precolumbian societies, the emergence of settled farming life, and the development of the state.

## ANTHR 369(3269) Gender and Age in Archaeology [also ANTHR 669[6269], ARKEO 369/669[3269/6269], FGSS 370/670[3700/6700]) (SBA-AS)

Fall. 4 credits. N. Russell.
In recent years, feminist theory has begun to have an impact on archaeological thought. It is now recognized that gender is likely to have been a relevant dimension of social organization in past societies. Some archaeologists are also trying to take into account the differing interests and experiences of children, adults of reproductive age, and
the elderly. This course is not limited to any period or geographical area, but ranges widely in examining how feminist theory has been applied to archaeological data and models. Considers whether it is necessary to identify women and men, adults and children in the archaeological record to take gender and age into account. Also examines the uses of archaeological data by contemporary
feminists.

## ANTHR 370(3270) Environmental Archaeology [also ANTHR 670[6270], ARKEO 370/670[3270/6270]) (PBS Supplementary List)

Fall. 4 credits. T. Volman.
A survey of selected topics in paleoenvironmental analysis and reconstruction, with emphasis on how they inform interpretations of the archaeological record. The course ranges broadly from a general consideration of human ecology and the role of environment in culture change to detailed study of specific techniques and approaches.

## ANTHR 372(3272) Hunters and Gatherers (also ANTHR 672[6272], ARKEO 372/672[3727/6272]) \# © (SBA-AS)

Fall. 4 credits. T. Volman. A survey of contemporary and recent peoples with economies based completely or mainly on hunting and gathering. Selected societies from various parts of the world will be examined to compare aspects of technology, subsistence practices, organization and beliefs. The impact of contact with more economically advánced societies will be considered.

## ANTHR 456(4256) Mesoamerican

 Religion, Science, and History (also ARKEO 456[4256]) © (CA-AS)Spring. 4 credits. J. Henderson.
An introduction to belief systems in ancient Mexico and Central America, emphasizing the blending of religion, astrology, myth, history, and prophecy. Interpreting text and image in pre-Columbian books and inscriptions is a major focus.
[ANTHR 458(4258) Archaeological Analysis (also ANTHR 658[6258], ARKEO 458/658[4258/6258]) (SBAAS)
Spring. 4 credits. Limited to 15 students. Prerequisite: archaeology course or permission of instructor. Next offered 2008-2009. J. Henderson.]

## ANTHR 460(4260) Field and Analytical

 Methods in Archaeology (also ARKEO 460[4260]) " (SBA-AS)Spring. 4 or 6 credits. K. Jordan.
This course provides a hands-on introduction to field, laboratory, and analytical methods in archaeology, focusing on historic-period American Indian sites in the Finger Lakes region. Students collectively will generate new archaeological data, beginning the semester with study of an under-considered archaeological museum collection, and moving to survey and excavation at an archaeological site as the weather permits. Students will have an opportunity to formulate and test their own research designs in laboratory and field settings. Readings will provide an in-depth immersion into field and laboratory methodology, research design, and the culture history and material culture typologies appropriate to the site and era. In addition to laboratory and field work, students will write a 15 -page term paper based on original data which can draw on museum
collections, field data, documentary sources, or a combination of these sources. Most class time will be spent off-campus; transportation will be arranged by the instructor. Permission of the instructor is required.

## [ANTHR 462/762(4262/7262) Catalhoyuk and Archaeological Practice (also ARKEO 462/762[4262/7262]) © \#

 (HA-AS)Spring. 4 credits. Next offered 2009-2010. N. Russell.]

## ANTHR 463(4263) Zooarchaeological Method (also ARKEO 463[4263]) (PBS Supplementary List)

Fall. 5 credits. N. Russell.
This is a hands-on laboratory course in zooarchaeological method: the study of animal bones from archaeological sites. It is designed to provide students with a basic grounding in identification of body part and taxon, aging and sexing, pathologies, taphonomy, and human modification. We will deal only with mammals larger than squirrels. While we will work on animal bones from prehistoric Europe, most of these skills are easily transferable to the fauna of other areas, especially North America. This is an intensive course that emphasizes laboratory skills in a realistic setting, You will analyze an assemblage of actual archaeological bones. It is highly recommended that students also take the course in Zooarchaeological Interpretation (ANTHR/ARKEO 464) offered in the spring.

## ANTHR 464(4264) Zooarchaeological

 Interpretation (also ARKEO 464[4264]) (PBS Supplementary List)Spring. 4 credits. Prerequisite: permission of instructor. N. Russell.
This course follows from last semester's Zooarchaeological Method. We will shift our emphasis here from basic skills to interpretation, although you will continue to work with archaeological bones. We will begin by examining topics surrounding the basic interpretation of raw faunal data: sampling, quantification, taphonomy, seasonality. We will then explore how to use faunal data to reconstruct subsistence patterns, social structure, and human/animal relations.
[ANTHR 467(4267) Origins of Agriculture (also ARKEO 467[4267]) " (HA-AS) Spring. 4 credits. Next offered 2008-2009. N. Russell.]

ANTHR 470(4270) Political Economy in Archaeology (also ANTHR 770[7270], ARKEO 470/770[4270/7270]) \#(SBAAS)
Spring. 4 credits. K. Jordan.
Political economy is a theoretical approach that emphasizes power relations, social tensions and contradictions, and how they mediate access to wealth and basic resources. This seminar explores applications of politicaleconomic theory in archaeological analysis.
The course begins with some key approaches to political economy within sociocultural anthropology to assess how these works can (and cannot) assist the interpretation of archaeological evidence. Particular attention will be paid to questions of methodology: do certain field or analytical techniques facilitate or hinder political-economic interpretations? Case studies apply political-economic approaches to past societies at a variety of analytic and social scales, illustrating the intersection between archaeological political economy and issues of culture change,
domination and resistance, ideology, gender, and agency.
[ANTHR 472(4272) Historical Archaeology of Indigenous Peoples (also ANTHR 772[7272], ARKEO 472/772[4272/7272], AM ST 472[4272]) " (HA-AS)
Spring. 4 credits. Next offered 2009-2010. K. Jordan.]

## [ANTHR 494(4294) Seminar in

 Archaeology: The Archaeology of Human Origins (also ARKEO 494[4294]) (HA-AS)Spring. 4 credits. Next offered 2008-2009.
T. Volman.]

## III. Biological Anthropology

Biological anthropology is the subfield of anthropology that explores the physical diversity, evolutionary history, and behavioral potential of our species. Consistent with anthropology more generally, biological anthropology is concerned with human variation. The distinctive perspective of this subfield is that it examines human variation within the framework of evolutionary theory. Analyses of both biology and culture, and of the interaction between the two, mark the broad boundaries of this discipline. Within that wide scope, specific areas of inquiry are diverse, including fossil studies, primate behavior, nutrition and development, sexual behavior, parental investment, molecular and population genetics, adaptation to environmental stress, disease evolution, life history analysis, and more. Some of the most pressing social issues of our time fall within the domain of biological anthropology as well as a range of professions: the controversy over evolution and intelligent design; race, gender, and genetic determinism; the control of disease; the roots of aggression; and conservation and the role of humans in ecological systems. Although the number of Anthropology courses offered in this subfield are limited, students can pursue their interests through a variety of related courses in other departments and by constructing independent study courses with specific faculty members.

## [ANTHR 101(1300) Human Evolution: Genes, Behavior, and the Fossil Record (PBS Supplementary List)

Fall. 3 credits. Lab usage and maintenance fee: \$5. M. Small.
This course provides a broad introduction to biological anthropology, the subfield of anthropology that explores the physical diversity, evolutionary history, and behavioral potential of our species. In addition to lectures, the class includes a weekly lab and discussion section. In sections, students have the opportunity to study our substantial collection of casts of early human fossils, as well as our comparative primate and nonprimate skeletal materials. Sections also include a series of discussions on the influence of culture on biology, and of biology on culture, related to pressing social issues such as race, genetic determinism, cloning, sexual taboos, and the controversy
surrounding evolution and intelligent design.

## [ANTHR 211(2411) Sophomore Seminar:

 Nature and Culture © (SBA-AS)Spring. 4 credits. Limited to 15 students.
Sophomore writing seminar. Next offered 2008-2009. S. Sangren.

Special seminar sponsored by the John S . Knight Institutes Sophomore Seminars Program. Seminars offer discipline-specific study within an interdisciplinary context. While not restricted to sophomores, the seminars aim at initiating students into the disciplines outlook, discourse community, modes of knowledge, and ways of articulating that knowledge. Limited to 15 students. Special emphasis is given to strong thinking and writing and to personalized instruction with top university professors.]

## ANTHR 275(2750) Human Biology and Evolution (also Ns 275[2750])

Fall. 3 credits. J. D. Haas.
For description, see NS 275.
[ANTHR 305(3305) Anthropology of Parenting (8BA-AS)
Spring. 4 credits. Next offered 2008-2009 M. Small.]

## ANTHR 390(3390) Primate Behavior and

 Ecology (PBS Supplementary List)Spring. 4 credits. Prerequisite: ANTHR 101
or permission of instructor. A. Clark Arcadi. The course will investigate all aspects of nonhuman primate life. Based on the fundamentals of evolutionary theory, group and inter-individual behaviors will be presented. In addition, an understanding of group structure and breeding systems will be reached through an evaluation of ecological constraints imposed on primates in different habitats. Subjects include: primate taxonomy, diet and foraging, predation, cooperation and competition, social ontogeny, kinship, and mating strategies.

## ANTHR 490(4390) Topics In Biologlcal Anthropology

Spring. 4 credits. Prerequisites: ANTHR
101, 390, or permission of instructor. A. Clark Arcadi.

Current topics in biological anthropology are explored. Topics change each semester. For further information, contact the professor or department office. Topic for Spring 2008: Aggression and Reconciliation in Primates and Humans.

## IV. Honors, Fleld Research, and Independent Study

## ANTHR 483(4983) Honors Thesis Research

Fall. 3 credits. Prerequisite: permission of Honors Committee. Staff.
Research work supervised by the thesis advisor, concentrating on determination of the major issues to be addressed by the thesis, preparation of literature reviews, analysis of data, and the like. The thesis advisor will assign the grade for this course.

## ANTHR 484(4984) Honors Thesis Writo-up

 Spring. 2 credits. Staff.Final write-up of the thesis under the direct supervision of the thesis advisor, who will assign the grade for this course.
ANTMR 491(4991) Honors Workshop I Write-Up
Fall. 1 credit. Staff.
Course will consist of several mandatory meetings of all thesis writers with the honors chair. These sessions will inform students about the standard thesis production timetable, format and content expectations, and deadlines; expose students to standard reference sources; and introduce students to
each other's projects. The chair of the Honors Committee will assign the grade for this course.

## ANTHR 49244992) Honore Workshop II

Spring. 2 credits. Staff,
Course will consist of weekly, seminar-style meetings of all thesis writers until midsemester, under the direction of the honors chair. This second semester concentrates on preparation of a full draft of the thesis by mid-semester, with ample time left for revisions prior to submission. Group meetings will concentrate on collective reviewing of the work of other students, presentation of research, and the like.

## ANTHR 497(4910) Independent Study: Undergrad I

Fall or spring. Credit TBA. Prerequisite: undergraduate standing. Staff. Independent reading course in topics not covered in regularly scheduled courses. Students select a topic in consultation with the faculty member who has agreed to supervise the course work.

## ANTHR 498(4920) Independent Study:

 Undergrad IIFall or spring. Credit and Times TBA.
Prerequisite: undergraduate standing. Staff. For description, see ANTHR 497, section II, "Honors and Independent Study."

## Relevant courses in other departments

[BIOPL 247(2470) Ethnobiology
Fall. 3 credits. Next offered 2008-2009. D. M. Bates.

For description, see BIOPL 247.]
BIOPL 348(3480) The Healing Forest Spring. 2 credits. D. M. Bates and E. Rodriguez.

## MUSIC 1041302) Introduction to World

 Music II: AsiaSpring. 3 credits. M. Hatch.
music 245(1341) Introduction to Indonesia through Its Arts
Fall and spring. 3 credits. Prerequisite: permission of instructor. M. Hatch.

## [NS/HD 347[3471], BESOC

347(3471) Human Growth and Development: Blological and Behavioral Interactions
Spring. 3 credits. Next offered 2008-2009.
J. Haas and S. Robertson.]

## NS 630(6300) Anthropormetric

 AssessmentSpring. 1 credit. J. Haas.

## V. Graduate Seminars

The graduate program in anthropology is described in much greater detail on the anthropology department web page at falcon. arts.comell.edu/Anthro/. The seminars described immediately below pertain to the program in sociocultural anthropology. For information about graduate study in archaeology and biological anthropoldgy, see the anthropology department web page.
A core set of seminars is required of all graduate students in sociocultural anthropology: ANTHR 600 and 601 . ANTHR 603 is strongly recommended. These courses are open to graduate students from other related fields. This sequence, and the graduate
curriculum in general, is premised on the idea that anthropology is best defined as the comparative study of human social life. This definition resists institutional pressures in the academy to distinguish social science from humanistic or cultural studies and scholarly from more worldly applications. Our most important method, ethnography, is at once scientific and humanistic; disciplinary aspirations refuse to view cultural interpretation and analytic explanation as separable values. Furthermore, theory in anthropology is directly related to practice in the world whether in relation to research or more action-oriented pursuits. Consequently, the core sequences as well as most other courses for graduate students are oriented explicitly toward subverting an ideological construction of social life as separable into cultural and social (or political-economic) domains.

## ANTHR 600(6000) Proseminar: Culture and Symbol <br> Fall. 6 credits. E. Kohn.

Focuses on an appreciation of symbolic, expressive, and representational forms and processes both as producers and products of social activities. Through the study of symbolic anthropology, structuralism, exchange, myth and ritual, religion, gender, personhood, linguistics, semiology, etc., the course investigates how identity and meaning are linked to the practical exigencies of social life. While emphasizing aspects of the discipline generally associated with cultural anthropology, the course endeavors to set the stage for a dialectical understanding of social, political, economic, and symbolic activities as interrelated phenomena. The works of de Saussure, LeviStrauss, Dumont, Geertz, Victor Turner, Sahlins, among others, as well as contemporary theories are given careful attention.

## ANTHR 601(6010) Proseminar: Soclal Organization

Spring. 6 credits. J. Rigi.
Focuses on linkages between culture and social institutions, representations and practices. The nature of these linkages is debated from strongly contesting points of view in social theory (structuralist, poststructuralist, utilitarian, hermeneutic, Marxist). Unlike debates in critical theory where the form of contestation has been mainly philosophical, in anthropology, these issues have developed in ethnographic analyses. The course briefly surveys kinship theory and economic anthropology with a focus on implications for general issues in social theory. Discussion of attempts to develop dialectical syntheses around the motion of "practice" follows. The issues addressed in this section carry over into the next, colonialism and post-colonialism, in which poststructuralist readings of history are counterposed to Marxist ones. Finally, Lacanian and Marxist visions of ideology as they relate to anthropological theory and ethnographic analysis are examined with particular emphasis on the cultural and social production of persons.

## [ANTHR 603(6403) Ethnographic Field

Methods (also ANTHR 403[4403])
Fall. 4 credits. Next offered 2008-2009.
V. Santiago-Irizarry.]

## ANTHR 621(6421) Gender and Culture

 (also FaSs 631[6310])Fall. 4 credits. K. March.
For description, see ANTHR 321.

ANTHR 624(6424) Ethnoracial Identity in Anthropology, Language, and Law (also AM ST 642[6424], LSP 624[6424])
Spring. 4 credits. V. Santiago-Irizarry This course examines the role that both law and language, as mutually constitutive mediating systems, occupy in constructing ethnoracial identity in the United States. We approach the law from a critical
anthropological perspective, as a signifying and significant sociocultural system rather than as an abstract collection of rules, norms, and procedures, to examine how legal processes and discourses contribute to processes of cultural production and reproduction that contribute to the creation and maintenance of differential power relations. Course material draws on anthropological, linguistic, and critical race theory as well as ethnographic and legal material to guide and document our analyses.
[ANTHR 629(6543) Chinese Ethnology
Fall. 4 credits. Next offered 2010-2011.
S. Sangren and M. Fiskesjo.]

## ANTMR 635(7520) Southeast Asla:

 Readings in Special ProblemsFall or spring. Credit TBA. Staff.
Independent reading course on topics not covered in regularly scheduled courses. Students select a topic in consultation with the faculty member who has agreed to supervise the course work.

## ANTHR 641(7530) South Asla: Readings

 in Special ProblemsFall or spring. Credit TBA. Staff. Independent reading course in topics not covered in regularly scheduled courses. Students select a topic in consultation with the faculty member who has agreed to supervise the course work.

## [ANTHR 642(6542) Violence, Symbolic

 Violence, Terror and Trauma in South Asla and the Himalayas (also ANTMR 442(4542])Fall. 4 credits. Next offered 2009-2010.
D. Holmberg.]

ANTHR 644(6440) Research Design
Spring. 4 credits. D. Holmberg. This seminar focuses on preparing a full-scale proposal for anthropological fieldwork for a dissertation. Topics include identifying of appropriate funding sources; defining a researchable problem; selecting and justifying a particular fieldwork site; situating the ethnographic case within appropriate theoretical contexts; selecting and justifying appropriate research methodologies; developing a feasible timetable for field research; ethical considerations and human subjects protection procedures; and preparing appropriate budgets. This is a writing seminar, and students will complete a proposal suitable for submission to a major funding agency in the social sciences.

## [ANTHR 648(6248) Iroquois Archaeology (also ANTHR 348[3248], ARKEO 348/648[3248/8248], AIS <br> 348/648[3480/8480])

Fall. 4 credits. Next offered 2008-2009. K. Jordan.]
[ANTHR 650 6450) Social Studies of Economics and Finance
Fall. 4 credits. Next offered 2008-2009. H. Miyazaki.]

## [ANTHR 652(6452) Evidence:

 Ethnography and Mistorical MethodFall. 4 credits. Next offered 2009-2010.
H. Miyazaki.]

ANTHR 655(7550) East Asia: Readings in Special Problems
Fall or spring. Credit TBA. Staff. Independent reading course in topics not covered in regularly scheduled courses. Students select a topic in consultation with the faculty member who has agreed to supervise the course work.

## [ANTHR 656(6256) Maya History (also

 ARKEO 656[6256])Fall. 4 credits. Next offered 2008-2009. J. Henderson.]
[ANTHR 658(6258) Archaeological Analysis (also ANTHR 458[4258], ARKEO 458/658[4258/6258])
Spring. 4 credits. Next offered 2008-2009.
J. Henderson.]

ANTHR 661(6461) Anthropology of Organizations (also ANTHR 361[3461])
Spring. 4 credits. D. Greenwood, For description, see ANTHR 361.

## ANTHR 662(6462) Democratizing

 Research: Participation, Action, and Research (also ANTHR 362[3462])Fall. 4 credits. D. J. Greenwood.
For description, see ANTHR 362.
ANTHR 668(6468) Marx: An Overview of His Thought (also ANTHR 368[3468])
Spring. 4 credits. J. Rigi.
For description, see ANTHR 368
ANTHR 669(6269) Gender and Age in Archaeology (also ANTHR 369[3269], ARKEO 369/669[3269/6269])
Fall. 4 credits. N. Russell.
For description, see ANTHR 369
ANTHR 670(6270) Environmental Archaeology (also ANTHR 370[3720), ARKEO 370/670 [3270/6720])
Fall. 4 credits. T. Volman.
For description, see ANTHR 370.
[ANTHR 671(6371) Palaeoanthropology of South Asia (also BIOEE 671[6710], ASIAN 620)
Fall. 3 credits. Next offered 2008-2009
K. A. R. Kennedy.]

ANTHR 672(6272) Hunters and Gatherers [also ANTHR 372[3272], ARKEO 372/672[3272/6272])
Fall. 4 credits. T. Volman.
For description, see ANTHR 372.
[ANTHR 673(6373) Human Evolution: Concepts, History, and Theory (also BIOEE 673(6730])
Fall. 3 credits. Prerequisite: one year introductory biology, ANTHR 101, or permission of instructor. Offered alternate years. Next offered 2008-2009.
K. A. R. Kennedy.]
[ANTHR 679(6479) Technocracy: Anthropological Approaches
Fall. 4 credits. Next offered 2009-2010. A. Riles.]
[ANTMR 680(6480) Anthropology and Clobalization (also ANTHR 480[4480])
Fall. \& credits. Next offered 2009-2010. Staff.]
[ANTHR 682(6482) Perspectives on the Nation
Spring. 4 credits. Next offered 2008-2009.
V. Munasinghe.]

ANTHR 688(6488) Masks of Power and Strategles of Resistance and Subverslon (also ANTHR 388[3498]) Fall. 4 credits. J. Rigi.
For description, see ANTHR 388.

## ANTHR 701(7910) Independent Study:

 Grad IFall or spring. Credit TBA. Prerequisite: graduate standing. Staff.
Independent reading course in topics no covered in regularly scheduled courses.
Students select a topic in consultation with the faculty member who has agreed to supervise the course work.

## ANTHR 702(7920) Independent Study:

 Grad IIFall or spring. Credit TBA. Prerequisite: graduate standing. Staff.
For description, see ANTHR 701

## ANTHR 703(7930) Independent Study:

 Grad IIIFall or spring. Credit TBA. Prerequisite: graduate standing. Staff.
For description, see ANTHR 701.
ANTHR 720(7420) Development of Anthropological Thought (also ANTHR 420[4240]]
Fall. 4 credits. H. Miyazaki.
For description, see ANTHR 420.
[ANTHR 723(7523) Making History on the Margins: The China-SE Asia Borderlands (also ANTMR 423[4523])
Spring. 4 credits. Next offered 2008-2009. M. Fiskesjo.]
[ANTHR 726(7426) Ideology and Social Production (also ANTHR 42s[4426]) Spring. 4 credits. Next offered 2008-2009. S. Sangren.]

ANTMR 739(7545) Peoples and Cultures of the Himalayas (also ANTMR 339[3545])
Spring. 4 credits. K. March.
For description, see ANTHR 339.

## ANTHR 750(7852) Europe (also ANTHR

 450[4582])Fall. 4 credits. D. Boyer, D. Greenwood, and J. Rigi.
For description, see ANTHR 450.
[ANTHR 762(7262) Catalhoyuk and Archaeological Practice (also ANTHR 462[4282], ARKEO 462762[4262/7262])
Spring. 4 credits. Next offered 2009-2010. N. Russell.]

ANTHR 770(7270) Political Economy In Archaeology (also ANTHR 470[4270], ARKEO 470/770[4270/7270])
Spring. 4 credits. K. Jordan.
For description, see ANTHR 470.
[ANTHR 772(7272) Historlcal Archaeology of Indigenous Peoples (also ANTHR 472[4272], ARKEO 472772[4272/7272], AM ST 472/6724720/6272])
Fall. 4 credits. Next offered 2009-2010. K. Jordan.]

## [ANTHR 776(7476) Semiotics Beyond the Social (also ANTHR 476[4476])

Fall. 4 credits. Next offered 2008-2009.
E. Kohn.]
[ANTHR 784(7684) Africa in the Global Economy (also ANTHR 384[3684)
Fall. 4 credits. Next offered 2009-2010. J. Schoss.]

## ARABIC AND ARAMAIC

See "Department of Near Eastern Studies."

## ARCHAEOLOGY

S. Baugher, director (Landscape Architecture), K. M. Clinton, director of graduate studies (Classics), J. E. Coleman (Classics), F. Gleach (Anthropology) K. L. Gleason (Landscape Architecture), J. S. Henderson (Anthropology), K. Jordan (Anthropology), K. A. R. Kennedy (Ecology and Evolutionary Biology), S. Manning (Classics), R. McNeal (Asian Studies), C. Monroe (Near Eastern Studies), D. I. Owen (Near Eastern Studies), A. Ramage (History of Art), E. Rebillard (Classics), N. Russell (Anthropology), B. S. Strauss (History), M. A. Tomlan (City and Regional Planning), T. P. Volman, director of undergraduate studies (Anthropology), J. R. Zorn (Near Eastern Studies).

Archaeology is an interdisciplinary field at Cornell, which is one of the few universities in the United States to offer a separate archaeology major and a master's degree Program faculty members, affiliated with several departments, coordinate course offerings and help students identify opportunities for fieldwork, graduate study, and professional positions.

## The Major

Prospective majors must complete ARKEO 100 or one of the basic courses as defined below before they will be admitted to the major.
Because the major draws on the teaching and research interests of faculty from many departments to present a broad view of the archaeological process, interested students should discuss their course of study with a participating faculty member as early as possible. In some areas of specialization, intensive language training should be coordinated with other studies as early as the freshman year.

Once admitted to the major, students must take at least 32 additional credits from the courses listed below, or from related fields selected in consultation witha major advisor of their choosing. The courses chosen should provide exposure to a broad range of cultures known through archaeology and the methods of uncovering and interpreting them. Sixteen of the credit hours should be at the 300 level or above. At least two courses must be taken from each of the following categories: II. Anthropological Archaeology; III. Classical, Near Eastern, and Medieval Archaeology; and IV. Methodology and Technology. Only 4 credits of ARKEO 300 Individual Study or other supervised study can count toward the major.
Courses basic to the discipline of archaeology are marked with the word "Basic" after the
number of credit hours. It is recommended that majors who are planning to pursue graduate studies in archaeology take at least two of the basic courses in each category. Further courses in languages and geology are also recommended
Honors. Honors in archaeology are awarded on the basis of the quality of an honors essay and the student's overall academic record. Prospective honors students should have at least a 3.5 GPA in the major and a 3.0 grade point average overall. They should consult with the director of undergraduate studies by the beginning of the senior year. The honors essay is normally prepared over two semesters in consultation with a faculty advisor during the senior year. Students may enroll in ARKEO 481 Honors Thesis Research, and to complete the thesis, they may enroll in ARKEO 482 Honors Thesis Writeup. Both courses are offered in the fall and spring. Only ARKEO 481 may count toward hours for completion of the archaeology major requirements. The credit hours for these courses are variable.

Fieldwork. Every student should gain some practical experience in archaeological fieldwork on a project authorized by his or her advisor. This requirement may be waived in exceptional circumstances. The Jacob and Hedwig Hirsch bequest provides support for a limited number of students to work at excavations sponsored by Cornell and other approved institutions.

## The Concentration

Students in Cornell schools and colleges other than Arts and Sciences may elect a concentration in archaeology. To concentrate in archaeology, the student must complete five courses, all with a grade of C or better. The five courses must consist of either (1) ARKEO 100 and four other courses from categories IIIV (described above), at least three of which must be basic courses, or (2) five courses from categories II-IV, at least four of which must be basic courses. Concentrators are encouraged to gain some fieldwork experience. They are eligible for Hirsch Scholarships in support of fieldwork on the same basis as majors.

## First-Year Writing Seminars

For course descriptions, see the First-Year Writing Program brochure.

## I. Introductory Courses and Independent Study Courses

ARKEO 100(1200) Ancient Peoples and Places (also ANTHR 100[1200]) \# a (HA-AS)
Fall. 3 credits. Basic. J. Henderson. Broad introduction to archaeology: the study of material remains to answer questions about the human past. Case studies highlight the variability of ancient societies and illustrate the varied methods and interpretive frameworks archaeologists use to reconstruct them. This course can serve as a platform for both archaeology and anthropology undergraduate majors.

## ARKEO 300(3000) Individual Study in Archaeology and Related Fields

Fall and spring. Credit TBA. Prerequisite: ARKEO 100 or permission of instructor. Undergraduate students pursue topics of particular interest under the guidance of a faculty member.

## ARKEO 481(4981) Honors Thesis

 ResearchFall or spring. 4 credits, variable.
Prerequisite: admission to honors program Independent work under the close guidance of a faculty member.

## ARKEO 482(4982) Honors Thesis Writeup

Fall or spring. 4 credits, variable.

## ARKEO 600(6000) Special Topics in

 ArchaeologyFall and spring. 4 credits, variable. Graduate students pursue advanced topics of particular interest under the guidance of a faculty member(s).
ARKEO 681-682(8901-8902) Master's Thesis
681, fall; 682, spring. 4 credits, variable. Prerequisite: master's students in archaeology. S-U grades only.
Students, working individually with faculty member(s), prepare a master's thesis in archaeology.

## II. Anthropological Archaeology

[ARKEO 203(2200) Early People: The Archaeological and Fossil Record (also ANTHR 203[2200])
Spring. 3 credits. Basic. Next offered 20082009. T. P. Volman.

For description, see ANTHR 203.]
[ARKEO 215[2215) Stone Age Art (also ANTHR 215[2215])
Fall. 3 credits. Basic. Next offered 20082009. T. P. Volman.]

## ARKEO 235(2235) Archaeology of North American Indians (also ANTHR 235[2235], AIS/AM ST 235[2350]) <br> Spring. 3 credits. K. Jordan. <br> For description, see ANTHR 235.

## ARKEO 242(2201) Early Agriculture (also

 ANTHR 242[2201])Spring. 3 credits. Basic. N. Russell. For description, see ANTHR 242.
[ARKEO 317(3217) Stone Age
Archaeology (also ANTHR 317[3217])
Fall. 4 credits. Basic. Next offered 2008-
2009. T. P. Volman.]
[ARKEO 330(3230) Humans and Animals (also ANTHR 330[3230])
Fall. 4 credits. Next offered 2009-2010. N. Russell.]
[ARKEO 348(3248) Iroquois Archaeology (also ARKEO 648[6248], ANTHR 348/648[3248/6248], AIS $348 / 648[3480 / 6480)$
Fall. 4 credits. Next offered 2008-2009.
K. Jordan.]
[ARKEO 355(3255) Ancient Mexico and Central America (also ANTHR 355[3255])
Spring. 4 credits. Basic. Next offered 2008 2009. J. Henderson.]

ARKEO 356(3256) Archaeology of the Andes (also ANTHR 356[3256])
Spring. 4 credits. Basic. J. Henderson For description, see ANTHR 356.

ARKEO 369(3269) Gender and Age in Archaeology (also ARKEO 669[3269], ANTHR 369/669[3269/6269], FGSS 370/670[3700/6700])
Fall. 4 credits. N. Russell.
For description, see ANTHR 369.
ARKEO 372(3272) Hunters and Gatherers (also ARKEO 672[6272], ANTHR 372/672[3272/6272])
Fall. 4 credits. T. Volman
For description, see ANTHR 372.
ARKEO 456(4256) Mesoamerican Religion, Science, and History (also ANTHR 456[4256])
Spring. 4 credits. J. Henderson.
For description, see ANTHR 456.
[ARKEO 462(4262) Cataloyuk and Archaeological Practice (also ARKEO 762[7262], ANTHR 462/762[4262/7262])
Spring. 4 credits. Next offered 2009-2010. N. Russell.]

ARKEO 470\{4270 Political Economy in Archaeology (also ARKEO 770[7270], ANTHR 470/770[4270/7270])
Spring. 4 credits. K. Jordan.
For description, see ANTHR 470.
[ARKEO 472(4272) Historical Archaeology of Indigenous Peoples (also ARKEO 772[7272], ANTHR 472/772[4272/7272], AM ST 472[4272])
Spring, 4 credits. Next offered 2009-2010.
K. Jordan.]
[ARKEO 494(4294) Seminar in Archaeology: The Archaeology of Human Origins (also ANTHR 494[4294])
Spring. 4 credits. Next offered 2008-2009. T. P. Volman.]
[ARKEO 648(6248) Iroquois Archaeology [also ARKEO 348[3248], ANTHR 348/648[3248/6248], AIS 348/648[3480/6480])
Fall. 4 credits. Next offered 2008-2009. K. Jordan.]
[ARKEO 656(6256) Maya History (also ANTHR 656[6256])
Fall. 4 credits. Next offered 2008-2009. J. Henderson.]

ARKEO 669(6269) Gender and Age in Archaeology (also ARKEO 369[3269], ANTHR 369/669[3269/6269])
Fall. 4 credits. N. Russell.
For description, see ANTHR 369.
ARKEO 770(7270) Political Economy in Archaeology (also ARKEO 470[4270], ANTHR 470/770[4270/7270])
Spring. 4 credits. K. Jordan.
For description, see ANTHR 470.
[ARKEO 772(7272) Historical Archaeology of Indigenous Peoples (also ARKEO 472[4272], ANTHR 472/772[4272/7272], AM ST 472[4272]]
Fall. 4 credits. K. Jordan. Next offered 2009-2010.]

## III. Classical, Near Eastern, and Medieval Archaeology

[ARKEO 221(2726) Minoan-Mycenaean Art and Archaeology (also CLASS 221[2726])
Spring. 3 credits. Basic. Next offered 20082009. Staff.

For description, see CLASS 221.]
ARKEO 263(2663) Introduction to Biblical History and Archaeology (also NES 263[2663])
Fall. 3 credits. J. Zorn.
For description, see NES 263.
ARKEO 268(2668) Ancient Egyptian Civilization (also NES/JWST 268[2668])
Spring. 3 credits. Basic. C. Monroe.
For description, see NES 268.
ARIKEO 275(2661) Ancient Seafaring (also NES 261 [2661])
Spring. 3 credits. C. Monroe
For description, see NES 261.
ARKEO 276(2765) Religions of Ancient Israel (also NES 275[2675])
Spring. 3 credits J. Zorn.
For description, see NES 275.
ARKEO 365(3665) Ancient Iraq II: 2000331 BCE (also NES 365[3665])
Fall. 4 credits. D. Owen.
For description, see NES 365.
ARKEO 380(3800) Introduction to the Arts of China (also ART H 380[3800])
Fall. 4 credits. A. Pan.
For description, see ART H 380.
[ARKEO 434(4340) The Rise of Classical Greece (also CLASS 434[4734])
Spring. 4 credits. Recommended: CLASS 220 or 221 or ART H 220 or 221 , or permission of instructor. Next offered 2008-2009. Staff.]
[ARKEO 435(4207) Seminar on Roman Art and Archaeology (also CLASS 435[4735])
Spring. 4 credits. Prerequisite: permission of instructor. Next offered 2008-2009. Staff.]
[ARKEO 629(7729) The Prehistoric Aegean (also CLASS 629[7729]) 4 credits. Prerequisite: graduate standing; advanced undergraduates by permission of instructor. Next offered 2008-2009.
J. E. Coleman.I

ARKEO 630(6300) Seminar in Classical Archaeology (also CLASS 630[7750]) Spring. 4 credits. Staff.
For description, see CLASS 630.
CLASS 220(2700) Introduction to Art History: The Classlcal World
Fall. 4 credits. Basic. K. McDonnell.
For description, see CLASS 220.
[CLASS 240(2725) Greek Art and Archaeology
Spring. 3 credits. Basic. Next offered 20092010. J. Coleman.]
[CLASS 322(3722) Greeks and Their Neighbors (also ART H 328[3328]) Fall. 4 credits. Prerequisite: CLASS 220 or 221, or permission of instructor. Next offered 2009-2010. J. Coleman.]
[CLASS 329(3729) Greek Sculpture
4 credits. Next offered 2008-2009.
J. E. Coleman.]

ART H 322(3202) Arts of the Roman Empire (also CLASS 350[3740])
Spring. 4 credits. A. Ramage.
For description, see ART H 322.
LA 545(5450) The Parks and Fora of Imperial Rome
Spring. 3 credits. Prerequisites: advanced standing in design field, classics, or history
of art, or permission of instructor.
K. Gleason.

## IV. Methodology and Technology

[ARKEO 228(2727) Art and Archaeology in the Ancient Mediterranean World (also ART H 227[2227], CLASS 227[2727])
Fall. 4 credits. Next offered 2009-2010.
S. Manning.]
[ARKEO 256(2756) Practical Archaeology (also CLASS 256[2756)]
ARKEO 261(2610) Urban Archaeology (also LA/CRP 261[2610])
Fall. 3 credits. Basic. S. Baugher.
For description, see LA 261.
ARKEO 262(2620) Laboratory in Landscape Archaeology (also LA 262[2620])
Spring. 3 credits. S. Baugher.
For description, see LA 262.
NS 275(2750) Human Biology and Evolution (also ANTHR 275[2750]) (PBS)
Fall. 3 credits. Offered alternate years. J. D. Haas.

For description, see NS 275.
ARKEO 309(3090) Introduction to Dendrochronology (also ART H 309[3250], CLASS 330[3750])
Fall. 4 credits. Limited to 10 students. Prerequisite: permission of instructor. Letter grades only. S. Manning.
For description, see CLASS 330
ARKEO 370(3270) Environmental Archaeology (also ARKE0 670[6270], ANTHR 370/670[3270/6270])
Spring. 4 credits. T. P. Volman.
For description, see ANTHR 370.
[ARKEO 402(4020) Designing Archaeological Exhibits (also ARKEO 602[6020])
Spring. Variable credit. Letter grades only. Next offered 2008-2009. S. Baugher.]
ARKEO 437(4370) Geophysical Field Methods (also EAS 437[4370])
Fall. 3 credits. Prerequisite: PHYS 213 or 208 or permission of instructor. L. D. Brown.

For description, see EAS 437.
[ARKEO 458(4258) Archaeological Analysis (also ARKEO 658[6258], ANTHR 458/658[4258/6258])
Spring. 4 credits. Limited to 15 students. Prerequisite: archaeology course or permission of instructor. Next offered 2008-2009. J. S. Henderson.]

## ARKEO 463(4263) Zooarchaeological Method (also ANTHR 463[4263]) (PBS Supplementary List)

Fall. 5 credits. N. Russell.
For description, see ANTHK 463.

## ARKEO 464(4264) Zooarchaeological Interpretation (also ANTHR 464[4264]) (PBS Supplementary List)

Spring. 4 credits. Prerequisites: ARKEO/
ANTHR 463; permission of instructor.
N. Russell.

For description, see ANTHR 464

## [ARKEO 467(4267) Origins of Agriculture

 (also ANTHR 467[4267])Spring. 4 credits. Next offered 2008-2009. N. Russell.]

## ARKEO 600(6000) Special Topics in Archaeology <br> Fall and spring. 4 credits. Staff.

[ARKEO 602(6020) Designing Archaeological Exhibits (also ARKEO 402[4020])
Spring. Variable credit. Letter grades only.
Next offered 2008-2009. S. Baugher.]
ARKEO 651(6510) Advanced Fieldwork in Historical Archaeology (also ARKEO 451[4510])
Fall. 4 credits. S. Baugher.
ARKEO 652(6520) Advanced Laboratory in Historical Archaeology (also ARKEO 452[4520])
Spring. 3 credits. S. Baugher.
This is a course for archaeology majors and minors who want to obtain more in-depth skills in laboratory work, identification and cataloguing of historic period ceramics, glass, and metal. The course will provide the students with skills to undertake laboratory analysis of artifacts. Students will undertake independent research projects on specific artifacts (in lieu of a term paper).

## ARKEO 670(6270) Environmental Archaeology (also ARKEO 370[3270], ANTHR 370/670[3270/6270])

Fall. 4 credits. T. P. Volman.
For description, see ANTHR 370.
[BIOEE 671(6710) Paleoanthropology of South Asia (also ANTHR 671[6371], ASIAN 620[6620])
Fall. 3 credits. Next offered 2008-2009.
K. A. R. Kennedy.]

## V. Relevant Courses at Ithaca College

Contact Sherene Baugher in Landscape Architecture at sbb8@cornell.edu or the Ithaca College Anthropology Department at 274-1331 for further information or visit their web site at www.ithaca.edu/hs/anthro/.
Prehistory of South America. M. Malpass. Every other year.
New World Complex Societies. M. Malpass. Irregular offering.
Archaeological Methods and Techniques. M. Malpass. Irregular offering.
World Prehistory. J. Rossen. Every semester.
North American Prehistory. J. Rossen. Every year.
People, Plants, and Culture: Archaeobotany and Ethnobotany. J. Rossen. Every other year.
Seminar: Hunter-Gatherers. J. Rossen. Every other year.

Seminar: Origins of Agriculture. J. Rossen. Every other year.
Ethnoarchaeology. J. Rossen. Every other year. Archaeological Field School.

## ASIAN STUDIES

K. W. Taylor, chair (350 Rockefeller Hall, 2555095); A. Blackburn, B. Bledsoe, D. Boucher, T. Chaloemtiarana, Z. Chen, B. de Bary, S. Divo, W. George, D. Gold, G. Green, E. Gunn, H. Huang, S. Ichikawa, N. Jagacinski, H. Jeong, Y. Katagiri, N. Larson, J. M. Law, W. Liyanage, R. McNeal, L. McRae, Y. LeeMehta, S. Mukherjee, S. Oja, J. Pandin, L. Paterson, H. Phan, B. Rusk, N. Sakai, T. Savella, K. Selden, W. Shao, M. Shin, S. Singh, M. Song. R. Sukle, M. Suzuki, K. Taylor, Q. Teng, T. Tranviet, S. Tun, D. X. Warner, L. Zheng; Emeritus: K. Brazell, T. L. Mei, J. Wolff; Associated Faculty:
A. Carlson, S. Cochran, A. Cohn, M. Hatch, R. Herring, D. Holmberg, M. Katzenstein, K. Kennedy, V. Koschmann, T. Loos, T. Lyons, K. March, S. Martin, K. McGowan, S. Mohanty, V. Munasinghe, V. Nee, A. Nussbaum, A. Pan, C. Peterson, P. Sangren, J. Siegel, J. J. Suh, E. Tagliacozzo, N. Uphoff, J. Whitman, A. Willford

The Department of Asian Studies encompasses the geographical areas of East Asia, South Asia, and Southeast Asia and offers courses in most of the disciplines of the social sciences and the humanities. Forty-five members of the department specialize in languages, linguistics, literatures, and religions, while associated faculty throughout the university teach courses on Asia in their own disciplines, from art history and government to development sociology. Asian Studies courses through the 400 level (ASIAN is the prefix) are taught in English and are open to all students in the university. Some of these courses may be counted toward majors in other departments; others fulfill various distribution requirements.

## The Major

A student majoring in Asian Studies normally specializes in the language and culture of one country and often chooses an additional major in a traditional discipline.
A student majoring in Asian Studies receives thorough training in at least one Asian language and is required to complete two courses at the 200 -level (minimum of 6 credits) or to demonstrate that minimal level of proficiency in one the Asian languages offered at Cornell. The major consists of at least 30 additional credits (which may include up to 6 credits of further language study) from courses numbered 200 and above selected by the student in consultation with his or her advisor from among the Asia content courses offered by the Department of Asian Studies and by Asia specialists in other departments.
The applicant for admission to the major in Asian Studies must have completed at least two Asia content courses, one of which may be a language course. Students must receive permission for admission to the major from the director of undergraduate studies. The student must have received a minimum grade of C in those courses and in all other courses counted toward the major.

## Honors

To be eligible for honors in Asian Studies, a student must have a cumulative GPA of 3.0 , and an average of 3.7 in all Asian Studies area courses, exclusive of language study only, and must successfully complete an honors essay during the senior year. Students who wish to be considered for honors should apply to the director of undergraduate studies during the second semester of their junior year. The application must include an outline of the proposed project and the endorsement of a supervisor chosen from the Asian Studies faculty. During the first semester of the senior year the student does research for the essay in conjunction with an appropriate Asian Studies course or ASIAN 401. By the end of the first semester the student must present a detailed outline of the honors essay or other appropriate written work and have it approved by the project supervisor and the director of undergraduate studies. The student is then eligible for ASIAN 402, the honors course, which entails writing the essay. At the end of the senior year, the student has an oral examination (with at least two faculty members) covering both the honors essay and the student's area of concentration.

## Concentration in East Asia Studies

A candidate for the bachelor of arts or science degree at Cornell may take a concentration in East Asian studies by completing at least 18 credits of course work in East Asian studies.
Students normally take five courses in East Asian Studies at the 200 level or above from those East Asian courses listed (China, Japan, Korea) either under Asian Studies or Asianrelated courses. Of these, two courses might be Asian language courses at the 200 level or beyond. East Asian graduate courses may also be taken for the concentration, as well as East Asia-related courses with a research paper on an East Asian topic. Appropriate courses taken through Cornell Abroad in East Asia may also be counted toward the concentration. Students concentrating in East Asian Studies should select an advisor from the East Asia Program faculty for consultation on their course of study. For more information, contact the Department of Asian Studies at 350 Rockefeller Hall, 255-5095.

## Concentration in South Asia Studies

A candidate for the bachelor of arts or science degree at Cornell may take a concentration in South Asia Studies by completing at least 18 credits of course work (typically five courses) in South Asian Studies at the 200 level or above. These courses are selected from South Asia courses listed under the Department of Asian Studies, or from other Asia-related courses. Of these, two courses may be South Asian language courses at the 200 level or above. Appropriate South Asia graduate course work may be included in the concentration with consent of the instructor and the advisor. One South Asia-related course with a research paper on a South Asia subject may be included with the consent of the advisor and the director of undergraduate studies.
Students concentrating in South Asian Studies are considered members of the South Asia Program and will have an advisor from the program faculty. (This advisor will supervise a student's concentration and does not substitute for a student's major advisor.)

## Concentration in Southeast Asia Studies

A candidate for the bachelor of arts or science degree at Cornell may take a concentration in Southeast Asian Studies by completing 18 credits of course work in Southeast Asian Studies. A recommended plan would include ASIAN 208 and four courses at the intermediate or advanced stage, two of which could be a Southeast Asian language. Students taking a concentration in Southeast Asian Studies are members of the Southeast Asia Program and are assigned an advisor from the program faculty. Such students are encouraged to commence work on a Southeast Asian language either at the 10 -week intensive courses offered by the Southeast Asia Studies Summer Institute (SEASSI) or by studying for one semester at IKIP Malang, Indonesia; Khon Kaen University, Thailand; or Hanoi University, Vietnam. Fellowships are available for undergraduates through the Cornell Abroad Program

## Intensive Language Program (FALCON)

The FALCON Program offers intensive instruction in Japanese or Chinese. Aside from the exclusive language schools of some government agencies, FALCON is the only program in the world that offers a full year of intensive instruction beginning at the elementary level and continuing to the advanced level. FALCON is a full-time program; the degree of intensity does not allow students to enroll simultaneously in other courses or to work, except perhaps on weekends. Students typically take the entire sequence of 160,260 , and 360 , but they may take any other portion of the program if they have the necessary background as determined by a placement interview. Students often choose to apply only to the summer portion. The spring semester of the Chinese program will be offered in Beijing.
Students must formally apply to the program. To guarantee course availability, applications must be received by March 1. After that, applicants are reviewed on a rolling basis and acceptance is contingent on the availability of spaces. Applications are available in 388 Rockefeller Hall or on the FALCON web site at http://lrc.cornell.edu/falcon.

## Study Abroad

There are many strong options for study abroad in Asia. Cornell Abroad helps students plan a year or semester abroad as part of their Cornell undergraduate degree. Cornell has affiliations with several programs and institutions in Asia and sends students to those and others.
Cornell is affiliated with IUP, the InterUniversity Program for Chinese Language Studies in Beijing (at Tsinghua University) and is a member of CIEE and IES, organizations sponsoring study abroad programs offering Chinese language instruction at several levels as well as courses in Chinese studies in the humanities and social sciences. Students may also study at other programs in China, Hong Kong, and Taiwan. The Chinese FALCON program includes a spring semester in Beijing
Cornell is a member of the consortium of the Kyoto Center for Japanese Studies, an undergraduate semester or year program in Japanese language and Japanese studies. An agreement with International Christian

University (ICU), outside Tokyo, permits Cornell students to attend that institution. Cornell students have attended CIEE and IES programs as well as other programs and institutions in Japan.
Cornell is a member of the American Association of Indian Studies, which offers fellowships for intensive study in India or Hindi, Bengali, and Tamil. There are study abroad options in universities or other organizations in various regions of India.
In cooperation with Tribhuvan National University of Nepal, Cornell organizes the Cornell-Nepal Study Program for undergraduate and graduate students wishing to spend a semester or year studying and conducting research in Nepal.
Students may spend a semester or year in Mongolia, Korea, Vietnam, Indonesia, Thailand, Singapore, or the Philippines or choose to study about Asia at the School of Oriental and African Studies in London, or the Faculty of Asian Studies at the Australian National University. Undergraduates should consult Cornell Abroad; graduate students should inquire at the East Asia Program, Southeast Asia Program, or South Asia Program offices.
Students may apply up to 15 credits from abroad to the major.

## First-Year Writing Seminars

See John S. Knight Institute brochure for times, instructor, and descriptions.

## General Education Courses

ASIAN 190(1190) East Asia to 1800 (also HIST 190[1900]) (HA-AS)
Spring. 4 credits. T. J. Hinrichs and H. Hirano.

For description, see HIST 190.
ASIAN 191(1191) Introduction to Modern
Asian History (also HIST 191[1910]) © (HA-AS)
Fall. 4 credits. T. Loos and V. Koschmann. For description, see HIST 191

## [ASIAN 192(1192) Introduction to World Music: Asia (also MUSIC 104[1302]) © (CA-AS)

Fall. 3 credits. Next offered 2008-2009. M. Hatch.

For description, see MUSIC 104.]
[ASIAN 201(2201) Buddhist Felicities © (CA-AS)
Spring. 4 credits. Next offered 2008-2009 A. Blackburn.)

## [ASIAN 206(2206) The Occidental

 Tourist: Travel Writing and Orientalism in Southeast Asia (also HIST 207/507[2070/5070]) (9) (CA-AS)Fall. 4 credits. Next offered 2008-2009. T. Loos.]

## ASIAN 208(2208) Introduction to

 Southeast Asia © (CA-AS)Fall. 3 credits. T. Chaloemtiarana. For anyone curious about the most diverse part of Asia; defines Southeast Asia both as the nation-states that have emerged since 1945 (Brunei, Burma, Cambodia, Indonesia, Laos, Malaysia, Philippines, Singapore, Thailand, and Vietnam) and as a larger cultural world extending from southern China to Madagascar and Polynesia. Students find a serious,
organized introduction to a variety of disciplinary and topical approaches to this region, including geography, linguistics, history, religion and ideology, anthropology, marriage and family systems, music, literacy and literature, art and architecture, agriculture, industrialization and urbanization, politics and government, warfare and diplomacy, ecological and human degradation, and business and marketing. The course teaches both basic information and different ways of interpreting that information.

## ASIAN 211(2211) Introduction to Japan:

 Japanese Texts in History © \# (HA-AS)Fall. 3 credits. J. M. Law.
This course surveys major disciplinary approaches in the social sciences and humanities to the study of Japan by focusing on different historical formulations of Japanese native and national identity: Japan the sacred nation, Japan the aesthetic, Japan the warrior nation, Japan the peaceful (victim) nation, Japan the industrious economic superpower and Japan the hyper-modern. We introduce Japanese performance traditions, read fiction, poetry and plays, see classical films and recent anime, and study historical cases relating to each of these formulations.

## ASIAN 212(2212) Introduction to China ©

 \# (CA-AS)Spring. 3 credits. B. Rusk. Interdisciplinary introduction to Chinese culture especially designed for students not majoring in Asian Studies. Explores literature, history, religion, art and archaeology, and other aspects of China's rich and diverse heritage, from earliest times to the present.

## ASIAN 215(2215) Introduction to South

 Asian Civilization © (HA-AS)Spring. 3 credits. A. Blackburn. An interdisciplinary introduction to the culture and history shared by India and other states of South Asia. Designed for students not majoring in Asian Studies. Guest lecturers provide the perspective of their disciplines to the general themes of the course: cultural diversity and the role of tradition in contemporary life.
ASIAN 218(2218) Introduction to Korea (also HIST 280[2800]) © (CA.AS)
Spring. 3 credits. M. Shin.
Multidisciplinary introduction to Korean history, society, and culture. The first part of the course examines sources of Korean tradition in their historical contexts. The second part, on the transition to a modern society, covers the mid-19th century to the Korean War. The last part is devoted to contemporary society.

## Asia-Literature and Religion Courses

The following courses are taught entirely in English and are open to any Cornell student.
[ASIAN 219(2219) Women and Gender in South Asia (also HIST/FGSS $219[2190]$ ) © (HA-AS)
Fall. 4 credits. Next offered 2010-2011. D. Ghosh.]

ASIAN 225(2255) Literature, Politics, and Genocide in Cambodia © (CA-AS)
Summer. 3 credits. G. Chigas.
This course will examine various literary, historical, legal, and political responses to the Cambodian genocide. The course will provide
an historical overview of the genocide and consider how the literary, legal, and political responses have paralleled, complemented, and opposed each other. Of particular concern are the current proceedings of the ongoing UNassisted tribunal in Cambodia and whether this legal process contributes to or detracts from the cause of justice and process of healing for survivors. To pursue these questions, we will read selections from novels and poetry written by Cambodian survivors in conjunction with accounts of the legal and political activities of the Cambodian government and the international community to bring the perpetrators of genocide to justice.

## [ASIAN 226(2226) Society and Religion

 in China (also HIST 226[2261]) © \# (HA-AS)Fall. Next offered 2008-2009. T. Hinrichs. For description, see HIST 226.]
[ASIAN 228(2228) The Indian Ocean World (also HIST 228[2280]) © \# (HA-AS)
Spring. 4 credits. Limited to 15 students.
Next offered 2008-2009. E. Tagliacozzo.]
[ASIAN 241(2241) China's Literary Heritage: An Introduction in Translation © (LA-AS)
Spring. 3 credits. Next offered 2008-2009.
D. X. Warner.]

ASIAN 245(2245) Gamelan in Indonesian History and Cultures (also MUSIC 245[1341], VISST 244[2474]) © (LA-AS)
Fall or spring. 3 credits. Prerequisite: permission of instructor. M. Hatch and staff.
For description, see MUSIC 245.
ASIAN 250(2250) Introduction to Asian Religions (also RELST 250[2250]) © \# (HA-AS)
Spring. 3 credits. D. Boucher.
Explores religious traditions in South Asia (Pakistan, India, and Sri Lanka) and East Asia (China and Japan) including Hinduism, Buddhism (South Asian and East Asian), Sikhism, Confucianism, Daoism, and Shinto. Encounters a wide range of religious expressions as well, including myth, ritual, pilgrimage, mysticism, meditation, and other spiritual technologies.

## ASIAN 257(2257) China Encounters the

 World (also HIST 257[2571]) © (HA-AS)Spring. 3 credits. J. Chen.
For description, see HIST 257.

## ASIAN 275(2275) History of Modern

 South Asia (also HIST 275[2750]) © " (HA-AS)Fall. 4 credits. D. Ghosh.
For description, see HIST 275.
[ASIAN 277(2277) Meditation In Indian Culture (also RELST 277[2277]) @ \# (CA-AS)
Spring. 3 credits. Next offered 2008-2009. D. Gold.]
[ASIAN 279(2279) Chinese Mythology © \# (LA-AS)
Fall. 3 credits. Next offered 2008-2009. R. McNeal.

Students will study Chinese myths from the earliest times down to the late imperial era. Focus will be on understanding the form Chinese myths take, how they are related to
religion, literature, historical accounts and intellectual trends.]
ASIAN 294(2294) History of China in Modern Times (also HIST 294[2940]) @ (HA-AS)
Fall. 4 credits. S. Cochran
For description, see HIST 294.
[ASIAN 296(2296) From Slow Boats to CEOs?: The Chinese of Southeast Asia © (CA-AS)
Spring. 4 credits. Next offered 2008-2009.
L. Paterson.]

ASIAN 298(2298) The U.S.-Vietnam War (also HIST 289[2890]) (1) (HA-AS)
Fall. 4 credits. K. Taylor.
Covers politics and warfare among Vietnamese during the era of direct U.S. involvement 1950-1975. Evaluates the policies of the United States and also of other countries involved in Vietnamese events, particularly the PRC and the USSR. Analyzes how civil war affected Vietnamese society, politics, and culture and also how U.S. intervention affected American society, politics, and culture.

## ASIAN 301(3301) Schools of ThoughtAncient China © \# (HA-AS)

Spring. 4 credits. R. McNeal.
[ASIAN 302(3302) Art of War in Ancient China © \# (HA-AS)
Fall. 4 credits. Next offered 2009-2010. R. McNeal.]

ASIAN 305(3305) Seminar: America's Relations with China (also CAPS 300[3000]) (HA-AS)
Fall. 4 credits. Taught in Washington, D.C. R. Bush.

For description, see CAPS 300.

## [ASIAN 306(3306) Zen Buddhism © \#

 (KCM-AS)Spring. 4 credits. Limited to 15 students. Next offered 2009-2010.]
ASIAN 312(3312) Intellectuals in Early Modern Korea @ " (HA-AS)
Spring. 4 credits. Prerequisite: one course on modern Japan or Korea. M. Shin. The objective of this course is to study modern Korean history (1876-1945) through an examination of its major intellectuals. The course will give an overview of the political and socioeconomic background that gave rise to these intellectuals, and then, it will examine the thought of these intellectuals to see how they commented on the conditions of their times. The period covered will begin with Silhak thought in the late 18th-early 19th century and end with the Liberation period, 1945-48.
[ASIAN 328(3328) Construction of Modern Japan (also HIST 328[3280]) © \# (HA-AS)
Spring. 4 credits. Next offered 2008-2009. J. V. Koschmann.]
[ASIAN 335(3335) Japan from War to Prosperity (also HIST 330[3300]) : (HA-AS)
Fall. 3 credits. Next offered 2009-2010. V. Koschmann.

For description, see HIST 330.]

## ASIAN 345(3345) Asian Minorities (also

 ANTHR 346[3546])Fall. 4 credits. M. Fiskesjo.
For description, see ANTHR 346.
[ASIAN 346(3346) Modern Japanese Politics (also GOVT 346[3463]) © (SBA-AS)
Spring. 4 credits. Next offered 2008-2009. R. Weiner.]
[ASIAN 347(3347) Tantric Traditions (also RELST 349[3349]) © (CA-AS)
Fall. 4 credits. Next offered 2009-2010.
D. Gold.]

ASIAN 348(3348) Indian Devotional Poetry (also RELST 348[3348]) © \# (LA-AS)
Spring. 4 credits. D. Gold.
A survey of Indian devotional genres, with particular attention to the medieval vernacular literatures. Consideration is given to social and ritual contexts of the texts, the ways in which their literary conventions work, and their contemplative uses.
[ASIAN 351(3351) Indian Religious Worlds (also RELST 351[3351]) © (CA-AS)
Fall. 4 credits. Next offered 2008-2009.
D. Gold.

A study of religious traditions as lived today in the Indian subcontinent. Attention will be paid to differences in piety and practice within alternative environments.]
ASIAN 354(3354) Indian Buddhism (also ASIAN 654[6654], RELST 354/654[3354/6654]) © \# (HA-AS)
Fall. 4 credits. D. Boucher.
This course surveys Buddhism in South Asia from its origins in northeast India to its migrations throughout the Indian subcontinent, including the Mahayana and Vajrayana traditions. We also explore the way two very different forms of Indian Buddhism became entrenched in the adjacent regions of Sri Lanka and Nepal.
ASIAN 355(3355) Japanese Rellgions (also RELST 355[3355]) © (CA-AS)
Spring. 4 credits. J. M. Law.
Addresses the complexity of religion in Japanese history through a focus on the dominant ideological system commonly referred to as Shinto. Focuses on methodological issues surrounding tradition formation, invention, continuity, change, and revision and explores the Shinto tradition as follows: (1) how a central corpus of values, tastes, practices, beliefs, and concerns were formulated and how this system interacts with other religious systems; (2) the academic sources contributing to this identity; (3) views of this religious system from those actively shaping its discourse; (4) views of this religious system from those peripheralized by its ideologies; (5) personal cultivation and aesthetic taste; and (6) the relationship between this religious system and imperialism, war, and historical revisionism.
[ASIAN 359(3359) Japanese Buddhism: Texts in Context (also RELST 359[3359]) © \# (HA-AS)
Spring. 4 credits. Next offered 2008-2009.

## J. M. Law.]

ASIAN 361(3361) Conflict and Transformation in Early Modern Japan (also HIST 361[3610]) © (HA-AS)
Fall. 4 credits. K. Hirano.
For description, see HIST 361.

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ASIAN 373(3373) 20th-Century Chinese Literature © (LA-AS)
Fall. 4 credits. E. Gunn.
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A survey of the principal works in English translation, the course introduces fiction, drama, essays, and poetry of China beginning with the Republican era and continuing up to the present in the People's Republic and Taiwan, with attention to social and political issues and literary theory.
[ASIAN 374(3374) Chinese Narrative Literature © * (LA-AS)
Spring. 4 credits. Next offered 2008-2009. E. Gunn.

Selected works in classical Chinese fiction are read in translation. Major novels, such as The Dream of the Red Chamber and Water Margin, are emphasized.]

## [ASIAN 379(3379) Southeast Asian

 Literature in Translation © (LA-AS)Spring. 4 credits. Next offered 2008-2009.

## L. Paterson

An introduction to modern Southeast Asian literature in translation, concentrating on short stories and novels from the mainland.]

## [ASIAN 380(3380) Vietnamese Literature

 in Translation © \# (LA-AS)Fall. 4 credits. Next offered 2008-2009 L. Paterson

An introduction to Vietnamese literature in translation, concentrating on modern short stories and novels.]

## [ASIAN 385(3385) History of Vietnam

 (also HIST 388/688[3880/6880]) © \# (HA-AS)Fall. 4 credits. Meets concurrently with ASIAN 685. Graduate students may enroll and attend a seminar sec. Next offered 2008-2009. K. Taylor.
Survey of Vietnamese history and culture from earliest times to the present.]
ASIAN 386(3386) Southeast Asia through Film © (CA-AS)
Spring. 4 credits. L. Paterson.
In Western films, Southeast Asia has been portrayed as an exotic locale of romance, haunting landscapes, and "inscrutable" smiling natives. This class will explore how the countries of Southeast Asia have been portrayed in Western cinema, in juxtaposition with films produced in the countries themselves. No background in film studies or Southeast Asia is required.
[ASIAN 387(3387) Literature and Film of South Asia (also COM L 386[3860], VISST 387[3870]) © (CA-AS)
Fall. 4 credits. Next offered 2008-2009. A. Banerjee]

ASIAN 38e(3388) Theorizing Gender and Race In Asian Histories and Literatures (also ASIAN 688[6688], COM L 398/668[3980/6680], FGSS 358/658[3580/6580]) (CA-AS)

## Spring. 4 credits. N. Sakai

This course is designed to offer a series of discussions about (1) the historically specific modes of sexism and racism in social spaces that are related to Japan and other places in the trans-Pacific. (2) The mutual implications of sexism, racism, and social class in various contexts including those colonialism, imperialism and nationalism. (3) The roles of gender, race, and social class in the United States knowledge production about East Asia in general. (4) The conceptions of gender and race in the social formations particular to East Asia. The readings include both English and Japanese materials. Those registered in ASIAN 388 are exempt from reading the materials in Japanese.
[ASIAN 391(3391) East Asian Martial Arts and Society and Religion (also HIST 319[3190]) © (HA-AS)
Fall. 4 credits. Next offered 2009-2010. T. Hinrichs.

For description, see HIST 319.]
ASIAN 396(3396) Southeast Asian History from the 18th Century (also HIST 396[3960]) © (HA-AS)
Spring. 4 credits. T. Loos.
For description, see HIST 396.
[ASIAN 397(3397) Premodern Southeast Asia (also HIST 395[3950]) © \# (HA-AS)
Fall. 4 credits. Next offered 2009-2010.
E. Tagliacozzo.J
[ASIAN 409(4409) Archipelago: The Worlds of Indonesia (also HIST 410/617[4100/6617]) © (HA-AS)
Spring. 4 credits. Next offered 2008-2009. E. Tagliacozzo.]

ASIAN 410(4410) Chinese Film © (LA-AS)
Spring. 4 credits. E. Gunn.
Additional film viewing hours TBA. The course surveys Chinese films from the 1920s to the present and various responses to them. Films from mainland China, Hong Kong, and Taiwan are included, together with critical studies employing a variety of different critical methods.

## [ASIAN 411(4411) History of the

 Japanese Language (also LINC 411[4411], JAPAN 410[4410]) © (HA-AS)Fall. 4 credits. Next offered 2009-2010. J. Whitman.

For description, see LING 411.]
[ASIAN 412(4412) Linguistic Structure of Japanese (also LING 412[4412]) (KCM-AS)
Spring. 4 credits. Next offered 2009-2010. J. Whitman.

For description, see LING 412.]
[ASIAN 413(4513) Religion and Polltics in Southeast Asia (also ANTHR 413[4413]) (CA-AS)
Spring. 4 credits. Next offered 2008-2009. A. Willford.

For description, see ANTHR 413.]
[ASIAN 414(4414) Formation of the Field: Japan as an "Area"
Next offered 2009-2010. N. Sakai.]
ASIAN 416|4416) Gender and Sexuality in Southeast Aslan History (also ASIAN 618[6618], HIST 416/616[4160/6160], FGSS 416[4160]) © (CA-AS)
Fall. 4 credits, T. Loos.
For description, see HIST 416.
[ASIAN 421(4421) Rellgious Reflections on the Human Body (also RELST 421[4421]) (KCM-AS)
Fall. 4 credits. Prerequisites: one religious studies course or permission of instructor. Next offered 2009-2010. J. M. Law.]

## ASIAN 423|4423) Imagining

 Contemporary Asia (also 5 HUM 419, ENOL 407.2[4070.02])Fall. 4 credits. W. Wee.
For description, see S HUM 419

ASIAN 424(4424) Scars and Bars: Asian Trauma Memoirs : (CA-AS)
Spring. 4 credits. L. Paterson.
From the Chinese Cultural Revolution to Khmer Rouge Cambodia, social upheaval in Asia has given rise to a genre of trauma memoir. In this course, we will discuss how periods of societal terror are represented and remembered within these personal narratives. Through reading such accounts in conjunction with secondary scholarship, students examine various issues of representation such as intended audience construction of memory, and framing of individual experience.

## [ASIAN 425(4425) Theories of Clvilization

 © \# (HA-AS)Spring. 4 credits. Next offered 2009-2010. K. Taylor.]
[ASIAN 430(4430) Structure of Korean (also LING/KOREA 430[4430]) [KCM-AS]
Spring. 4 credits. Next offered 2009-2010. J. Whitman.

For description, see LING 430.]
ASIAN 436(4436) Topics in Indian Film © (LA-AS)
Spring. 4 credits. No knowledge of an Indian language required. D. Gold. Treats various aspects of Indian film, with focal topics to vary from year to year. These topics include religion in Indian film, Indian art films, and the golden age of Indian film. All topics are discussed in relation to the conventions of mainstream Bollywood cinema and their social and cultural significances. Attendance at weekly screenings is required.

## ASIAN 437(4437) Research Methods in Pre-Modern China (also ASIAN 611[6611]] 웅 (LA-AS)

Fall. 4 credits. B. Rusk.
This seminar introduces major approaches to research in pre-modern Chinese studies. It is designed for beginning graduate students and for advanced undergraduates intending to pursue further studies in the field. Students will be introduced to important primary and secondary works that will enable them to pursue independent research in the field. Topics include the use of traditional and modern reference works (including dictionaries, concordances, historical records), techniques for finding and working with texts in various genres, including electronic editions, and practices of citation and dating. Reading knowledge of Classical and modern Chinese required.

## ASIAN 438(4438) Monks, Texts, and

 Relics: Transnational Buddhism in Asia (also ASIAN 638[6638], RELST 438/668[4438/6638]) (CA-AS)Spring. 4 credits. Prerequisites: one 300level or above course in ASIAN or RELST or permission of instructor. A. Blackburn This course examines the ways in which South and Southeast Asian Buddhist communities were formed through the importexport of monks, texts, and relics, as part of a trade in "orthodoxy," symbolic capital, and magical power. The course attends particularly to the ways in which the movement of Buddhist monks, texts, and relics shaped political and religious boundaries in medieval and early modern Asia.

ASIAN 441(4441) Mahayana Buddhism
(also RELST 441[4441]) \# (CA-AS)
Spring. 4 credits. D. Boucher.
By reading successive examples of Mahayana Buddhist literature, we will study the formation and evolution of the ideal of the bodhisattva; the understanding of transcendental wisdom and the concept of emptiness; and the workings of both the conscious and subconscious mind in the course of spiritual practice. We will include discussion of major philosophical schools, as well as issues of social setting and popular religious practice, in both India and East Asia.

ASIAN 449(4449) History and Methods of the Academic Study of Religion (also RELST 449[4449]) " (KCM-AS)
Spring. 4 credits. Prerequisite: one course
satisfying religious studies major. J. M. Law. Provides advanced students in religious studies or the humanities familiarity with important methodological issues in the academic study of religion. Following a brief historical outline, major approaches to the academic study of religion currently used and discussed in religious studies are examined. Students read works from the following approaches to the study of religion: anthropology, philosophical hermeneutics, phenomenology, history of religions, the sociology of religion and critical ideological studies. In the final segment, the course focuses on recent developments in the field of religious studies.

ASIAN 452(4452) Global Martial Arts Film and Literature (also COM L 408[4080])
Fall. 4 credits. Limited to 15 students. P. Liu.

For description, see COM L 408.
[ASIAN 460(4460) Indian Meditation Texts (also RELST 460[4460]) © " (KCM-AS)
Fall. 4 credits. No knowledge of Indian languages required. Next offered 20082009. D. Gold.

Draws on approaches from literary criticism, anthropology, and religious studies to explore texts that record religious experience.]
[ASIAN 462(4462) Religion, Colonialism, and Nationalism in South and Southeast Asia (also ASIAN 662[6662]) (CA-AS)
Spring. 4 credits. Prerequisites: one course in ASIAN, RELST, HIST, ANTHR at 300 level or above or permission of instructor. Next offered 2008-2009 A. Blackburn.]

ASIAN 468(4468) Arendt, Morisaki, Weil (also ASIAN 668[6668], COM L 438[4380], COM L 624[6240]) (KCM-AS)
Fall. 4 credits. Limited to 20 students. B. deBary.

Examines contributions to 20th-century philosophy of three women-Hannah Arendt, Morisaki Kazue, and Simone Weil. Writing from Paris, Berlin, New York, and Fukuoka, Japan, the three formulated responses to 20 thcentury issues that were global in scope: the rise of fascism, the emergence of anti-colonial movements, communism, and the situation of stateless persons, refugees, and those abducted for forced labor. Readings of Arendt's Life of the Mind will be done in collaboration with Society for the Humanities Invited Scholar Denise Riley.

ASIAN 469(4469) Medicine and Mealing in China (also HIST/S\&TS/B\&SOC 496[4961]] ( (HA-AS)
Spring. 4 credits. T. Hinrichs.
For description, see HIST 496.
[ASIAN 481(4481) Translation and Cultural Difference (also COM L 470[4700]) (KCM-AS)
Fall. 4 credits. Next offered 2008-2009.
N. Sakai.]
[ASIAN 489(4489) Religion and Sustainability: Traditionalist Discourses in the $\mathbf{2 1}$ st Century (also RELST 489[4489]) (CA-AS)
Fall. 4 credits. Prerequisite: permission of instructor. Next offered 2009-2010. J. M. Law.]

ASIAN 493(4493) Problems in Modern Chinese History (also ASIAN 693[6693], HIST 493/693[4930/6930]) 용 (HA-AS)
Fall. 4 credits. Prerequisite: HIST 294/ ASIAN 294 or permission of instructor. S. Cochran.

For description, see HIST 493.
ASIAN 494(4494) Indla: Nation and Narration, Hlstory and LIterature (also HIST 492[4920]) (HA-AS)
Spring. 4 credits. D. Ghosh and
A. Banerjee

For description, see HIST 492.
[ASIAN 496(4496) Tokugawa Literature and Thought © (HA-AS)
Spring. 4 credits. Next offered 2008-2009. N. Sakai.]
[ASIAN 499(4499) Problems in Modern Chinese HIstory (also HIST 499/694[4990/6940]) © (HA-AS)
Spring. 4 credits. Prerequisite: permission of instructor. Next offered 2008-2009. S. Cochran.]
[ASIAN 507(5507) The Occidental Tourist (also HIST 207/507[2070/5070], ASIAN 206[2206])
Fall. 4 credits. Next offered 2008-2009. T. Loos.]

ASIAN 599(5599) East Asian Colloquium (also HIST 602[6020]) (HA-AS)
Fall. 2 credits. Graduate students only. K. Hirano.

For description, see HIST 602.

## Asia-Graduate Seminars

For complete descriptions of courses numbered 600 or above, see www.lrc.cornell. edu/asian.
ASIAN 602(6602) Southeast Asia Seminar: Contemporary Thailand Spring. 4 credits. T. Chaloemtiarana.
ASIAN 603(6603) Southeast Asia Field Seminar
Spring. 4 credits. T. Chaloemtiarana.
[ASIAN 604(6604) Southeast Asia Topical Seminar
Spring. 3-4 credits. Next offered 20082009. Staff.]

ASIAN 611(6611) Research Methods in Pre-Modern China (also ASIAN 437[4437]) © (LA-AS)
Fall. 4 credits. B. Rusk.
For description, see ASIAN 437.

ASIAN 612(6612) Japanese Blbliography and Methodology
Fall. 1 credit. Requirement for honors students and M.A. candidates. Prerequisite: permission of instructor. Staff.
[ASIAN 615(6615) Histories of Tokugawa Japan (also HIST 615[6150])
Fall. 4 credits. Next offered 2008-2009. K. Hirano.

For description, see HIST 615.]
ASIAN 618(6618) Gender and Sexuality in Southeast Asian History (also ASIAN 416[4416], HIST 416/616[4160/6160])
Fall. 4 credits. Prerequisite: graduate standing. T. Loos.
For description, see HIST 416.

## ASIAN 619(6619) Graduate Seminar: Translation in Theory (also VISST 619[6619], COM L 616[6616])

Spring. 4 credits. B. de Bary.
Translation, whether defined as a practice, theory, or metaphor, has assumed increasing significance in contemporary cultural criticism. Uncovering processes of translation, often subsumed under the figure of invisibility, may bring hidden histories and voices into view Translation may be a practice of power, or a method of its undoing. Translation may consolidate hegemonic structures, or de-center them by destabilizing assumed boundaries, binaries, and authenticities. Because it entails a necessary exposure to a diffrand-the excess of signification in language-translation has become, for some philosophers, an exemplary ethical practice. The course will take up texts by Benjamin, Derrida, Deleuze, Sherry Simon, Tawada Yoko, and others.
[ASIAN 626(6626) The 18th Century and the Emergence of Literary Modernity (also COM L 638[6380])
Spring. 4 credits. Next offered 2009-2010. N. Sakai.]
[ASIAN 634(6634) Buddhist Studies Seminar
Spring. 4 credits. Prepares graduate students studying Asian religions for A examination; other graduate students may enroll with permission of instructor. Next offered 2008-2009. A. Blackburn.]

ASIAN 638(6638) Monks, Texts, and Relics: Transnational Buddhism in Asla (also ASIAN 438[4438], RELST 438/638[4438/6638]]
Fall. 4 credits. Prerequisites: one 300 -level or above course in ASIAN or RELST or permission of instructor. A. Blackburn.
For description, see ASIAN 438.
[ASIAN 650(6650) Seminar in Aslan Religions (also RELST 650[6650]) Fall. 4 credits. Limited to 10 students. Prerequisite: graduate standing. Recommended: reading knowledge of modern Japanese. Next offered 2008-2009. Staff.]

ASIAN 654(6654) Indian Buddhism (also ASIAN 354[3354], RELST 354/654[3354/6654]
Fall. 4 credits. Graduate students attend ASIAN 354 and arrange additional meetings with instructor. D. Boucher.
For description, see ASIAN 354.

ASIAN 659|6659) Sominar in Vedic Philosophy (aiso LING 659[6659], CLASS 659[7690]) (KCM-AS)
Fall. 4 credits. M. Weiss.
For description, see LING 659.
[ASIAN 662(6662) Religion, Coloniallsm, and Nationalism In South and Southeast Asla
Fall. 4 credits. Prerequisites: one course in ASIAN, RELST, HIST, ANTHR at 300 level or above or permission of instructor. Next offered 2008-2009. A. Blackburn.]

ASIAN 668(6668) Arendt, Morisaki, Well (also ASIAN 468[4468], COM L 438[4380], COM L 624[6240])
Fall. 4 credits. B. deBary.
For description, see ASIAN 468.
[ASIAN 671(6671) Paleoanthropology of South Asia (also BIOEE 671[6710], ANTHR 671[6371])
Fall. 3 credits. Limited to 15 students. Next offered 2008-2009. K. A. R. Kennedy.]

## [ASIAN 676(6676) Southeast Asla

 Reading Seminar: The Early Thal NovelsFall. 4 credits. Next offered 2009-2010.
T. Chaloemtiarana.]
[ASIAN 680(6680) Vletnamese Literature in Translation (also ASIAN 380[3380])
Fall. 4 credits. Next offered 2008-2009. L. Paterson.

For description, see ASIAN 380.]
ASIAN 681(6681) Intellectual History of Empire (also HIST 681[6810]) (HA-AS)
Spring. 4 credits. J. V. Koschmann and N. Sakai.

For description, see HIST 681.
[ASIAN 685(6685) History of Vietnam (also HIST 388/688[3880/6880], ASIAN 385[3385])
Fall. 4 credits. Next offered 2008-2009. K. Taylor.

For description, see ASIAN 385.]
ASIAN 688(6688) Theorizing Gender and Race in Asian Histories and Literature (also ASIAN 388[3388], FGSS 358/658[3580/6580])
Spring. 4 credits. Prerequisite: reading knowledge of Japanese. N. Sakai.
For description, see ASIAN 388.
ASIAN 693(6693) Problems in Modern Chinese History lalso ASIAN 493[4493], HIST 493/693[4930/6930])
Fall. 4 credits. S. Cochran.
For description, see HIST 493.
[ASIAN 694(6694) Problems in Modern Chinese History (also ASIAN 499[4499], HIST 499/694[4990/6940]]
Spring. 4 credits. Next offered 2008-2009.
S. Cochran.]

ASIAN 696(6696) Modern Southeast Asia: Graduate Proseminar (also HIST 396/696[3960/6960])
Spring. 4 credits. T. Loos.
For description, see HIST 396.
[ASIAN 698(6698) Seminar in Japanese Thought (also HIST 698[6980])
Fall. 4 credits. Limited to 15 graduate
students. Prerequisite: reading knowledge of Japanese. Next offered 2008-2009.
V. Koschmann.]

ASIAN 701-702(7701-7702) Seminar in East Asian Llterature
701, fall; 702, spring. $1-4$ credits. Staff.

## ASIAN 703-704(7703-7704) Directed

 Research703, fall or spring; 704, fall or spring. 1-4 credits. Staff.

## ASIAN 708(7708) Academic Study of

 ReligionFall. 4 credits. Prerequisite: graduate standing and permission of instructor. Letter grades only. J. M. Law.
This course situates contemporary discussions, methods, controversies and trends in the academic study of religion within a larger context of the history of the diverse disciplines in Religious Studies. We examine developments in the anthropology and sociology of religion, textual criticism, ritual studies and critical theory as examples of current directions in Religious Studies, and see how these developments draw on historically deeper strands of scholarship in the field. This course is limited to graduate students with a strong interest in the academic study of religion. Students are required to do assigned readings of about 250 pages per week, present responses to reading in seminar and prepare a final research paper on a topic determined in consultation with the professor.

## ASIAN 899(8899) Master's Thesis

 ResearchFall, spring. 2-4 credits. Staff.
ASIAN 999(9999) Doctoral DIssertation Research
Fall, spring. 2-4 credits. Staff.

## Honors Courses

## ASIAN 401(4401) Asian Studies Honors

 CourseFall or spring. 4 credits. Prerequisite: senior standing; admission to honors program. Staff.
Supervised reading and research on the problem selected for honors work.

## ASIAN 402(4402) Asian Studies Honors:

## Senior Essay

Fall or spring. 4 credits. Prerequisite:
admission to honors program. Staff.
The student, under faculty direction, prepares an honors essay.

## ASIAN 403-404(4403-4404) Asian

Studies Supervised Reading
Fall, spring, or both. 1-4 credits.
Prerequisite: permission of instructor;
majors and other qualified students.
Intensive reading under the direction of a member of the staff.

## Bengali

BENGL 121-122(1121-1122) Elementary Bengali
121, fall; 122, spring, 4 credits each
semester. Prerequisite: for BENGL 122,
BENGL 121 or examination. Letter grades only. S. Mukherjee.
Enables students to read and comprehend basic Bengali texts as well as speak and write in the language. The introduction of the Bengali script is complemented by detailed instruction in grammar. An interactive videoconference course.

BENGL 201-202(2201-2202) Intermediate Reading and Conversation ©
201, fall; 202, spring. 4 credits each semester. BENGL 201 satisfies Option 1. Prerequisites: for BENGL 201, BENGL 122 or examination; for BENGL 202, BENGL 201 or examination. Letter grades only. S. Mukherjee.

Building on skills mastered at the elementary level and continuing grammar instruction, this course is designed to advance students' oral competence and enhance comprehension skills through reading and listening. Its aim is to enable students to interact productively when immersed in the environment and/or to carry out research in primary material in the language.
BENGL 203-204(2203-2204) Intermediate Bengali Composition and Conversation
203, fall; 204, spring. 2 credits each semester. Prerequisites: for BENGL 203, BENGL 202 or examination; for BENGL 204, BENGL 203 or examination. Letter grades only. S. Mukherjee.
Complements the verbal skills developed in
BENGL 201-202 by improving writing skills.
BENQL 303-304(3303-3304) Bengali Literature I, 11 ©
303, fall; 304, spring. 4 credits each semester. Prerequisites: BENGL 203-204 or equivalent. BENGL 303 satisfies Option 1. Letter grades only. S. Mukherjee.
Designed in consultation with students to address their specific needs. Through reading literary texts organized around social and cultural theme-clusters, the course aims to refine the students' breadth of understanding and develop literary/critical skills.

## BENGL 431-432(4431-4432) Directed Study

431, fall; 432 spring. 1-4 credits, variable. Prerequisite: permission of instructor. Letter grades only. S . Mukherjee.
Intended for advanced language study.

## Burmese

Note: Contact S. Tun in 405 Morrill Hall before classes begin for placement or other testing and organizational information.
BURM 121-122(1121-1122) Elementary Burmese
121, fall; 122, spring. 4 credits each semester. Prerequisites: for BURM 122,
BURM 121. Letter grades only. S. Tun.
A thorough grounding is given in all language skills: listening, speaking, reading, and writing.

## BURM 201-202(2201-2202) Intermediate

 Burmese Reading ©201, fall or spring; 202, fall or spring. 3 credits each semester. BURM 201 satisfies Option 1. Prerequisites: for BURM 201,
BURM 122 or 123; for BURM 202, BURM 201. Letter grades only. S. Tun.

Continuing instruction in Burmese, with emphasis on consolidating and extending conversational skills, and on extending reading ability.

## BURM 203-204(2203-2204) Intermediate

 Burmese I and II ©203, fall; 204, spring. 3 credits each semester. BURM 203 satisfies Option 1. Prerequisites: for BURM 203, BURM 202; for BURM 204,
BURM 203. Letter grades only S. Tun.
Continuing instruction in Burmese at the upper intermediate level to develop speaking, listening, and writing skills.

## BURM 301-302(3301-3302) Advanced

 Burmese ©301, fall or spring; 302, fall or spring. 3 credits each semester. Prerequisites: for BURM 301, BURM 202 or permission of instructor; for BURM 302, BURM 301. BURM 301 satisfies Option 1. Letter grades only. S. Tun.
Continuing instruction on conversational and literary skills, but with special emphasis on reading. Students encounter various genres and styles of written Burmese. Readings include articles on current events, and either several short stories or a novel. Focus is on developing reading skills, particularly on vocabulary development, consolidating and expanding grammar, and appreciating stylistic and cultural differences.

## BURM 431-432(4431-4432) Directed Study

431, fall; 432 spring. $1-4$ credits variable Prerequisite: permission of instructor. Letter grades only. S. Tun.
Intended for advanced language study.

## Cambodian

See "Khmer."

## Chinese

Note: Testing for placement, except for those with near-native abilities (particularly those schooled in a Chinese setting up until the age of about 12), takes place in registration week, before classes begin. Time and place will be posted at http://Lrc.comell.edu/asian/ programs/placement and on the bulletin board outside 350 Rockefeller Hall. Students with some Chinese schooling who want to obtain 3 credits for their proficiency will be tested at the beginning of the second week of classes. Again, the time and place will be announced.

## CHIN 101-102|1101-1102) Elementary

 Standard Chinese (Mandarin) 101, fall; 102, spring. 6 credits each semester. Limited to 10-12 students per sec. Prerequisite: for CHIN 102, CHIN 101 or permission of instructor. Students must enroll in lec and one sec. Because of limited sec size, students missing first two class meetings without university excuse are dropped so others may register. No students added after second week of classes. Letter grades only. S. Divo and staff.For beginners only, providing a thorough grounding in conversational and reading skills. Students with some facility in the spoken language (because Chinese is spoken at home) but who do not read characters should take 109-110. Students who read Chinese, but who speak "dialects," such as Cantonese or Amoy, should enroll in CHIN 215.

CHIN 109-110(1109-1110) Beginning Mandarin Reading and Writing (Standard Chinese)
109 , fall; 110, spring. 4 credits each semester. Students who complete CHIN 110 normally continue with CHIN 209 and 210. Because of high demand, students missing first two meetings without university excuse are dropped so others may register. Letter grades only. Y. Lee Mehta.
Intended primarily for students who speak some Chinese (e.g., at home), hut who have had little or no formal training. The focus is on characters, reading comprehension, basic composition, standard grammar, and reading aloud with standard Chinese (Mandarin) pronunciation.

## CHIN 111-112(1111-1112) Elementary Cantonese I and II

111, fall; 112 , spring. 4 credits each semester. Prerequisite: for CHIN 111, permission of instructor; for CHIN 112, CHIN 111 or equivalent. Students with Mandarin background should enroll in CHIN 211 directly as their first semester in taking Cantonese courses. Letter grades only. H. Huang.
CHIN 111 is for beginners with no or very limited Chinese/Cantonese language background from heritage or previous formal training. CHIN 111/112 gives basic training in oral/aural Cantonese spoken and used in Guangzhou and Hong Kong. CHIN 112 gives some basic training in reading and writing Cantonese characters besides the training in oral/aural Cantonese. For more details, see http://lrc.cornell.edu/asian/courses/ch/ chin111.

CHIN 201-202(2201-2202) Intermediate Standard Chinese (Mandarin) © 201, fall or summer; 202, spring or summer. 4 credits each semester. CHIN 201 satisfies Option 1. Prerequisites: for CHIN 201, CHIN 102 with grade of C+ or above or equivalent; for CHIN 202, CHIN 201 or equivalent. Letter grades only. Q. Teng and staff.

Continuing instruction in written and spoken Chinese with particular emphasis on consolidating basic conversational skills and improving reading confidence and ability.

## CHIN 209-210(2209-2210) Intermediate

 Mandarin Reading and Writing (3) 209, fall; 210, spring. 4 credits each semester. CHIN 209 satisfies Option 1. Prerequisites: for CHIN 209, CHIN 110 or equivalent; CHIN 210, CHIN 209. Letter grades only. Staff.Continuing focus on reading and writing for students with spoken background in standard Chinese; introduction of personal letter writing and other types of composition.

## CHIN 211-212(2211-2212) Intermediate

 Cantonese I and II ©211, fall; 212, spring. 4 credits each semester. CHIN 211 satisfies Option 1. Prerequisites: for 211, permission of instructor and completion of CHIN 112 or elementary conversational skills in Cantonese from heritage but very limited formal training in Cantonese character reading and writing and Mandarin speakers. For 212, CHIN 211 or equivalent. Letter grades only. H. Huang.
Gives comprehensive training in oral and written Cantonese at a higher level than CHIN 111-112. Oral training covers conversational

Cantonese expression on daily life topics with more vocabulary and more sophisticated sentence structures. Written training includes reading aloud and writing Cantonese characters as well as simple composition writing skills in Cantonese characters. For more details, see http://Arc.cornell.edu/asian/ courses/ch/chin211

## CHIN 213-214(2213-2214) High

 Intermediate Cantonese I and II ©213, fall; 214, spring. 4 credits each semester. CHIN 213 satisfies Option 1. Prerequisite: for 213, basic oral/aural and written skill in Cantonese and intention to continue the learning of Cantonese both oral and written, or completion of CHIN 212; Prerequisite for 214: 213 or equivalent. Letter grades only. H. Huang. CHIN 213: A course primarily for students who have acquired basic oral/aural skill in Cantonese and have the interest to start or continue learning speaking Cantonese and reading and writing Cantonese characters; CHIN 214: A course primarily for students who have the interest to raise their oral and written Cantonese to a higher level. Enlarges the range of training in Cantonese reading and writing to essay and research writing in Cantonese characters.

## CHIN 215(2215) Mandarin for Cantonese

 Speakers ©Fall. 4 credits. Satisfies Option 1. Limited to 15 students. Prerequisite: advanced Cantonese with native-like reading and writing ability. Letter grades only. Staff. Works on standard Chinese pronunciation and differences in vocabulary and grammar between Cantonese and Mandarin.

## CHIN 301-302(3301-3302) High

 Intermediate Chinese 앙301, fall; 302 , spring. 4 credits each semester. CHIN 301 satisfies Option 1 Prerequisites: for CHIN 301, CHIN 202 or equivalent; for CHIN 302, CHIN 301. Letter grades only. Y. Lee-Mehta.
Continuing instruction in spoken Chinese and in various genres and styles of written Chinese.

## CHIN 306(3306) Readings in Chinese History, Culture and Society (also CAPS 306[3060]) ©

Spring. 4 credits. Z. Chen.
Designed for CAPS majors to enhance Chinese proficiency while preparing them for studying in a Chinese-language setting. Emphasis is on enlarging vocabulary, enhancing reading proficiency, strengthening conversational ability, and embracing some basic knowledge important for studying in China. Each student in the class is required to have a language partner, and together they will create a portfolio. Readings from several books covering a variety of topics will be required for the course. Students are expected to be equipped with the language skills to function comfortably and confidently in real Chinese settings; have enhanced understanding on various issues of Chinese history, culture and society; have improved listening comprehension; improved reading, writing and translation skills for future research projects; be able to use Chinese language software.

## CHIN 309/310(3309/3310) Business Chinese in Cultural Context (also CHIN 509/510[5509/5510])

Fall, spring. 4 credits each semester. CHIN 309 satisfies Option 1. Prerequisite: permission of instructor only. Letter grades only. Z. Chen.
A two-semester sequence for those who have studied Mandarin to the advanced level (or equivalent). Aims to enhance students' language skills in the business context and to promote understanding of the macro and micro business environment and culture in China. An emphasis on case study is adopted along with task-based language teaching. Based on 10 real cases from real companies. Six are multinational companies that have successfully operated in China by adapting their strategies to the special needs of the Chinese market; four are Chinese companies that have pursued a larger presence in domestic and global markets. Goals are to equip students with language skills, cultural awareness, and software literacy necessary to do business in China. Class will be conducted in Chinese.

## CHIN 411-412|4411-4412) Advanced

 Chinese: Fiction, Reportage, Current Events © ${ }^{6}$411, fall; 412, spring. 4 credits each semester. CHIN 411 satisfies Option 1.
Prerequisites: for CHIN 411, CHIN 302 or equivalent; for CHIN 412, CHIN 411 and permission of instructor. Letter grades only. Q. Teng.

Reading, discussion, and composition at advanced levels.

## [CHIN 425(4425) Special Topics (also CHIN 625[6625]) ©

Fall. 4 credits. Prerequisite: permission of instructor. Letter grades only. Next offered 2008-2009. Staff.]

## CHIN 426(4426) Historical Documents on Modern China (also HIST 465/665[4650/6650], CHIN 626[6626]) ©

Fall. 4 credits. Prerequisite: permission of instructor. Z. Chen.
This course is designed to help graduate students and qualified undergraduates to conduct research on topics on modern Chinese history. To qualify to take the course, a student should have studied Chinese for at least three years. It will concentrate on helping students develop the ability to read and interpret historical documents in Chinese. Altogether, ten sets of original documents representing different events and periods are selected. Documentary films will be shown in class. Both linguistic and historical issues will be addressed and analyzed, so students will develop a better understanding of how to deal with some of the general challenges that they will be facing in conducting primary-source research on modern China. Conducted in Chinese. www.blackboard.cornell.edu/ webapps/portal/frameset.jsp

## CHIN 431-432(4431-4432) Directed

 Study431, fall; 432 spring. 1-4 credits, variable
Prerequisite: permission of instructor. Staff. Intended for advanced language study.

## CHIN 509/510(5509/5510) Business

 Chinese in Cultural ContextFall, spring. 4 credits each semester. Letter grades only. Z. Chen.
For description, see CHIN 309/310.

## [CHIN 625(6625) Special Topics (also

 CHIN 425[4425])Fall. 4 credits. Prerequisite: permission of instructor. Letter grades only. Next offered 2008-2009. Staff.
For description, see CHIN 425.]
CHIN 626(6626) Historical Documents on Modern China (also HIST 465/665[4650/6650], CHIN 426[4426])
Fall. 4 credits. Prerequisite: permission of instructor. Z. Chen.
For description, see CHIN 426.

## Chinese FALCON (Full-year Asian Language CONcentration)

For full information, brochures, etc., see the FALCON Program coordinator in 388
Rockefeller Hall or e-mail: falcon@comell.edu or http://Lrc.cornell.edu/falcon
FALCON is designed to help students develop "copability" in Chinese by bringing them to the level where they can make progress on their own even with no further instruction. The full-year program provides over 1,800 hours of language exposure-which exceeds even the exposure that students living in China typically receive. This allows students to develop levels of fluency, accuracy, and control that are not achieved in other academic settings. By taking the entire fullyear sequence, students can complete as much Chinese in one calendar year as they would complete in three or more years of regular study at most academic institutions. The full-year sequence is CHIN 159 or 160 (summer), 260 (fall), and 360 (spring). Students typically take the entire sequence, but they may take any other portion of the program if they have the necessary
background as determined by a placement interview. Students often choose to apply only to the summer portion. The spring semester of the Chinese program is expected to be offered in Beijing at Peking University. In the summer and fall, three small interactive classes per day are conducted entirely in Chinese, and one lecture is conducted in both Chinese in English. In the spring semester, all four classes are conducted entirely in Chinese. In the summer and fall, students are also required to spend two one-hour sessions per day in the language lab. Additional preparation time in the language lab of up to three hours is necessary in the evenings.
Students must formally apply to the program To guarantee course availability, applications must be received by March 1. After that, applicants are reviewed on a rolling basis and acceptance is contingent on the availability of spaces. Applications are available in 388 Rockefeller Hall or at http://Irc.cornell.edu/ falcon.

## CHIN 159(1159) Summer Intensive

 Chinese (FALCON)Summer only. 1-7 credits. Prerequisite: some previous language study in Chinese; permission of program director. S. Divo and staff.
This course is for students who take CHIN 160 for fewer than 8 credits.

## CHIN 160(1160) Introductory Intensive Mandarin (FALCON)

Summer only. 8 credits. Students who complete this course with grade of at least B are normally eligible to enroll in CHIN 201. S. Divo and staff.

Introduction to spoken and written Mandarin. Lectures on linguistic and cultural matters, intensive practice with native speakers, and laboratory work.

## CHIN 260(2260) Intermediate Intensive

 Mandarin (FALCON) 상Fall. 16 credits. Satisfies Option 1.
Prerequisites: for CHIN 260, CHIN 160 or equivalent or permission of instructor. Students must apply formally to FALCON program; open to all Cornell students and students from other institutions. S. Divo and staff.
Work on spoken and written Chinese from an intermediate to an advanced level. This is a full-time program and full academic load; the demands of the program do not normally permit students to take other courses simultaneously. With a sequence of 160,260 , and 360 , in only one calendar year a student can complete as much Chinese as would be gained in three or more years of regular study at most academic institutions. This course sequence also serves to fulfill the language requirement for the M.A. in Asian Studies and the joint M.B.A./M.A. in Asian Studies. For more information and application forms, please contact the FALCON Program office.

CHIN 360(3360) Advanced Intensive Mandarin (FALCON) ©
Spring. 16 credits. CHIN 360 is scheduled to be held in Beijing, People's Republic of China. S. Divo and staff.
For description, see CHIN 260.

## Literature in Chinese

## CHLIT 213-214(2213-2214) Introduction

 to Classical Chinese © \# (LA-AS) 213, fall; 214 , spring. 3 credits each semester. CHLIT 213-214 does NOT satisfy Option 1. Prerequisite: for 213, qualification in Chinese or permission of instructor; for 214,213 or permission of instructor. May be taken concurrently with CHIN 101-102, 201-202, 301-302. Open to students who have studied at least two years of any language that employs Chinese writing system (e.g., Mandarin, Cantonese, Japanese). D. X. Warner and B. Rusk.Two-part introductory course. Students learn the fundamental grammar and vocabulary of classical Chinese by analyzing and translating short passages.

## [CHLIT 300(3300) Reading from the Early

 Masters © \# (HA-AS)Spring. 4 credits. Prerequisites: CHLIT 213214 or permission of instructor. Next offered 2010-2011. R. McNeal. Students read and discuss several passages from early classical texts, such as the Confucian Analects, the Mozi, the Guanzi, and others. Attention is paid to grammar, historical context, and methodology.]
[CHLIT 307(3307) Readings in Classical Chinese Literature © \# (LA-AS)
Spring. 4 credits. Next offered 2009-2010.
D. X. Warner and B. Rusk.]

## CHLIT 418(4418) Medieval Chinese

Narrative Tales © \# (LA-AS)
Fall. 4 credits. Prerequisite: at least three years of Chinese language training and preferably one year classical Chinese. D. X. Warner.

This course introduces students to medieval Chinese narrative literature. Through selected readings in the original language, students will explore various topics, themes and narrative techniques that define the chuanqi genre in the context of medieval Chinese literai and popular culture. In the process, students will gain an understanding of the early development of the narrative tradition in Chinese literary history.
[CHLIT 420(4420) T'ang Poetry: Themes and Contexts (also CHLIT 620[6620]) (2) (LA-AS)

Fall. 4 credits. Prerequisite: minimum three years of Chinese and/or one year of Classical Chinese or permission of instructor. Next offered 2008-2009 D. X. Warner.

A guided reading in Chinese of selected works on shared themes written by selected poets of the T'ang dynasty ( $618-907$ ). Focuses on developing the essential skills for reading T'ang poems while giving attention to their social, cultural, and historical contexts.]

## CHLIT 421-422(4421-4422) Directed

 StudyFall or spring. 2-4 credits each semester.
Prerequisite: permission of instructor. Staff. Students choose a faculty member to oversee this independent study. The student and the faculty member work together to develop course content.

## CHLIT 423(4423) Readings in Chinese History © <br> Spring. 4 credits. Satisfies Option 1. Staff.

CHLIT 435(4435) Chinese Buddhist Texts © ${ }^{\text {\# (LA-AS) }}$
Fall. 4 credits. Prerequisite: one year of classical Chinese or permission of instructor. Open to students in any area of East Asia with an interest in developing skills in Buddhist texts. D. Boucher.
This seminar is designed to introduce students to the idiom of Buddhist Chinese. We will start by reading selections from the early translations to gain grounding in the vocabulary and syntax that came to characterize literary Buddhism in China. From there we will survey some of the so-called apocryphal texts (Buddhist "sutras" produced in China) and look at samples from important writers and schools, depending on students interests.

## [CHLIT 603(6603) Seminar in Chinese

 Fiction and DramaFall. 4 credits. Prerequisite: permission of instructor. Next offered 2008-2009. E. Gunn.]

## [CHLIT 605(6605) Seminar in Chinese

 Fiction and DramaSpring. 4 credits. Prerequisite: permission of instructor. Next offered 2008-2009. Staff.]

CHLIT 610(6610) Chinese Cultural Criticism
Spring. 4 credits. E. Gunn.
This course develops questions about cultural criticism of China through reading and discussion of modern critiques of Chinese culture, primarily from the late Qing to the post-Mao era, selected from the work of both Chinese and Western critics. Particular emphasis is placed on the role of cultural criticism in producing literature.
[CHLIT 615(6615) Seminar: Ideas and Literature of Medieval China
Spring. 4 credits. Next offered 2008-2009. D. X. Warner.]

CHLIT 621-622(6621-6622) Advanced Directed Reading: Chinese Historical Syntax
621, fall; 622, spring. $2-4$ credits.
Prerequisite: permission of instructor. Staff. Students choose a faculty member to oversee this independent study. The student and the faculty member work together to develop class readings.

## Hindi

HINDI 101-102(1101-1102) Elementary Hindi
101, fall; 102 , spring. 6 credits each semester. Students may not receive credit for both HINDI 101 and 109. Students may not receive credit for both HINDI 102 and 110. Prerequisite: for HINDI 102, HINDI 101 or equivalent. Letter grades only.
S. Singh and staff.

For those students who have had very little or no exposure to Hindi. Designed to enable such students to read, write, and converse in the language with confidence and enjoyment. The language presented is colloquial. The Hindi script is taught first. Students who have some experience of Hindi or a closely related language are suited for HINDI 109-110 and should check with the instructor.

## HINDI 109-110(1109-1110) Accelerated Elementary Hindi

109 , fall; 110 , spring. 4 credits each semester. Students may not receive credit for both HINDI 101 and 109.
Students may not receive credit for both
HINDI 102 and 110. Prerequisite: for
HINDI 110, HINDI 109 or equivalent.
Check with instructor regarding placement.
Letter grades only. S. Singh and staff.
Entry-level sequence for students with some prior exposure to Hindi or a closely related language. Provides a thorough grounding in all the language skills: listening, speaking, reading, and writing.

## HINDI 201-202(2201-2202) Intermediate

 Hindi ${ }^{6}$201, fall; 202, spring. 4 credits each semester. HINDI 201 satisfies Option 1. Prerequisites: for HINDI 201, HINDI 102 or HINDI 110; for HINDI 202, HINDI 201 or permission of instructor. Letter grades only. S. Singh and staff.

## HINDI 301-302(3301-3302) Advanced

 Hindi Reading ©301, fall; 302, spring. 3 credits each semester. HINDI 301 satisfies Option 1. Prerequisites: for HINDI 301, HINDI 202; for HINDI 302, HINDI 301 or equivalent.
Letter grades only. S. Singh and staff.
Selected readings in modern Hindi literature.

## HINDI 431-432(4431-4432) Directed

 Study431, fall; 432 spring. 1-4 credits, variable.
Prerequisite: permission of instructor. Letter grades only. S. Singh.
Intended for advanced language study.

## Indonesian

## INDO 121-122(1121-1122) Elementary Indonesian

121 , fall; 122 , spring. 4 credits each semester. Prerequisite: for INDO 122 ,
INDO 121. Letter grades only. J. Pandin. Gives a thorough grounding in basic speaking and listening skills with an introduction to reading.

## INDO 205-206(2205-2206) Intermediate

## Indoneslan 숭

205 , fall; 206, spring. 3 credits each semester. INDO 205 satisfies Option 1. Prerequisites: for INDO 205, INDO 122 or equivalent; for INDO 206, INDO 205 or equivalent. Letter grades only. J. Pandin. Develops all four skills: reading, writing, speaking, and comprehension.

## INDO 301-302(3301-3302) Advanced

 Indonesian 잉301, fall; 302, spring. 3 credits each semester. INDO 301 satisfies Option 1. Prerequisite: INDO 206 or equivalent. Letter grades only. J. Pandin.
Practical language course on an advanced level in which students read selected materials on current issues, write reports, and make oral presentations.

## INDO 431-432(4431-4432) Directed Study

431, fall; 432 spring. $1-4$ credits, variable.
Prerequisite: permission of instructor. Letter grades only. J. Pandin.
Intended for advanced language study.

## Japanese

## JAPAN 101-102(1101-1102) Elementary

 Japanese101, fall; 102, spring. 6 credits each semester. Prerequisite for 102: JAPAN 101 or placement by instructor during registration period. Intended for beginners or those who have been placed in the course by examination. Students must enroll in one lec and one sec. Letter grades only. M. Suzuki and staff. Gives a thorough grounding in all four language skills-speaking, listening, reading, and writing-at the beginning level. The lecture provides explanation, analysis, and cultural background. Sections are conducted entirely in Japanese.

## JAPAN 201-202(2201-2202) Intermediate

 Japanese Conversation I 항201, fall; 202, spring. 4 credits each semester. JAPAN 201 satisfies Option 1. Prerequisites: for JAPAN 201, JAPAN 102 or placement by instructor during registration; for JAPAN 202, JAPAN 201 or placement by instructor during registration. Students must enroll in lec and one sec. Letter grades only. Y. Katagiri.
For students with an elementary level of Japanese to continue study of the language and acquire widely applicable oral proficiency. Sections are conducted entirely in Japanese to develop listening comprehension and speaking ability through practical situational practices. Lectures give versatile knowledge of essential structural patterns systematically, with audiovisual aids (e.g., Japanese TV) to demonstrate use in actual situations.

JAPAN 203-204(2202-2204) Intermediate Japanese Reading I
203, fall; 204, spring. 2 credits each semester. Prerequisites: for JAPAN 203, JAPAN 102 or 142, or placement by instructor during registration; for JAPAN 204, JAPAN 203 or 241, or placement by instructor during registration. Letter grades only. Y. Katagiri.
Reading of intermediate texts emphasizing practical materials, with development of writing skills.

## JAPAN 241-242(2241-2242) Intermediate

Japanese at a Moderate Pace ©
241, fall; 242 , spring. 4 credits each semester. JAPAN 241 satisfies Option 1. Prerequisites: for JAPAN 241, JAPAN 142 or placement by instructor during registration period; for JAPAN 242, JAPAN 241 or placement by instructor. Letter grades only. S. Ichikawa.

Training in listening, speaking, reading, and writing for those students who have acquired a basic beginning-level command.
JAPAN 301-302(3301-3302) Intermediate Japanese Conversation II 룽
301, fall; 302, spring. 3 credits each
semester JAPAN 301 satisfies Option 1.
Prerequisites: for JAPAN 301, JAPAN 202 or 242 or placement by instructor during registration; for JAPAN 302, JAPAN 301 or placement by instructor during registration. Letter grades only. K. Selden and S. Ichikawa.

For students who have learned basic Japanese grammar and oral skills and would like to use the language for natural conversation and effective oral communication. The course is intended to (1) expand vocabulary for daily life use; (2) brush up on knowledge of basic grammar for fluency; and (3) develop communicative skills for varied situations.

## JAPAN 303-304(3303-3304) Intermediate

 Japanese Reading II ©303, fall; 304, spring. 4 credits each semester. JAPAN 303 satisfies Option 1. Prerequisites: for JAPAN 303, JAPAN 204 or placement by instructor during registration; for JAPAN 304, JAPAN 303 or placement by instructor during registration. Letter grades only. K. Selden.
Reading of selected modern texts, including excerpts and brief complete pieces by outstanding writers of Japanese prose

## JAPAN 401-402(4401-4402) Oral

 Narration and Public Speaking401, fall; 402, spring. 4 credits each semester. Prerequisites: for JAPAN 401, JAPAN 302 or placement by instructor during registration; for JAPAN 402, JAPAN 401 or placement by instructor during registration. Letter grades only. N. Larson. Develops all four language skills (speaking, listening, reading, and writing) at the advanced level.

## [JAPAN 410(4410) History of the

## Japanese Language (also LING/

## ASIAN 411[4411]) @ (HA-AS)

4 credits. Prerequisite: permission of instructor. Next offered 2009-2010. J. Whitman.

For description, see LING 411.]

## JAPAN 421-422(4421-4422) Directed

 Readings421, fall; 422 , spring. $1-4$ credits. Prerequisite: advanced students; placement by instructor during registration. Letter grades only. K. Selden.
Selected texts from modern and contemporary short stories.

## JAPAN 431-432(4431-4432) Directed

 Study431, fall; 432, spring. 1-4 credits each semester. Prerequisite: permission of instructor. Letter grades only. Staff. Intended for advanced language study.

## Japanese FALCON (Full-year Asian Language Concentration)

Web site: http://lrc.cornell.edu/falcon.
Director: R. Sukle, 388 Rockefeller Hall, 2550734 or rjs19@cornell.edu.
Program coordinator: 388 Rockefeller Hall, 255-6457 or falcon@cornell.edu.
FALCON is designed to develop "copability" in students by bringing them to the level where they can make further progress on their own even with no further instruction.
The full-year program provides over 1,800 hours of language exposure-which exceeds even the exposure that students living in Japan typically receive. This intensive work in Japanese allows students to develop levels of fluency, accuracy, and control of the language that is not achieved in any other type of academic setting. The full-year FALCON sequence is Japanese 160 (summer), 260 (fall), and 360 (spring). By taking this entire sequence, students can complete as much Japanese in one calendar year as they would complete in three or more years of regular study at most academic institutions. Because of FALCON's intensive nature, graduate students can complete their language work in minimal time. Undergraduates, including freshmen, achieve levels of competency that far exceed what is normally achieved in a four-year program, provided that they continue studying Japanese after FALCON. Three small interactive classes per day are conducted entirely in Japanese, and one lecture is conducted in both Japanese and English. The interactive classes are conducted by experienced and highly trained teachers, and the lecture is taught by an expert in the structure of the Japanese language. In addition to time spent in these classes, students are required to spend two one-hour sessions per day in the language lab. Additional preparation time in the language lab of up to three hours is necessary in the evenings. One must formally apply to the program to take the courses. The deadline for application is March 1 in a given year, but applications will be considered after that date if space is still available. The degree of intensity of the program makes it impossible to simultaneously take other courses or work except possibly on weekends.

## JAPAN 159(1159) Summer Intensive

 Japanese (FALCON)Summer only. 1-7 credits. Prerequisite: permission of program director; some previous language study in Japanese. Formal application to FALCON is required. Applications must be received by March 1. After the deadline, applications are
considered provided that space is available. R. Sukle and staff. This course is for students who take JAPAN 160 for fewer than 8 credits.

## JAPAN 160(1160) Introductory Intensive Japanese (FALCON)

Summer only. 8 credits. Formal application to FALCON is required. Admission is open to all students, not just those planning to take the full year. Students from other institutions are also welcome to apply. Applications must be received by March 1 . After the deadline, applications are considered provided that space is available. R. Sukle and staff.

This is the first semester of FALCON. It is a full-time, intensive, nine-week course thrat meets Monday through Friday from 8:30 A.M. to 4:30 P.M.; 160 starts at the absolute beginning level, in terms of speaking, listening, and rudimentary reading and writing. Students who complete this course and plan to continue at Cornell may take the fall and spring FALCON courses (JAPAN 260 and 360). Students interested in other options for continuing after FALCON should consult the FALCON director, Robert Sukle, at rjs19@cornell.edu or 255-0734.

## JAPAN 260(2260) Intermediate Intensive

 Japanese (FALCON) ©Fall. 16 credits. Satisfies Option 1. Prerequisites: JAPAN 160, JAPAN 102 at Cornell, or placement by FALCON staff before beginning of fall semester. Formal application to FALCON is required. Admission is open to all students, including those from other institutions. Applications must be received by March 1. After the deadline, applications are considered provided that space is available. R. Sukle and staff.
Work on spoken and written Japanese from an intermediate level to an advanced level. This is a full-time program and a full academic load. The schedule is Monday through Friday, approximately 9:00 A.M. to 4:30 P.M. The demands of the program do not permit students to take other courses simultaneously. The 160-260-360 sequence fulfills the language requirement for the M.A. in Asian Studies and the joint M.B.A./M.A. in Asian Studies.

## JAPAN 360(3360) Advanced Intensive

 Japanese (FALCON) ©Spring. 16 credits. R. Sukle and staff. For description, see JAPAN 260.

## Literature in Japanese

## JPLIT 406(4406) Introduction to

 Classical Japanese © \#Fall. 4 credits. Satisfies Option 1.
Prerequisite: JAPAN 402 or permission of instructor. K. Selden.
Introduction to the fundamental grammar and vocabulary of classical Japanese.

## JPLIT 408(4408) Readings in Classical Japanese © \#

Spring. 4 credits. Satisfies Option 1.
Prerequisite: JPLIT 406 or permission of instructor. K. Selden.
Readings of excerpts and complete brief pieces from representative premodern Japanese literature mostly with the use of standard modern annotated editions.

## JPLIT 421-422(4421-4422) Directed

 Readings421, fall; 422, spring. 1-4 credits.
Prerequisite: advanced students; permission of instructor. Staff.
Students choose a faculty member to oversee this independent study. The student and the faculty member work together to develop class readings.

## [JPLIT 617(6617) Modern Japanese Philosophy

Fall. 4 credits. Next offered 2009-2010. N. Sakai.]

## [JPLIT 618(6618) Japanese Philosophical

 Discourse IlSpring. 4 credits. Prerequisite: reading knowledge of Japanese. Next offered 2009-2010. N. Sakai.]

## JPLIT 625(6625) Directed Readings

Fall or spring. 4 credits. Staff.
Students choose a faculty member to oversee this independent study. The student and the faculty member work together to develop class readings.

JPLIT 627-628(6627-6628) Advanced Directed Readings
627 , fall; 628 , spring. $1-4$ credits
Prerequisite: permission of instructor. Staff.

## Khmer (Cambodian)

## KHMER 121-122(1121-1122) Elementary

 Khmer121, fall; 122, spring. 4 credits each semester. Prerequisite: for KHMER 122, KHMER 121; for beginners or those placed in course by examination. Letter grades only. H. Phan.
Gives a thorough grounding in speaking and reading.

## KHMER 201-202(2201-2202)

Intermediate Khmer Reading ©
201, fall; 202, spring. 3 credits each semester. KHMER 201 satisfies Option 1.
Prerequisites: for KHMER 201, KHMER 122; for KHMER 202, 201. Letter grades only. H. Phan.

Continuing instruction in spoken and written Khmer.

KHMER 203-204(2203-2204) Intermediate Composition and Conversation ©
203, fall; 204, spring. 3 credits each semester. KHMER 203 satisfies Option 1 Prerequisites: for KHMER 203, KHMER 122; for KHMER 204, 203. Letter grades only. H. Phan.

## KHMER 301-302(3301-3302) Advanced

 Khmer 웅301, 302, fall. 4 credits each semester. KHMER 301 satisfies Option 1.
Prerequisites: for KHMER 301, KHMER 202 or equivalent; for KHMER 302, 301. Letter grades only. H. Phan.
Continuing instruction in spoken and written Khmer; emphasis on enlarging vocabulary, increasing reading speed, and reading various genres and styles of prose.

## KHMER 431-432(4431-4432) Directed Study

431, fall; 432, spring. 1-4 credits variable. Prerequisite: permission of instructor. Letter grades only. H. Phan.
Intended for advanced language study.

## Korean

## KOREA 101-102(1101-1102) Elementary

 Korean101, fall; 102 , spring. 6 credits each semester. Students may not receive credit for both KOREA 101 and KOREA 109
Students may not receive credit for both
KOREA 102 and 110. Letter grades only. M. Song.

Covers basics of speaking, reading, and writing Introduces Hangul writing system and grammar.

## KOREA 109-110(1109-1110) Elementary

 Reading109 , fall; 110 , spring. 3 credits each semester. Prerequisite: permission of instructor. Students may not receive credit for both KOREA 101 and KOREA 109.
Students may not receive credit for both
KOREA 102 and 110. Letter grades only $M$. Song.
For students who have spoken some Korean in the home, but whose reading and writing skills are limited or nonexistent. If in doubt about eligibility, see instructor

## KOREA 201-202(2201-

2202) Intermediate Korean ©

201, fall; 202, spring. 4 credits each semester. KOREA 201 satisfies Option 1. Prerequisites: for KOREA 201, KOREA 102 or permission of instructor; for KOREA 202, 201. Letter grades only. H. Jeong and staff.
Covers the basics of speaking, reading, and writing at the intermediate level

## KOREA 209-210(2209-

2210) Intermediate Reading © 209, fall; 210, spring. 4 credits each semester. KOREA 209 satisfies Option 1. Prerequisites: for KOREA 209, KOREA 110 or permission of instructor; for KOREA 210,209 or permission of instructor. If in doubt about eligibility, see instructor. Letter grades only. H. Jeong.
Intermediate level of reading comprehension and writing course for students who have acquired basic oral proficiency. Introduces some reading and writing with Chinese characters.

## KOREA 301-302(3301-3302) Advanced

 Korean ©301, fall; 302, spring. 4 credits each semester. KOREA 301 satisfies Option 1.
Prerequisites: for KOREA 301, KOREA 202 or placement by instructor; for KOREA 302, 301 or placement by instructor. Letter grades only. M. Song.
Reading of advanced texts, including newspapers and Chinese character material, together with advanced use of the spoken language
[KOREA 430(4430) Structure of Korean (also LING/ASIAN 430[4430]) (KCMAS)
Spring. 4 credits. Next offered 2009-2010. J. Whitman.

For description, see LING 430.]
KOREA 431-432(4431-4432) Directed Study
431, fall; 432, spring. 1-4 credits, variable. Prerequisite: permission of instructor. Letter grades only. Staff.
Intended for advanced language study.

## Literature in Korean

## KRLIT 405(4405) Readings in Korean

 Literature © (LA-AS)Fall. 4 credits. Prerequisite: three years of Korean language study or permission of instructor. M. Shin.
Readings of 20th-century Korean literature in the original. Short stories and novels are selected to provide a mixture of canonical and contemporary authors. Students also read some academic works of literary history and criticism.
[KRLIT 432(4432) Middle Korean (also LING 432[4432]) © (LA-AS)
Spring. 4 credits. Prerequisite: KOREA 301 or equivalent. Next offered 2009-2010. J. Whitman.

For description, see LING 432.$]$

## [KRLIT 615(6615) Development of

 Literary Modernity in KoreaFall. 4 credits. Prerequisite: graduate standing; fluency in Korean. Next offered 2008-2009.]

KRLIT 617(6617) Colonial Modernity In Korea
Spring. 4 credits. Prerequisites: fluency in
Korean and permission of instructor.
M. Shin.

This course examines the nature of colonial modernity in Korea, its effects on the economy, society, and resistance movements, and intellectual responses to it. The objective is to analyze the relation between colonialism and capitalist development and the roots of Korea's division. Readings will involve theoretical works, contemporary scholarship, and primary source materials.

## Nepali

## The Cornell Nepal Study Program

Cornell and the central campus of Tribhuvan National University (in Kirtipur, Kathmandu) cosponsor a semester or year in Nepal at the Cornell Nepal Study Program for both undergraduate and graduate students. North American students live and study with Nepali students at the Cornell program houses near the university, taking courses taught in English by faculty from Tribhuvan University. After an intensive orientation, semester courses include intensive spoken and written Nepali language, Contemporary Issues in Nepal, and Research Design and Methods in a wide variety of fields in the social and natural sciences and the humanities. (Language instruction in Tibetan and Newari may also be arranged.) There is a 10 -day study tour and field trip during the semester, and students execute their research proposal during four weeks of guided field research, writing up their findings for presentation at the end of the semester.
Juniors, seniors, and graduate students from any field may apply. Students should have a desire to participate in a program featuring relatively intense cultural immersion and to undertake rigorous field research. Instruction is in English, but prior study of Nepali language is strongly recommended for Cornell students. Those interested in the program should consult Cornell Abroad (cuabroad@ cornell.edu).

NEPAL 101-102(1101-1102) Elementary Nepali
101, fall; 102, spring; 101-102, summer. 6 credits each semester. Prerequisite: for NEPAL 102, NEPAL 101 or examination. Letter grades only. S. Oja.
Intended for beginners. The emphasis is on basic grammar, speaking, and comprehension skills, using culturally appropriate materials and texts. Devanagari script for reading and writing is also introduced.

NEPAL 201-202(2201-2202) Intermediate Nepali Conversation 숭
201, fall; 202, spring; 201-202, summer. 3 credits each semester. NEPAL 201 satisfies Option 1. Prerequisites: for NEPAL 201, NEPAL 102 or examination; for NEPAL 202, 201 or examination. Letter grades only. S. Oja.

Intermediate instruction in spoken grammar and verbal comprehension skills, with special attention to developing technical vocabularies and other verbal skills appropriate to students professional fields.

## NEPAL 203-204(2203-2204) Intermediate

 Nepali Composition 숭203, fall; 204, spring; 203-204, summer. 3 credits each semester. NEPAL 203 satisfies Option 1. Prerequisites: for NEPAL 203,
NEPAL 102 or examination; for NEPAL 204,
203 or examination. Letter grades only. S. Oja.

Systematic review of written grammar and reading comprehension, with special attention to the technical vocabularies, necessary writing skills, and published materials typical of advanced students' professional fields.

## NEPAL 301-302(3301-3302) Adyanced

 Nepall 앙301, fall; 302, spring; 301-302, summer. 3 credits each semester. NEPAL 301 satisfies Option 1. Prerequisite: NEPAL 204 or
permission of instructor. Letter grades only S. Oja.

Reading of advanced texts, together with advanced drill on the spoken language

## NEPAL 431-432(4431-4432) Directed Study

431, fall; 432 spring. $1-4$ credits, variable Letter grades only. S. Oja.
Permission of instructor needed. Intended for advanced language study.

## Pall

## [PALI 131-132(1131-1132) Elementary

 Pali131, fall; 132 , spring. 3 credits each
semester. This language series may not be used to satisfy language requirement. Next offered 2008-2009. Staff.]

## PALI 450(4450) Readings in Pali ©

Fall. 3 credits. Prerequisite: permission of instructor. Letter grades only. A. Blackburn. Readings in Pali selected in relation to student and instructor interests. This course may be repeated for credit with different topics and readings.

## Sanskrit

SANSK 131-132(1131-1132) Elementary Sanskrit (also CLASS 191-192[13311332], LING 131-132[1131-1132])
131, fall; 132, spring. 4 credits each semester. Offered alternate years. Letter grades only. A. Ruppel.
[SANSK 251-252(2251-
2252) Intermediate Sanskrlt (also CLASS 291-292[2351-2352], LING 251-252[2251-2252] ] 울
251, fall; 252, spring. 3 credits each semester. SANSK 251 satisfies Option 1. Prerequisite: SANSK 132 or equivalent. Offered alternate years; next offered 20082009. Letter grades only. Staff.]

## SANSK 301-302(3301-3302) Advanced

 Sanskrit I |also CLASS 393-394[3393-3394]) 퉁301, fall; 302, spring. 4 credits. Prerequisite: two years prior study of Sanskrit or equivalent. Letter grades only. L. McCrea. Selected readings in Sanskrit literary and philosophical texts.

## [SANSK 323|3323) Buddhist Hybrid

 SanskritFall. 4 credits. Next offered 2008-2009. D. Boucher]

## SANSK 431-432(4431-4432) Directed

 Study431, fall; 432, spring. 1-4 credits, variable. Prerequisite: permission of instructor. Letter grades only. Staff
Intended for advanced language study.

## Literature in Sanskrit

SNLIT 465(4465) The Literature of Ancient India
Spring. 4 Credits. L. McCrea.
The course will survey in translation a selection of major works of poetry, drama, and aesthetic theory and criticism from the Sanskrit literary tradition of ancient India. Attention will be given to the historical development of aesthetic and heroic ideals. Students will read literary texts from the Hindu, Buddhist, and Jain traditions, and explore the interplay between religious and literary imperatives in these works. Students will also be introduced to the extensive and sophisticated tradition of literary theory and criticism in pre-modern India.

## Sinhala (Sinhalese)

## SINHA 121-122(1121-1122) Elementary

 Sinhala121, fall; 122, spring. 4 credits each semester. Prerequisite: for SINHA 122, SINHA 121 or equivalent. Letter grades only. W. Liyanage.
Semi-intensive introduction to colloquial Sinhala, intended for beginners. A thorough grounding is given in all the language skills; listening, speaking, reading, and writing,

## SINHA 201-202(2201-2202) Intermediate

 Sinhala ${ }^{\text {e }}$201, fall; 202, spring. 3 credits each semester. Satisfies Option 1. Prerequisites: for SINHA 201, SINHA 102 or SINHA 122; for SINHA 202, 201 or equivalent. Letter grades only. W. Liyanage.
This course further develops student competence in Colloquial Sinhala, attending to all the language skills: listening, speaking, reading and writing. In addition, this course prepares students for the transition to Literary Sinhala.

SINHA 301(3301) Literary Sinhala I 웅
Fall or spring. 3 credits. Satisfies Option 1. Prerequisite: SINHA 201/202 or permission of instructor. Letter grades only. W. Liyanage.

This one-semester course provides an introduction to the distinctive grammatical forms and vocabulary used in Literary Sinhala While focused particularly on the development of reading skills, the course also introduces students to Literary Sinhala composition, and builds students' listening comprehension of semi-literary Sinhala forms (such as those used in radio and TV news).
SINHA 400(4400) Literary Sinhala II
Fall or spring. 2-4 credits variable. Prerequisite: SINHA 301 or permission of instructor. W. Liyanage.
This one-semester course further develops students' comprehension of written Literary Sinhala, using sample materials from a variety of genres prepared by the instructor, as well as excerpts from texts relevant to graduate student research (when appropriate).

## SINHA 431-432(4431-4432) Directed

 Study431, fall; 432 spring. $1-4$ credits variable. Prerequisite: permission of instructor. Letter grades only. W. Liyanage.
Intended for advanced language study.

## Tagalog

## TAG 121-122(1121-1122) Elementary

 Tagalog121, fall; 122, spring. 4 credits each semester. Prerequisite: for TAG 122, TAG 121. Letter grades only. T. Savella Gives a thorough grounding in basic speaking and listening skills with an introduction to reading.

## TAG 205-206(2205-2206) Intermediate

 Tagalog 웅205, fall; 206, spring. 3 credits each semester. TAG 205 satisfies Option 1. Prerequisites: for TAG 205, TAG 122 or equivalent; for TAG 206, 205 or equivalent Letter grades only. T. Savella.
Develops all four skills: reading, writing, speaking, and comprehension.

## TAG 301-302(3301-3302) Advanced

 Tagalog (a)301 , fall; 302 , spring. 3 credits each semester. TAG 301 satisfies Option 1. Prerequisite: TAG 206 or equivalent. Letter grades only. T. Savella.
Continuing instruction on conversational skills but with emphasis on reading and writing. Selected core readings in contemporary Tagalog literature are used, but students, in consultation with the instructor, may select some of the reading materials

TAG 431-432(4431-4432) Directed Study
431, fall; 432, spring. 1-4 credits, variable. Prerequisite: permission of instructor. Letter grades only. T. Savella.
Intended for advanced language study.

## Tamil

TAMIL 121/122(1121/1122) Elementary Tamil
121, fall; 122, spring. 4 credits. Letter grades only. S. Chavan
This course will teach modern spoken and written Tamil to beginning level students Students will learn Tamil through simple
conversations, sentence and question construction, grammar, culture and festivals and folk tales of Tamalians of India, and how to express performance of simple daily activities. All course activities conducted in Tamil. An interactive videoconference course.

## Thal

## THAI 101-102(1101-1102) Elementary

 Thal101, fall; 102, spring. 6 credits each semester. Prerequisite: for THAI 102, THAI 101 or equivalent. Intended for beginners or students placed by examination. Letter grades only. N. Jagacinski.
Gives a thorough grounding in all the
language skills: listening, speaking, reading, and writing.

## THAL 201-202(2201-2202) Intermediate

 Thai Reading 숭201, fall; 202, spring. 3 credits each semester. THAI 201 satisfies Option 1. Prerequisites: for THAI 201, THAI 102; for THAI 202, 201 or equivalent. Letter grades only. N. Jagacinski.
Continuing instruction in spoken and written Thai.

THAI 203-204(2203-2204) Intermediate Composition and Conversation 랑
203, fall; 204, spring. 3 credits each semester. THAI 203 satisfies Option 1. Prerequisites: for THAI 203, THAI 102; for THAI 204, 203. Letter grades only.
N. Jagacinski.

Intermediate instruction in spoken and written grammar and reading comprehension.

## THAI 301-302(3301-3302) Advanced Thal

 둥301, fall; 302, spring. 4 credits each semester. THAI 301 satisfies Option 1.
Prerequisite: THAI 202 or equivalent. Letter grades only. N. Jagacinski.
Selected readings in Thai writings in various

## fields.

THA: 303-304(3303-3304) Thal Lliterature 앙
303, fall; 304, spring. 4 credits each semester. THAI 303 satisfies Option 1. Prerequisite: THAI 302 or equivalent. Letter grades only. N. Jagacinski.
Reading of significant novels, short stories, and poetry written since 1850 .
THAI 431-432(4431-4432) Directed Study
431, fall; 432 spring. 1-4 credits variable.
Prerequisite: permission of instructor. Letter
grades only. N. Jagacinski.
Intended for advanced language study.

## Urdu

URDU 125(1125) Introduction to the Urdu script (also NES 107[1312])
Spring. 1 credit. Prerequisite: HINDI 102 or
permission of instructor. Letter grades only. S. Singh.

Provides instruction in the basics of the Urdu script. Intended primarily for students who have had some exposure to Hindi or Urdu but who have had little or no formal training in the script. The course focuses on mastering the script and pronunciation. It does not provide instruction in grammar.

URDU 201-202(2201-2202) Intermediate Written Urdu
201, fall; 202, spring. 2 credits. Prerequisite: HINDI 102 or HINDI 110; and URDU 125 or permission of instructor. Letter grades only. S. Singh.
This course is designed to develop competence in Urdu reading and writing for students with a first-year knowledge of Hindi and knowledge of Urdu script. May be taken concurrently with Intermediate Hindi.

## URDU 431-432(4431-4432) Directed Study

431, fall; 432, spring. 1-4 credits variable. Prerequisite: permission of instructor. Letter grades only. S. Singh.
Intended for advanced language study.

## Vietnamese

## VIET 101-102(1101-1102) Elementary

 Vietnamese101, fall; 102, spring. 6 credits each semester. Prerequisite: for VIET 102, VIET 101 or equivalent. Intended for beginners or students placed by examination. Letter grades only. T. Tranviet.
Gives a thorough grounding in all language skills: listening, speaking, reading, and writing
VIET 201-202(2201-2202) Intermediate Vletnamese 앙
201, fall; 202, spring. 3 credits each semester. VIET 201 satisfies Option 1. Prerequisites: for VIET 201, VIET 102 or equivalent; for VIET 202, 201. Letter grades only. T. Tranviet.
Continuing instruction in spoken and written Vietnamese.
VIET 203-204(2203-2204) Intermediate Vietnamese Composition and Reading ©
203, fall; 204, spring. 3 credits each semester. VIET 203 satisfies Option 1. Prerequisite: permission of instructor. Letter grades only. T. Tranviet.
Designed for students and "native" speakers of Vietnamese whose speaking and listening are at the advanced level, but who still need to improve writing and reading skills.

## VIET 301-302(3301-3302) Advanced Vletnamese 6

301, fall or spring; 302, fall or spring. 3 credits each semester. VIET 301 satisfies Option 1. Prerequisites: for VIET 301, VIET 202 or permission of instructor; for VIET 302, 301. Letter grades only. T. Tranviet. Continuing instruction in spoken and written Vietnamese; emphasis on enlarging vocabulary, increasing reading speed, and reading various genres and styles of prose.
VIET 431-432(4431-4432) Directed Study
431, fall; 432 spring. $1-4$ credits, variable.
Prerequisite: permission of instructor. Letter
grades only. T. Tranviet.
Intended for advanced language study.

## $\overline{\text { Vietnamese Literature }}$

## VTLIT 222(2222) Introduction to Classical Vietnamese 웅

222, fall. 3 credits. Satisfies Option 1.
Prerequisite: qualification in Vietnamese or permission of instructor.
K. Taylor.

VTLIT 222 introduces students to Han (classical Chinese as used in the Vietnamese language) and Nom (vernacular Vietnamese
character writing). Students learn to read Han and Nom texts, from the 17th through 19th centuries, including historical records, prose writings, and poetry.

## Related Courses in Other Departments <br> and Colleges

Check the primary department section for the offering status of the following courses.
Courses in other colleges will count as College of Arts and Sciences credit only for Asian Studies majors. Courses below generally count toward the Asian Studies major, as long as the course content is 50 percent or more focused on Asia.

## Asla/General Courses

ECON 473 Economics of Export-Led Development
[ART H 280 Introduction to Art History: Approaches to Asian Art]
ILRIC 637 Labor Relations in Asia
D SOC 205 Rural Sociology and International Development

## China-Area Courses

ANTHR 335 The Situation of China's Minorities

ANTHR 655 East Asia: Readings in Specific Problems
GOVT/CAPS 282 China and the World
[ART H 380 Introduction to the Arts of China]
[ART H 481 The Arts in Modern China]

## Japan-Area Courses

ANTHR 260 Japanese Society through Film
ANTHR 655 East Asia: Readings in Specific Problems

ARCH 339 Elements, Principles, and Theories in Japanese Architecture

## [HIST 230 Japan and the Pacific War]

## South Asia-Area Courses

ANTHR 321/621 Sex and Gender
[ANTHR 339 Peoples and Cultures of the Himalayas]
[ANTHR 406 Culture of Lives]
ANTHR 641 South Asia: Readings in Specific Problems
[ANTHR 673 Human Evolution: History, Concepts, and Theory (also BIOES 673)]

ARCH 342 Architecture as a Cultural System
ARCH 441-442 Special Topics in Architectural Culture and Society
ARCH 445 Architecture and the Mythic Imagination
ARCH 446 Topics in Architecture, Culture, and Society
ARCH 447 Architectural Design and the Utopian Tradition

ARCH 647-648 Architecture in Its Cultural Context I and II

ARCH 649 Graduate Investigations in Architecture, Culture, and Society
CRP 671 Seminar in International Planning
[ECON 475 Economic Problems of India]
HD 436 Language Development (also PSYCH/LING 436)
HD 633 Seminar on Language Development

## Southeast Asla-Area Courses

ANTHR 316 Power, Society, and Culture in Southeast Asia

ANTHR 420 Development of Anthropology Thought
ANTHR 423 Making History on the Margins: The China-SE Asian Borderlands
[ANTHR 424 Anthropology Amongst Disciplines]
[ANTHR 619 Anthropology Approaches to Study of Buddhism(s) in Asia]

ANTHR 628 Political Anthropology: Indonesia
ANTHR 634-635 Southeast Asia: Readings in Special Problems

GOVT 642 Comparative Political Economy: East and Southeast Asia

HIST 244 The United States in Viet Nam
[HIST 395 Southeast Asian History from the 18th Century]
[HIST 695 Early Southeast Asia: Graduate Proseminar]
HIST 696 Modern Southeast Asia: Graduate Proseminar

ART H 396 The Arts of Southeast Asia
ART H 490 Art and Collecting: East and West
ART H 585 Threads of ConsequenceTextiles in South and Southeast Asia

MUSIC 245 Gamelan in Indonesian History and Cultures
MUSIC 445-446 Cornell Gamelan Ensemble
MUSIC 604 Ethnomusicology

## ASIAN AMERICAN STUDIES PROGRAM

The Asian American Studies Program is a university-wide academic program housed administratively within the College of Arts and Sciences. Its aim is to promote teaching, research, and educational activities related to Asians in the Americas and to serve as a resource to the campus and regional communities. The program's undergraduate courses, offered within the program and crosslisted with departments in various colleges, meet distribution requirements and count toward a concentration in Asian American Studies. The program does not offer a graduate course of study, but students can undertake graduate work in Asian American

Studies within selected disciplines of the university.

## Undergraduate Concentration

The program's undergraduate concentration affords students an opportunity to develop a multidisciplinary approach to the study of Asians in the hemispheric Americas. The course of study stresses developments within the United States, but also underscores the transnational and comparative contexts of Asian America and the field's connections with African American, American Indian, Latino, and Women's Studies. Students must work with a faculty advisor from among the program's affiliated faculty and must complete at least 15 units of credits as follows: (1) AAS 110 and two additional courses in Asian American Studies; (2) one course in African American, American Indian, U.S. Latino Studies, or Feminist, Gender, \& Sexuality Studies*; and (3) one course in East Asian, South Asian, or Southeast Asian Studies.* ("These courses must be approved by the student's faculty advisor, and they should address issues of race, gender, or the histories and cultures of Asian peoples.) Students must file an application for the concentration with the Asian American Studies Program.

## Resource Canter

The program's Asian American Studies Resource Center, located in 420 Rockefeller Hall, provides meeting space for the more than 40 undergraduate student organizations of the Cornell Asian Pacific Student Union and the graduate student Asian Pacific American Graduate Association. It also holds a modest print collection of books, periodicals, and newspapers; a current news clipping file; a comprehensive database of publications on Asian Americans since 1977; and a sizable collection of videotapes as well as music CDs on the Asian American experience.

## Research

The program encourages faculty and student research on Asian Americans by sponsoring guest lectures, conferences, film festivals, readings, and exhibits. It also funds research projects and student travel to conferences and research sites. The Asian American Studies Workshop is the program's principal research initiative, engaging Cornell's faculty and students with invited faculty from other universities in a year-long intensive study of selected themes.

## Core Faculty

D. Chang, C. Lai, V. Munasinghe, T. Tu, S. Wong

## Courses

AAS 110(1100) Introduction to Asian American studies (CA-AS)
Spring. 3 credits. Can be used to satisfy either social science or humanities distribution requirement. C. Lai.
The purpose of this course is fourfold: (1) to introduce students to the multifaceted experiences of Asians in the United States; (2) to examine how a diverse group of people came to be identified as "Asian Americans"; (3) to understand the role of difference-gender, class, ethnic-in the formation of "Asian American" identities; and (4) to link historical experiences with contemporary issues.

AAS 213(2130) Introduction to Asian American History (also HIST 264[2640], AM ST 213[2640])
Fall. 4 credits. D. Chang.
For description, see HIST 264.

## AAS 262(2620) Asian American Literature (also AM ST/ENGL 262[2620]) <br> Spring 4 credits. S. Wong.

For description, see ENGL 262.
AAS 303(3030) Asians in the Americas: A Comparative Porspective (also ANTHR 303[3703]) (CA-AS)
Fall. 4 credits. V. Munasinghe.
For description, see ANTHR 303.
【AAS 347(3470) Aslan American Women's History (also HIST 347/FGSS 347/AM ST 351/AM ST 351[3470])
Spring. 4 credits. Next offered 2009-2010.
D. Chang.

For description, see HIST 347.]

## AAS 38013801) Aslan American Urban Experience (also CRP 395 Sec. 09/679

Fall. 3 credits. C. Lai.
The seminar examines the histories and geographies of urban Asian American communities. We begin with an introduction to key geographical terms and spatial theories and then use them to analyze different Asian ethnic communities throughout North America. This includes an investigation of 19th- and early-20th-century segregated ethnic enclaves on the West Coast and the East Coast as well as an examination of postwar Asian American communities in suburbs.

## AAS 390(3901) Asian American Politics

 and Public Policy (also CRP 395.02/879.02)Spring. 3 credits. C. Lai.
This lecture course examines key political and public policy issues affecting Asian American communities, such as immigration law, racial profiling, labor struggles, and electoral politics. We pay particular attention to political mobilization efforts of different Asian ethnic groups and examine how these groups have organized, framed their issues, and mobilized in terms of space, place, and spatial scale.

## [AAS 395(3950) Race, Space, and Place

 (also CRP 395.03/679.03)Spring. 3 credits. Next offered 2008-2009. C. Lai.

This seminar examines critical theories of race and space and investigates key sites where racial formation and spatial production intersect. These multiscalar sites include the neoliberal city, the prison industrial complex, and the Mississippi Delta. We analyze not only the fatal coupling of difference, power, and space, but also the spatial politics of resistance and refusal.]

## [AAS 413(4130) Race, Technology, and Visuality (also AM ST 412[4113], ART M 413[4113]) (CA.AS)

Fall. 4 credits. Next offered 2009-2010.
T. Tu.

Examines how new information and communication technologies have altered the ways we visualize and perform racial identities. Questions the popular assumption that the "information revolution" has made it possible and even desirable to transcend racial differences by exploring the following: how racial hierarchies have informed debates
around techno-literacy, creativity, ownership, and agency.]
[AAS 414(4140) Popular Culture in Asian America (also ART H 414[4114])
Spring. 4 credits. Prerequisite: permission of instructor. Next offered 2008-2009. T. Tu.

For description, see ART H 414.]

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AAS 424(4240) Aslan American Communitles (also HIST/AM ST 420[4220])
Fall. 4 credits. D. Chang.
For description, see HIST 420.
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# AAS 453(4530) 20th-Century American Women Writers of Color (also ENQL 4534[4530]) (LA-AS) <br> Spring. 4 credits.S. Wong. <br> For description, see ENGL 453. 

AAS 479(4790) Ethnicity and Identity Polltics: An Anthropological Perspective (also ANTHR 479[4749])
Spring. 4 credits. V. Munasinghe. For description, see ANTHR 479.

## AAS 495(4950) Independent Study

Fall or spring. 1-4 credits. Topic and credit hours TBA arranged between faculty and student. Independent study forms must be approved by Asian American Studies Program office. Staff.

## AAS 497(4970) JIm Crow and ExclusionEra Amerlca [also AM ST/HIST 497/697[4970/6970])

Spring. 4 credits. Limited to 15 students. D. Chang.

For description, see HIST 497.

## ASTRONOMY

I. M. Wasserman, chair ( 626 Space Sciences Bldg., 255-5867); G. J. Stacey, director of undergraduate studies ( 212 Space Sciences Bldg., 255-5900); R. E. Bean, J. F. Bell, J. A. Burns, D. B. Campbell, D. F. Chernoff, J. M. Cordes, E. E. Flanagan, P. J. Gierasch, R. Giovanelli, M. P. Haynes, T. L. Herter, J. R. Houck, D. Lai, J. P. Lloyd, R. V. E. Lovelace, J.-L. Margot, P. D. Nicholson, S. W. Squyres, Y. Terzian, S. A. Teukolsky, J. F. Veverka, J. York. Emeritus: P. F. Goldsmith, M. O. Harwit, E. E. Salpeter Cornell's Astronomy faculty, research staff, graduate, and undergraduate students are active in diverse areas of modern astronomy ranging from theoretical astrophysics and general relativity to radio and radar astronomy, submillimeter, infrared and optical astronomy, and the exploration of the solar system. Cornell operates two local optical observatories, the world's largest radio telescope at Arecibo, Puerto Rico, and with two other institutions, the 200 -inch optical telescope at Mt. Palomar in California. With Caltech, Cornell is carrying out a design study for a large submillimeter telescope in the high Atacama desert in Chile. Several members of the department faculty are also principal investigators on major NASA space and planetary exploration missions.
The department offers a number of courses to satisfy a general interest in astronomy. These courses have few or no prerequisites and are not intended for the training of professional astronomers. Among the introductory courses, several choices are available, depending on background and on the requirements to be
fulfilled. The 100 -level courses are designed primarily for nonscience majors. The alternative introductory sequence ASTRO 211212 is geared toward sophomore physical science and engineering majors and requires co-registration in beginning calculus. ASTRO 201 and 202 are intended for students with an interest in astronomy but no scientific
background; they are topical rather than survey-oriented. ASTRO 332 is designed for physical science and engineering majors as an introduction to astrophysics. Other courses at the 200 and 300 levels may appeal to students of various backgrounds and interests, as indicated in the individual course descriptions.
Courses numbered above 400 are intended for students who have had two to three years of college physics and at least two years of college mathematics. ASTRO 440 Independent Study permits students to engage in individual research projects under the guidance of a faculty member.
Interested students are encouraged to become members of the undergraduate Cornell Astronomy Club. The club has access to the Fuertes Observatory on campus and conducts regular observing and astrophotography sessions. All students are invited to visit the Space Sciences Building, see the exhibits on display there, and consult faculty members about career plans or choice of courses.

## The Major

The purpose of the major in Astronomy is to provide in-depth knowledge and education labout the nature of the universe. Astronomy relies heavily on preparation in physics and mathematics. Consequently, many courses in these fields are included as prerequisites. In preparation for the major, students normally elect the introductory physics sequence PHYS 112-213-214 or 116-217-218 and the complementary pathway in mathematics, MATH 111-122-221-222 or 191-192-293-294 (or equivalent). Students who anticipate undertaking graduate study are urged to elect the honors physics sequence PHYS 116-217-218-318-327 if possible. The sophomore seminar ASTRO 233 Topics in Astronomy and Astrophysics provides an introduction to current research in astronomy and astrophysics for prospective majors, but is not required of students who elect to major in Astronomy after the sophomore year. Students are also urged to acquire computer literacy. ASTRO 334 is designed to give students hands-on experience with the methods of analysis, visualization, and simulation needed in astrophysical research. Acceptance to the major is first considered after completion of three semesters of introductory physics and mathematics and in general requires a GPA of 3.2 in physics and mathematics courses.

The major requirements stress the importance of building a strong preparation in physical science. The following upper-level courses are normally required:
PHYS 314 or $318,316,323$ or 327,341 and 443 A\&EP 321-322 (or equivalent, e.g., MATH 420 and 422)
ASTRO 410, 431, and 432.
With permission of the major advisor, students interested in planetary studies may substitute appropriate advanced courses or may pursue an independent major under the program in the Science of Earth Systems. Majors are encouraged to supplement the above courses
with any astronomy, physics, or other appropriate courses at or above the 300 level. Advanced seniors can enroll in astronomy graduate courses with the permission of the instructor. Students are also encouraged to work with faculty members on independent study projects under the course ASTRO 440 or to apply to a variety of programs at Cornell, Arecibo, and elsewhere that offer undergraduates summer employment as research assistants. Nearly all undergraduate majors and concentrators become involved in research projects in the junior and senior years.
Students whose interest in astronomy is sparked somewhat late in their undergraduate career are encouraged to discuss possible paths with the director of undergraduate studies in Astronomy.
Honors. A student may be granted honors in Astronomy upon the recommendation of the Astronomy Advisors Committee of the Astronomy faculty. Typical requirements for graduating with honors are a minimum GPA of 3.5 over the past four semesters and grades of A- or better in ASTRO 410, 431, and 432.
Double majors. A double major in Astronomy and another subject is possible in many circumstances. However, the set of courses used to fulfill the requirements for each major must be completely independent.
Concentration. The concentration in Astronomy for other majors normally requires 12 credits, at least eight of which must be at the 300 level or above. ASTRO 233 is recommended for sophomores planning to concentrate in Astronomy.

## Distribution Requirement

All courses in astronomy, except ASTRO 109, may be used to fulfill the science distribution requirement in the College of Arts and Sciences.

## Courses

ASTRO 101(1101) The Nature of the Universe (PBS)
Fall. 3 credits. Limited to 30 students per disc sec. Students may not receive credit for both ASTRO 101 and 103. J. Lloyd. Introduces students to the cosmos. The birth, evolution, and death of stars, the formation of the chemical elements, and the nature of white dwarfs, neutron stars, and black holes are discussed. An introduction to the theories of special relativity and general relativity is given. The course covers the search for other worlds outside the solar system and the possible existence of life and intelligence elsewhere in the universe. Modern theories of cosmology are presented, and the origin, structure, and fate of the universe are discussed. Most of the course notes as well as sample exams and simulations are made available on the web.

## ASTRO 102(1102) Our Solar System (PBS)

Spring. 3 credits. Limited to 30 students per disc sec. Students may not receive credit
for both ASTRO 102 and 104. S. Squyres and J.-L. Margot.
The past few decades have seen incredible advances in the exploration of our solar system. In this course students learn about the current state and past evolution of the Sun and its family of planets, moons, asteroids, and comets. The course emphasizes images and other data obtained from current and past

NASA space missions and how these data provide insights about the important processes that have shaped the evolution of solar system objects. General astronomical concepts relevant to the study of the solar system are also discussed. Critical focus is on developing an understanding of the Earth as a planetary body and discovering how studies of other planets and satellites influence models of the climatic, geologic, and biologic history of our home world. Other topics include impact hazards, the search for life in the solar system, and future missions.

## ASTRO 103(1103) The Nature of the Universe (PBS)

Fall. 4 credits. Limited to 22 students per lab, 30 students per disc sec. J. Lloyd. Identical to ASTRO 101 except for addition of the laboratory. Students may not receive credit for both ASTRO 101 and 103.

## ASTRO 104(1104) Our Solar System (PBS)

Spring. 4 credits. Limited to 22 students per lab, 30 students per disc sec. J.-L. Margot and S. Squyres.
Identical to ASTRO 102 except for addition of the laboratory. Students may not receive credit for both ASTRO 102 and 104.

## ASTRO 105(1105) An Introduction to the Universe (PBS)

Summer. 3 credits. Recommended: high school physics. D. Kornreich.
How do we measure the size of our galaxy and the size of the universe? Is the universe round or flat? How are the stars born, why do they shine, and how do they die? What are the chemical elements, and how were they formed in stars? What are quasars, pulsars, and black holes? How was the solar system formed? What are the environments of other planets like? What is the basic structure of Earth and the other planets? Will we catastrophically alter the earth? Does life exist elsewhere in the universe? How can we find out? Each student has an opportunity to make observations with small telescopes

## ASTRO 106(1106) Essential Ideas in

 Relativity and Cosmology (PBS)Summer. 3 credits. Prerequisites: high school algebra and trigonometry.
D. Kornreich.

Explanation of Einstein's theories of special and general relativity, which brought about a fundamental change in our conceptual understanding of space and time. Correspondence to, and conflicts with, common sense. Applications to various areas in special relativity (space travel, the equivalence of mass and energy, nuclear fission and fusion, and thermonuclear processes in the sun) and in general relativity (motion of light and particles in curved spacetime, cosmological models, and the question of wherher the universe is open or closed).

## ASTRO 107(1107) An Introduction to the

 Universe (PBS)Summer. 4 credits. D. Kornreich. Identical to ASTRO 105 except for the addition of the afternoon laboratory that emphasizes mathematical problem-solving. This option is recommended for potential majors in science and engineering.

## ASTRO 109(1109) FWS: Birth of the

 UniverseSpring. 3 credits. S. Stierwalt. Our knowledge of the universe has been revolutionized by discoveries in the past
century and is very much a work in progress. The history of the origin, evolution, and ultimate fate of the entire universe (collectively known as cosmology) is full of instances where a widely accepted belief was shown to be most likely false. Our current cosmological theories are also riddled with many issues that are not yet fully understood. We will read popular texts by such authors as Carl Sagan and Alan Lightman to learn what we know about some recent burning cosmological questions: What happened after the Big Bang? What exactly are dark matter and dark energy? What does the future hold for our universe? Students will have an opportunity to participate in some of the many currently heated debates in cosmology through writing and in-class discussions.

## ASTRO 195(1195) Observational

 Astronomy (PBS)Fall. 3 credits. Limited to 24 students. G. Stacey.

Provides a "hands-on" introduction to observational astronomy intended for liberal arts students at the freshman and sophomore level. High school mathematics is assumed, but otherwise there are no formal prerequisites. The course objective is to teach how we know what we know about the universe. The course is set up with two lectures and one evening laboratory per week. Not all of the evening sessions are used. Planned exercises include five or six observational labs (star gazing with binoculars and small telescopes, telescopic observations and CCD imaging of star clusters, nebulae, and the planets, solar observations, radio observations of the Milky Way Galaxy), plus a selection of exercises from the following: experiments in navigating by the stars; construction and use of simple instruments such as optical spectroscopes and sun dials; laboratory spectroscopy; experiments in planetary cratering; collection and study of micrometeorites; analyses of planetary and lunar images obtained by the class, measuring the diameter of Earth or the size of the solar system..

## ASTRO 201(2201) Our Home in the

 Unlverse (PBS)Fall. 3 credits. Prerequisite: freshman or sophomore standing. No scientific background assumed. R. Giovanelli and M. Haynes.

General discussion of our relation to the physical universe and how our view of the universe has changed from ancient to modern times. Several main themes are covered over the course of the semester: the evolution of our view of the sky from that of ancient cultures to that of space telescopes; the death of stars and the formation of black holes; dark matter and the structure of galaxies; and the origin, evolution, and fate of the universe. Presents a nonmathematical introduction to these subjects and discuss uncertainties and unresolved issues in our understanding.

## ASTRO 202(2202) Our Home in the Solar

 System (PBS)Spring. 3 credits. Prerequisite: freshman or sophomore standing; some background in science. J. Bell and D. Campbell.
Writing course designed to develop an understanding of our home planet as a member of a diverse family of objects in our solar system. Discussion centers on how studies of other planets and satellites have broadened our knowledge and perspective of

Earth, and vice versa. We study, debate, and learn to write critically about important issues in science and public policy that benefit from this perspective. Topics discussed include global warming, the impact threat, the searches for extrasolar planets and extraterrestrial intelligence, and the exploration of Mars.

## ASTRO 211(2211) Astronomy: Stars,

 Galaxies, and Cosmology (PBS) Fall. 4 credits. Intended for first-and second-year engineering and physical sciences students. Prerequisite: introductory calculus or co-registration in MATH 111 or 191 or permission of instructor. R. Bean.This course offers an introduction to astrophysics aimed at prospective science and engineering majors. It covers a broad array of topics in astrophysics including the formation, structure, evolution and observational properties of normal and extreme stars, galaxies and cosmology, and the underlying physical processes governing them. The textbook is by Kutner. This course is a slightly more mathematical and physics-oriented alternative to ASTRO 101/103.
ASTRO $212(2212)$ The Solar System: Planets, Satellites, and Rings (PBS) Spring. 4 credits. Intended for first-and second-year engineering and physical sciences students. Prerequisite: introductory calculus or co-registration in MATH 111 or 191; some knowledge of classical physics (mechanics and thermodynamics). D. Campbell and P. Gierasch.

Introduction to the solar system with emphasis on the quantitative application of simple physical principles to the understanding of what we observe or can deduce. Topics include the Sun and the interior processes that control its luminosity, the interiors, surfaces, and atmospheres of the planets including the effects of greenhouse gases, satellites, and small bodies, orbits of solar system bodies and the search for extra-solar planets. Results from past and current spacecraft missions will be discussed including the Cassini mission to the Saturn system and the Mars Exploration Rovers.

## ASTRO 233(2233) Topics in Astronomy

 and AstrophysicsFall. 3 credits. Intended for sophomores planning to major in Astronomy or related fields. Prerequisites: co-registration in PHYS 112 or 116 , MATH 112, 122 or 192. Home page: www.astro.cornell.edu/ academics/courses/astro233. M. Haynes and R. Giovanelli.
The course theme may change yearly. The fall 2007 course will explore the theme "The History of Structure in the Universe." Topics will include the history of the early universe, the cosmic microwave background, evidence for dark energy and dark matter, the relationship between supermassive black holes, active galactic nuclei and their host galaxies, the formation of the first stars and galaxies and the evolution of galaxies, clusters and superclusters through cosmic time. Organized as a seminar, with readings and discussions.

## ASTRO 280(2280) Space Exploration

 (PB5)Fall. 3 credits. No special background in physical sciences, math, or engineering assumed. S. Squyres.
Provides an overview of space science, with particular emphasis on the solar system, and a
detailed examination of a few selected objects, including the planet Mars, the satellites in the outer solar system, and comets. The focus is on methods of collecting information and especially on spacecraft and space missions. Topics include the design and limitations of instruments. Ethical and political questions associated with space exploration are discussed. Intended for students with an interest in science, technology, and associated policy issues.

## [ASTRO 290(2290) Relativity and

 Astrophysics (PBS)Spring. 4 credits. Prerequisites: freshman physics, calculus, and geometry. Next offered 2008-2009. I. Wasserman.
Provides a geometrically based introduction to special and general relativity, followed by consideration of astrophysical applications. Includes discussion of tests of Einstein's theory of space, time, and gravitation; the physics of white dwarfs, neutron stars, and black holes; an introduction to modern cosmology.]

## ASTRO 299(2299) Search for Life in the Universe (PBS)

Spring. 4 credits. Prerequisites: two courses in any physical science subject or permission of instructors. J. Cordes and Y. Terzian.

Surveys the contents of the universe. Reviews theories of cosmic and stellar evolution, and of the formation and evolution of planetary systems, planetary atmospheres, and surfaces. Questions regarding the evolution of life and the development of technology are discussed. Methods to detect extraterrestrial life with emphasis on radio telescopes and associated instrumentation are presented. Hypothetical communication systems are developed and discussed.

## ASTRO $310(3310)$ Planetary Imaging

 Processing (PBS)Fall. 3 credits. Intended for sophomores or juniors majoring or concentrating in Astronomy or related fields. Prerequisites: two semesters of introductory physics and some experience with computer programming; permission of instructor required (form available in S\$610). J. Bell. Reviews basic techniques employed in the collection and processing of spacecraft images of solar system objects. See www.astro.cornell. edu/courses/astro310/main.html for course details.

## ASTRO 331(3331) Climate Dynamics

 (also EAS 305[3050]) (PBS)Fall. 4 credits. Prerequisite: MATH 112 or 192 or equivalent or permission of instructor.
For description and course information, see EAS 305.

## ASTRO 332(3332) Elements of Astrophysics (PBS)

Spring. 4 credits. Prerequisites: MATH 112, 122, 192, or equivalent; PHYS 213 or 217. J. Houck.

Introduction to astronomy, with emphasis on the application of physics to the study of the universe. Covers: physical laws of radiation; distance, size, mass, and age of stars, galaxies, and the universe; stellar evolution and nucleosynthesis; supernovae and black holes; galaxies and quasars. Introduction to cosmology. Mainly intended for students of science, engineering, and science education interested in astronomy and astrophysics.
[ASTRO 334(3334) Modern Astrophysical Techniques (PBS)
Spring. 3 credits. Intended for sophomores majoring or concentrating in Astronomy or related fields. Prerequisites: two semesters of introductory physics and two semesters of calculus. Recommended: ASTRO 233. Next offered 2008-2009. J. Lloyd. The course reviews the basic techniques employed in astrophysical research, both observational and theoretical, to explore the universe. Basic methods and strategies of data acquisition and image and signal processing are discussed. Students gain hands-on experience with visualization techniques and methods of error analysis, data fitting, and numerical simulation. Exercises address the processes by which astrophysicists piece together observations made with today's foremost astronomical instruments to solve questions concerning the origin of planets, stars, galaxies, and the universe itself.]

## ASTRO 410(4410) Experimental

 Astronomy (PBS)Fall. 4 credits. Prerequisites: PHYS 214/218 (or 310 or 360 ), PHYS $323 / 327$ (or coregistration) and permission of instructor required (form available in SS610). J. Cordes and J. Houck.

Observational astrophysics. Major experiments involve techniques in CCD (charge-coupleddevice) imaging, optical photometry, optical spectroscopy, radiometry, radio spectroscopy and radio astronomy. The experiments involve use of the Hartung-Boothroyd Observatory's 24 -inch telescope, a laboratory two-element radio interferometer, and a radio telescope mounted on top of the Space Sciences Building. The laboratory covers the fundamentals of using astronomical instrumentation and data analysis as applied to celestial phenomena: asteroids, normal stars, supernova remnants, globular clusters, planetary nebulae, the interstellar medium, OH masers, and galaxies.

## ASTRO 431(4431) Introduction ta Astrophysics and Space Sciences (PBS)

Fall. 4 credits. Prerequisites: mathematics above 200 level and physics above 300 level. Recommended: PHYS 443. D. Lai and P. Nicholson.
Overview of modern astrophysical concepts for physical science majors. Major topics include stellar formation, structure, and evolution; stellar atmospheres; compact objects (white dwarf, neutron star, and black holes); planets; and brown dwarfs. Current research problems in these areas are introduced along the way. The emphasis is on using fundamental principles of physics to explain astronomical phenomena. A variety of physics, including elements of atomic and molecular physics, solid state physics and fluid mechanics, are introduced or reviewed in a quick, practical fashion to be put to use in solving astrophysics puzzles.

## ASTRO 432(4432) Introduction to

 Astrophysics and Space Sciences II (PBS)Spring. 4 credits. Prerequisite: ASTRO 431 or permission of instructor. D. Chernoff. Covers two broad topics: the astrophysics of the interstellar medium and cosmology. The interstellar medium section covers thermal equilibrium and radiative transport in HII regions, atomic gas regions, and molecular clouds. The cosmology section includes expansion of the universe, metrics, Friedmann
equations, dark matter, cosmological tests, the early universe, and the cosmological production of the elements.

## ASTRO 440(4940) Independent Study in

 AstronomyFall or spring. 2-4 credits. Prerequisite: permission of instructor; to register: obtain an independent study form in department office, 610 Space Sciences Bldg.
Recommended: familiarity with topics covered in ASTRO 332, 431, or 434. Individuals work on selected topics. A program of study is devised by the student and instructor.

## ASTRO 445(4445) Introduction to General Relativity (also PHYS 445[4445]) (PBS)

Fall. 4 credits. E. Flanagan.
For description, see PHYS 445.

## ASTRO 490(4490) Senior Seminar Critical Thinking (PBS)

Fall. 3 credits. Prerequisites: none. Open to all students. Y. Terzian.
Critical thinking in scientific and nonscientific contexts with selections from the history of astronomy. Topics include elements of classical logic, including standards of evidence. Case studies include examples of competing hypotheses in the history of science, as well as examples from borderline sciences. Stress is put on creative generation of alternative hypotheses and their winnowing by critical scrutiny. Topics include the nature and history of the universe, the nature of time, the nature of reality, the possibilities of life on other planets, and artificial intelligence. Fallacies, illusions, and paradoxes will also be discussed. The course includes debates by the students on controversial topics such as: Can machines think? Is science and technology to be blamed for Hiroshima and $9 / 11$ ? Should the genome be improved? Is the future determined?

## [ASTRO 509(6509) General Relativity (also PHYS 553[6553])

Fall. 4 credits. Prerequisite: knowledge of special relativity and methods of dynamics at level of Classical Mechanics by
Goldstein. Next offered 2008-2009. J. York. Systematic introduction to Einstein's theory using both modern and classical methods of computation. Topics include review of special relativity, differential geometry, foundations of general relativity (GR), laws of physics in the presence of gravitational fields, GR as a dynamical theory, experimental tests of GR. The level of the course will be comparable to that in the text Gravitation by Misner, Thorne, and Wheeler. This text is required: it will be used for reading, reference, and problem assignments. Robert Wald's book General Relativity is also suggested but not required.]

## [ASTRO 510(6510) Applications to General Relativity (also PHYS 554[6554])

Spring. 4 credits. Prerequisite: ASTRO 509.
Next offered 2008-2009. J. York.
Continuation of ASTRO 509 that emphasizes applications to astrophysics and cosmology. Topics include relativistic stars, gravitational collapse and black holes, gravitational waves and cosmology, use of dynamics to formulate astrophysical and cosmological computations in the flourishing field of numerical relativity.]
[ASTRO $511(6511)$ Physics of Black Holes, White Dwarfs, and Neutron Stars (also PHYS 525[6525])
Spring. 4 credits. Prerequisites: all of physics at upper-division undergraduate level. Next offered 2008-2009. D. Lai. Compact objects (neutron stars, black holes, and white dwarfs) are the endpoints of stellar evolution. They are responsible for some of the most exotic phenomena in the universe, including supernova explosion, radio pulsars, bright X-ray binaries, magnetars, and gammaray bursts. Supermassive black holes also lie at the heart of the violent processes in active galactic nuclei and quasars. The study of compact objects allows one to probe physics under extreme conditions (high densities, strong magnetic fields, and gravity). This course surveys the astrophysics of compact stars and related subjects. Emphasis is on the application of diverse theoretical physics tools to various observations of compact stars. There are no astronomy or general relativity prerequisites. At the level of Pbysics of Black Holes, White Dwarfs, and Neutron Stars by Shapiro and Teukolsky.J
ASTRO 516(6516) Galactic Structure and Stellar Dynamics
Fall. 4 credits. D. Chernoff.
Introduction to the study of the structure of galaxies via the laws of modern physics. Topics include the observed kinematics and spatial distribution of stars in the vicinity of the Sun, shapes and properties of stellar orbits, the gravitational N -body problem, collisional relaxation in stellar systems, spiral structure, galaxy classification and evolution, and cosmological results in galaxy formation.

## ASTRO 520(6520) Radio Astronomy

Fall. 4 credits. J. Cordes and D. Campbell. Covers radio astronomy telescopes and electronics; antenna theory; observing procedures and data analysis; concepts of interferometry and aperture synthesis.

## [ASTRO 523(6523) Signal Modeling, Statistical Inference, and Data Mining in Astronomy

Fall. 4 credits. Next offered 2008-2009.
J. Cordes.

Aims to provide tools for modeling and detection of various kinds of signals encountered in the physical sciences and engineering. Data mining and statistical inference from large and diverse databases are also covered. Experimental design is to be discussed. Basic topics include probability theory; Fourier analysis of continuous and discrete signals; digital filtering; matched filtering and pattern recognition; spectral analysis; Karhunen-Loeve analysis; wavelets; parameter estimation; optimization techniques; Bayesian statistical inference; deterministic, chaotic, and stochastic processes; image formation and analysis; maximum entropy techniques. Specific applications are chosen from current areas of interest in astronomy, where large-scale surveys throughout the electromagnetic spectrum and using nonelectromagnetic signals (e.g., neutrinos and gravitational waves) are ongoing and anticipated. Applications are also chosen from topics in geophysics, plasma physics, electronics, artificial intelligence, expert systems, and genetic programming. The course is self-contained and is intended for students with thorough backgrounds in the physical sciences or engineering.]

## [ASTRO 525(6525] Techniques of Optical/ Infrared and Submillimeter Astronomy

Spring. 4 credits. Next offered 2008-2009.
T. Herter and G. Stacey.

Optical/infrared and submillimeter telescopes and instrumentation are discussed and related to current research in these fields. Includes telescope design and general optical design (ray tracing). CCD, photoconductor, photovoltaic, bolometer, impurity band conduction, and heterodyne detection systems are presented. The instrumentation discussion includes general instrument design and specific applications to cameras, spectrographs, and interferometers. Detection limits of various systems, cryogenic techniques, and astronomical data analysis techniques are also discussed. Special topics include speckle interferometry and adaptive optics.]

## ASTRO 530(6530) Astrophysical

 ProcessesSpring. 4 credits. D. Lai.
Fundamentals of radiative transfer, bremsstrahlung, synchrotron radiation, Compton scattering, spectral line transfer, gas heating and cooling and topics in atomic and molecular spectroscopy topics are discussed within the framework of astrophysical sources and problems.

## [ASTRO 560(6560) Theory of Stellar Structure and Evolution (also PHYS 667[7667])

Fall. 4 credits. Next offered 2008-2009 D. Chernoff.

Intended to provide a systematic development of stellar astrophysics, both theory and observations. Topics include hydrostatic equilibrium; equation of state; radiation transfer and atmospheres; convection and stellar turbulence; nuclear burning and nucleosynthesis; solar neutrinos; star formation; pre-main sequence stars; brown dwarfs; end states of stellar evolution (white dwarfs, neutron stars, and black holes); supernovae; interacting binary stars; stellar rotation and magnetic fields; stellar pulsations; winds and outflows. The prerequisites for the course are all undergraduate-level physics. Though helpful, no astronomy background is required.]

## ASTRO 570|6570) Physics of the Planets

Fall. 4 credits. P. Nicholson.
Introductory survey of planetary science with an emphasis on the application of physical principles. Planetary dynamics, including satellite orbits, tidal interactions, resonances, and ring dynamics. An introduction to the theory of planetary interiors, gravitational fields, heat sources, and rotational mechanics. An introductory survey of planetary science with an emphasis on the application of physical principles. Planetary dynamics, including satellite orbits, tidal interactions, resonances, and ring dynamics. An introduction to the theory of planetary interiors, gravitational fields, heat sources, and rotational mechanics. Intended for graduate students and seniors in astronomy, physics, and engineering. Intended for graduate students and seniors in astronomy, physics, and engineering.

## [ASTRO 571(6571) Mechanics of the

 Solar System (also T\&AM 673[6730]) Spring. 3 credits. Next offered 2008-2009. J. Burns.For description, see T\&AM 673.]

## [ASTRO 575(6575) Planetary

 Atmospheres (also EAS 575[5750])Fall. 4 credits. Next offered 2008-2009. P. Gierasch.

Introduction to radiative transfer in emitting and scattering atmospheres. Radiative energy balance and radiative equilibrium. Structures of the atmospheres in the solar system. Introduction to motions in atmospheres. Planetary examples of balanced flows. Mesoscale waves, wave absorption and wave accelerations. Planetary waves. The influence of wave accelerations on thermal structure and composition. Introduction to atmospheric chemistry. Dynamical transports. Observations. At the level of Andrews, Atmospheric Physics.]
[ASTRO 577(6577) Planetary Surface Processes (also EAS 577[5770]) Spring; 3 or 4 credits ( 3 credits for course only; 4 credits if registered for the lab trip-see course description below). Next offered 2008-2009. J. Bell.
Survey of processes involved in the formation and evolution of the surfaces of solar system bodies. Surface morphology and landforms of terrestrial planets, planetary satellites, asteroids, and comets. Fundamentals of impact cratering, volcanism, tectonism, and erosion as applied to planetary surfaces, with significant emphasis on terrestrial field examples as analogs and study sites. Basic introduction to physical, geochemical, and "space" weathering of planetary surfaces. Basic introduction to field methods and remote sensing techniques and data sets (terrestrial, spacecraft). Students enrolled in the course can participate in an optional field trip over Spring Break to a "classic" planetary surface process analog field site (e.g., Meteor Crater, Amboy, Hawaii, Grand Canyon, Death Valley) for 1 addlitional credit. Grading based on participation in discussions, critical literature reviews, and final project/presentation.]

## [ASTRO 578(6578) Planet Formation and

 Energy (also EAS 578[5780])Fall. 4 credits. Next offered 2008-2009.
J-L. Margot and M. Pritchard.
Survey of chemical and physical processes important to the origin and evolution of planetary systems. The first part of the course will cover the formation of planets including the astronomical context, nucleosynthesis, meteoritics, condensation sequence, accretion, dynamical evolution, and observational constraints (disks, exoplanets, major planets, satellites, and small bodies). The second part of the course will cover planetary internal structure and evolution including melting, differentiation, core formation, convection, thermal evolution, and magnetic fields.]

## [ASTRO 579(6579) Celestial Mechanics (also T\&AM 672[6720])

Spring. 3 credits. Next offered 2008-2009. J. Burns.

## For description, see T\&AM 672.]

## [ASTRO 590(6590) Galaxies and the Universe

Fall. 4 credits. Next offered 2008-2009.
R. Giovanelli and M. Haynes.

The universe, its constituents, its large-scale structure, and its history in the light of the major thrusts of extragalactic research. The morphology, photometry, dynamics, and kinematics of galaxies and their subsystems. Determination of masses, mass-to-light ratios, and the "missing mass." Activity in Seyferts, radio galaxies, and quasars. Binaries, groups, clusters, and superclusters. The extragalactic distance scale. Galaxy formation and
evolution. Confrontation of cosmological theories with observational results.]

## ASTRO 599(6599) Cosmology (also PHYS 599[6599])

Spring. 4 credits. Prerequisites: statistical physics, quantum mechanics, and
electromagnetic theory courses. R. Bean. Intended to provide a detailed theoretical development of current ideas in cosmology. Topics include Big Bang cosmology and universe's matter content; a cosmological chronology very early universe, symmetry breaking, inflationary scenarios,
nucleosynthesis, recombination, growth of irregularities, galaxy formation and clustering, dark energy; current and future cosmological observational approaches.

## [ASTRO 620(7620) Seminar: Advanced

 Radio AstronomySpring. 2 credits. Prerequisites: for advanced undergraduates, by permission of instructor. Recommended: some
background in astronomical spectroscopy.
Next offered 2008-2009. R. Giovanelli,
M. Haynes, and J. Houck.
"Dwarf Galaxies: The View from 1 Meter to 1 Micron." CDM theory describes the growth of structure through the merger of small halos formed in large numbers early-on, and while these small halos serve as the building blocks of galaxies and clusters, many low mass objects are nonetheless expected to survive to the present epoch. In this seminar, we will explore our current understanding of dwarf galaxies, their impact on hierarchical structure development and the clues about galaxy formation and evolution they carry with them especially as viewed using today's long wavelength forefront instruments Spitzer, ALFA and the VLA and, in the future, ALMA and CCAT.]

## [ASTRO 621(7621) Seminar: Planetary

 Radar AstronomySpring. 3 credits. Prerequisites: upper-level undergraduates and graduate students in Astronomy, engineering, and geology; good background in undergraduate mathematics and physics. Next offered 2008-2009. D. Campbell and J.-L Margot. Discussion of radar techniques and the results from the application of these techniques to the study of solar system bodies including the Earth.]

## ASTRO 640(6940) Advanced Study and Research

Fall or spring. Credit TBA
Guided reading and seminars on topics not currently covered in regular courses.
[ASTRO 652(7652) Advanced Atmospheric Dynamics (also EAS 652[6520])
Spring. 3 credits. Next offered 2008-2009. S. Colucci and P. Gierasch.]

## ASTRO 660(7660) Cosmic Electrodynamics (also A\&EP 608[6080])

Spring. 2 credits. R. Lovelace.
Selected topics discussed in detail: the solar wind, stellar winds, Bondi accretion, BondiHoyle accretion, accretion disks with B fields, magneto-rotational instability, magnetocentrifugal winds and jets from disks, Poynting jets, funnel flows, the propeller stage of accretion, advection and convection dominated accretion flows, fast dynamo processes in astrophysics.

## ASTRO 671(7671) Seminar: Classic

 Papers in Planetary ScienceFall. 3 credits. L. Margot.
This reading seminar is designed to review seminal papers in planetary science. Required readings will be selected for their pedagogical aspects and will be discussed in-depth in class. Faculty, staff, and students will make presentations from the readings.

## ASTRO 671(7671) Seminar: Planetary

 Science-Composition and Mineralogy of the Martian Surface (also EAS 693[6930])Spring. 3 credits. J. Bell.
This course will review our current
knowledge of the composition, mineralogy, and physical properties of the surface of Mars, using the latest available data and analyses from space missions like the Mars Exploration Rovers and the Global Surveyor, Odyssey, Mars Express, and Reconnaissance orbiters. Lectures will follow the chapters of the 2007 Cambridge University Press book on this same topic (edited by J. Bell), and will be augmented by student in-class literature reviews. Grades will be based on in-class reviews, discussions, and a final term paper/ presentation.

## ASTRO 671(7671) Seminar: Planetary

 Science-Stars, Rocks, and BetweenSpring. 3 credits. J. Lloyd.
This seminar will discuss the theoretical and observational aspects of the formation, structure and evolution of low mass objects in the Universe: red dwarf stars, brown dwarfs, jovian and terrestrial exoplanets. The seminar will focus particularly on aspects of low mass stars and substellar objects of recent progress and of relevance to ongoing extrasolar planet research programs.

## ASTRO 671(7671) Seminar: Planetary

 Science-Micron to Millimeter
## Astronomy

Spring. 3 credits. J. Houck, J. Lloyd, and G. Stacey.

Covers topics of current interest in infrared and submillimeter astrophysics, including extrasolar planets; star formation in the galaxy; nearby dwarf, starburst, and ultraluminous galaxies; and distant "proto"-galaxies. Recent results obtained with Spitzer Space Telescope and ground-based facilities are covered. The seminar includes lectures from faculty and staff and also student presentations from the readings during the course.]

## ASTRO 673(7673) Seminar: Planetary

 AtmospheresSpring. 2 credits. P. Gierasch Deals with motions in planetary atmospheres Among the topics to be discussed are the Venus general circulation, the Mars general circulation, and dust and water transports on Mars. The focus this year will be on the nature of the planetary boundary layers on Venus and Mars. Comparison with the Earth will be examined. The role of the boundary layer in soil transport will be discussed.

## ASTRO 690(7690) Seminar:

 Computational Physics (also PHYS 480/680[4480/7680])Spring. 3 credits. Prerequisite: working knowledge of FORTRAN. Staff For description, see PHYS 480/680.

## [ASTRO 699(7699) Seminar: Problems in Theoretical Astrophysics (also PHYS 665[7665]I

Fall. 2 credits. Next offered 2008-2009. D. Lai.

Topics in condensed matter, atomic, nuclear and particle astrophysics will be treated, with examples from domains ranging from planets to white dwarfs and neutron stars.]

## BIOLOGICAL SCIENCES

The biological sciences ("biology") major is distinguished from other life sciences majors by its focus on basic, as opposed to applied, aspects of biology. All biology majors take courses in genetics, evolutionary biology, and biochemistry-subjects fundamental to understanding questions spanning the full spectrum of biology in the age of genomics.

In addition to taking these core courses, each student completes a Program of Study ("concentration") that affords the opportunity for acquiring a more detailed knowledge of particular subject areas: Animal Physiology, Biochemistry, Computational Biology, Ecology and Evolutionary Biology, Genetics and Development, Insect Biology, Molecular and Cell Biology, Microbiology, Neurobiology and Behavior, Nutrition, Plant Biology, and Systematics and Biotic Diversity. Alternatively, students may choose to explore three or more of these areas in the General Biology Program of Study.
The continuing rapid advances in biology are built on an ever-greater integration with the physical sciences and mathematics. Thus, the biology major is designed to provide students with a strong foundation not only in core areas of modern biology, but also in chemistry, organic chemistry, physics, and mathematics.
Students work with faculty, staff, and student advisors in selecting their Program of Study and in choosing the course options that each offers. The Office of Undergraduate Biology (OUB) in 216 Stimson Hall oversees advising for biology majors, and also coordinates the extensive undergraduate biology research program, including the biology research honors program.

The biology major is very popular among students of both the College of Agriculture and Life Sciences and the College of Arts and Sciences. It provides excellent preparation not only for various advanced degrees in science, but also for health careers, because so many of its requirements are also requirements for medical, dental, or veterinary programs. For more details about the biology major and minor see the section in this catalog on biological sciences or visit owww.biology. comell.edu.

## Courses with Overlapping Content

Because the department offers many courses with overlapping content, students must choose their courses carefully to ensure that they will receive credit for each course they take. Listed below are courses that have similar content. Students will receive credit for only one of the courses in each group.
BIO G 101 \& 103, 105, 107, 110
BIO G $102 \& 104,106,108,109$
BIOBM 330, $331 \& 332,333$, NS 320

BIOSM 364, 375
BIOSM 376, BIOEE 373

## BIOLOGY \& SOCIETY MAJOR

$B$. Chabot, director of undergraduate studies, College of Arts and Sciences; N. Breen, advising coordinator, College of Human Ecology; B. Chabot, advising coordinator, College of Agriculture and Life Sciences; E. Adkins-Regan, D. Bates, B. Bedford, W. Bemis, K. Berggren, R. Boyd, N. Breen, I. T. Brenna, D. Brown, R. Calvo, R. Canfield, S. Ceci, B. Chabot, C. C. Chu, W. Crepet, J. Davis, B. Dear, R. Depue, G. W. Feigenson, J. Fortune, C. Geisler, W. Ghiorse, C. Goodale,
C. Greene, D. Gurak, J. Haas, A. Hajek,
L. Harrington, A. Hedge, S. Hilgartner,
T. J. Hinrichs, H. C. Howland, G. Hudler, B. Johnson, B. Knuth, A. Lemley,
C. Leuenberger, D. Levitsky, B. Lewenstein, B. Lust, M. Lynch, S. McCouch, I. Merwin, A. Netravali, S. K. Obendorf, P. Parra, A. Parrot, D. Pelletier, M. Pfeffer, T. Pinch, A. G. Power, R. Prentice, W. Provine, J. V. Reppy, S. Robertson, E. Rodriguez, M. Rossiter, S.Seth, J. Shanahan, R. Stoltzfus, J. Tantillo, V. Utermohlen, K. Vogel, R. Wayne, E. Wethington, T. Whitlow, S. Wolf. Emeritus: U. Bronfenbrenner, C. Eberhard,
K. A. R. Kennedy, J. Fessenden MacDonald, J. Mueller, D. Pimentel, J. M. Stycos

The Biology \& Society major is suited for students who wish to combine training in biology with perspectives from the social sciences and humanities on the social, political, and ethical aspects of modern biology. In addition to providing a foundation in biology, Biology \& Society students gain a background in the social dimensions of modern biology and in the biological dimensions of contemporary social issues.
The Biology \& Sociery major, which involves faculty from throughout the university, is offered by the Department of Science and Technology Studies. Students in the College of Arts and Sciences, the College of Human Ecology, and the College of Agriculture and Life Sciences are eligible for the major. The major is coordinated for students in all colleges through the Biology \& Society Office. Students can get information, specific course requirements, and application procedures for the major from the Biology \& Society office in 306 Rockefeller Hall, 255-6047

Because the major is multidisciplinary, students must attain a basic understanding of the several disciplines it comprises. The curriculum includes courses in ethics; statistics; history, philosophy, and social studies of science and biology; and basic biology (e.g., genetics and development; biochemistry and molecular-cell biology; ecology; evolutionary biology), as well as integrative courses offered through Biology \& Society. Majors are required to take a core course and must develop a theme, an intellectually coherent grouping of courses representative of their special interest in Biology \& Society. Recommended themes in the Biology \& Society major include biology, behavior, and society; biology and human population; biology and public policy; environment and society; and health and sociery. Students may also develop their own individually tailored themes (which in recent years have included topics such as
biotechnology and society and agriculture, environment, and society). In consultation with their faculty advisor, students select courses that meet the foundation and core course requirements so as to build a coherent theme. Sample curricula for the recommended themes and for several student-developed themes are available in the Biology \& Society office.

Faculty members are available (according to posted office hours or by appointment) in the Biology \& Society offices, 306 Rockefeller Hall, to answer questions and to provide assistance.

## Admission to the Major

All students should have completed a year of college-level biology before submitting an application during their sophomore year. Juniors are considered on a case-by-case basis Upper-division applicants should realize the difficulties of completing the major requirements in fewer than two years. Freshmen admitted to the Colleges of Agriculture and Life Sciences and Human Ecology as Biology \& Society majors are considered to have been admitted to the major on a provisional basis, contingent on successful completion of the course sequence in introductory biology and submission of the application to the university major. The application includes (1) a one-page statement explaining the student's intellectual interests in the Biology \& Society major and why the major is consistent with the student's academic goals and interests; (2) the theme the student wishes to pursue in the major; (3) a tentative plan of courses fulfilling Biology \& Society requirements, including courses already taken and those the student plans to take; and (4) a transcript of work completed at Cornell University (and elsewhere, if applicable), current as of the date of application.
Acceptance into the major requires completion of the course sequence in introductory biology. Sophomores in the process of completing this prerequisite may be admitted to the major on a provisional basis. It is the student's responsibility to assure that final acceptance is granted upon satisfactory completion of the introductory biology sequence. Although only introductory biological science is a prerequisite for acceptance, students find it useful to have completed some of the other requirements (listed below) by the end of their sophomore year, preferably by the end of the first semester. Students who are considering the major may also find it beneficial to take S\&TS 201, What Is Science?, in their freshman or sophomore year. Human Ecology students should also consult the current Human Ecology guide and meet with the college advising coordinator, Nancy Breen, 205 Martha Van Rensselaer Hall, 255-1928.

## Major Requirements

No single course may satisfy more than one major requirement. All courses must be taken for a letter grade.

## 1. Basic courses

a. BIO G 101-104 or 105-106 or 107-108 (prerequisite for admission to Biology \& Society).
b. College calculus (one course):* MATH 106, 111, 112 or any higher-level calculus.
c. Recommended but not required:

General chemistry (one-year sequence) (prerequisite to biochemistry and other chemistry courses): CHEM 103-104, 206, 207208, or 215-216.
2. Foundation Courses (should be completed by end of junior year). Foundation courses are intended to provide a broad introduction to methodology and theory in their area.
These courses must be above the 100 level, at least 3 credit hours, and taken for a letter grade.
a. Ethics: one course; B\&SOC 205 (also S\&TS 205) or B\&SOC 206 (also S\&TS 206, PHIL 246).
b. Social sciences/humanities foundation: two courses; one from any two of the following subject areas: history of science; philosophy of science; sociology of science; politics of science; and science communication.
c. Biology foundation (breadth requirement): three courses; one each from three of the following subject areas: biochemistry, molecular and cell biology (BIOBM 330 or 331 or 333 or NS 320); ecology (BIOEE 261, BIOSM 364, BIOSM 375); genetics and development (BIOGD 281 or 282 or PL BR 225); evolutionary biology (BIOEE 278); animal behavior (BIONB 221, BIOSM 329); neurobiology (BIONB 222); anatomy and physiology (BIOAP 311 but not BIOAP 212); biological diversity (BIOPL 241 or BIOMI 290 or BIOEE 373 or 274 or 450 or 470 and 472 or 475 or 476 or ENTOM 212 or PL PA 301 or 309 or BIOSM 310 or 374 or 377 or 449 ); nutrition (NS 115).
d. Biology foundation (Depth requirement): one biology course for which one of the above (2c) is a prerequisite.**
e. Statistics: one course selected from MATH 171, BTRY 301, AEM 210, SOC 301, PSYCH 350, ECON 319, PAM 210, ILRST 212.
3. Core Course: (one course). Should be completed by end of junior year.
B\&SOC 301 Life Sciences and Society (also S\&TS 301); or S\&TS 286 Science and Human Nature (also PHIL 286).
4. Theme (five courses that correspond to the theme selected by the student). These courses can be above the 100 -level, at least 3 credit hours, and taken for a letter grade. Choose these courses as follows:
a. Natural science issues/biology elective (two courses). Select from the list of B\&SOC approved natural science issues courses or choose course(s) with introductory biology as a prerequisite.
b. Humanities/social sciences electives (two courses). Courses from the list of senior seminars may be used as theme electives if not used to meet another requirement, or select humanities or social sciences courses in consultation with the faculty advisor.
c. Senior seminar (one course taken senior year). Courses change yearly.

* Students may petition to take a second statistics course (an advanced course, in sequence with the statistics course taken in the foundation) in place of the calculus requirement
* A list of approved depth courses using NS 115 as a prerequisite is available in 306 Rockefeller Hall


## Independent Study

Projects under the direction of a Biology \& Society faculty member are encouraged as part of the program of study in the student's theme area. Applications for research projects are accepted by individual faculty members. Students may enroll for $1-4$ credits in B\&SOC 375 Independent Study with written permission of the faculty supervisor and may elect either the letter grade or the S-U option. Applications and information on faculty research, scholarly activities, and undergraduate opportunities are available in the Biology \& Society office, 306 Rockefeller Hall. Independent study credits may not be used in completion of the major requirements.

## The Honors Program

The honors program is designed to provide independent research opportunities for academically talented undergraduate students whose major is Biology \& Society (B\&SOC). Students who enroll in the honors program are expected, with faculty guidance, to do independent study and research dealing with issues in Biology \& Society. Students participating in the program should find the experience intellectually stimulating and rewarding whether or not they intend to pursue a research career.
Biology \& Society majors are considered for entry into the honors program at the end of the second semester of the junior year. Application forms for the honors program are available in the Biology \& Society office, 306 Rockefeller Hall. The honors program is available to Biology \& Society majors from the Colleges of Arts and Sciences and Agriculture and Life Sciences. Biology \& Society majors in the College of Human Ecology must be selected by an honors committee within their college. To qualify for the Biology \& Society honors program, students must have an overall Cornell cumulative grade point average (GPA) of at least 3.3, have formulated a research topic, and have found a project supervisor (with an academic appointment at Cornell) and another faculty member willing to serve as their advisors. At least one of these must be a member of the Biology \& Society major. Applications will be reviewed by a committee headed by the director of undergraduate studies, who will notify students directly of the outcome. Students will be permitted to register for the honors program only by permission of the department. Students must enroll for both the fall and spring semesters. B\&SOC 499 is now cross-listed with the College of Agriculture and Life Sciences as ALS 499 and the College of Human Ecology as HE 499. Students wishing to receive CALS credit can sign up for ALS 499 and those wishing to receive Human Ecology credit must sign up for HE 499. They must attend the honors seminar during the fall semester. More information on the honors
program is available in the Biology \& Society Office, 306 Rockefeller Hall, 255-6047.

People to contact for Biology \& Society honors information:
In Arts and Sciences: Brian Chabot, director of undergraduate studies, bfc1@cornell.edu
In Agriculture and Life Sciences: David
Pimentel, faculty representative to CALS Honors Committee, dp18@comell.edu
In Human Ecology: Nancy Breen, advising coordinator, CHE, neb5@cornell.edu

## Further Information

Professor Brian Chabot, director of undergraduate studies and advising coordinator, College of Agriculture and Life Sciences, bfc1@cornell.edu
Dr. Nancy Breen, advising coordinator, College of Human Ecology, neb5@comell.edu
Susan Sullivan, Biology \& Society Advising Office, 306 Rockefeller Hall, 255-6047, sfc1@ cornell.edu
web site: www.sts.cornell.edu

## I. First-Year Writing Seminars

Consult the John S. Knight Institute web site for times, instructors, and descriptions. Web site: woww.arts.cornell.edu/Knight_institute/ index.html.

## II. Introductory Courses

S\&TS 101(1101) Science and Technology in the Public Arena (SBA-AS)
Fall. 3 credits. Recommended as introduction to field. Not required; may not be used to fulfill major requirement. S\&TS 101 and 102 can be taken separately or in any order. J. Reppy.
For description, see S\&TS listings, S\&TS 101.

## S\&TS 102(1102) Histories of the Future

 (CA-AS)Spring. 3 credits. Recommended as an introduction to the field. Not required; may not be used to fulfill a major requirement. S\&TS 101 and 102 may be taken separately or in any order. S. Seth.
For description, see S\&TS listings, S\&TS 102.

## III. Foundation Courses

## A. Ethics (one course)

B\&SOC 205(2051) Ethical Issues in Health and Medicine (also S8TS 205[2051]) (KCM-AS)
Fall. 4 credits. Limited to 150 students. Not open to freshmen. K. Vogel.
In today's rapidly changing world of health and medicine, complex ethical issues arise in many contexts-from the private,
interpersonal interactions between doctor and patient to the broad, mass-mediated controversies that make medicine into headline news. This course examines ethical problems and policy issues that arise in contemporary medicine, health care, and biomedical research. Tools for ethical analysis are applied to a variety of cases and fundamental questions in bioethics. Perspectives from social science, history, and law also inform the course. The course explores ethical questions that arise in a number of substantive contexts, including the doctor-patient relationship, medical decision making near the end of life, human experimentation, genetics and reproductive
technology, public health, and the allocation of scarce resources.

## B8SOC 206(2061) Ethics and the

 Environment (also S\&TS 206[2061], PHIL 246[2460]) (KCM-AS)Spring. 4 credits. Limited to 50 students.
Open to all undergraduates; freshmen by permission of instructor. S. Pritchard. Aims to acquaint students with moral issues that arise in the context of the environment and environmental policy. Our concerns about the environment bring to our attention the importance of economic, epistemological, legal, political, and social issues in assessing our moral obligations to other humans and the natural world. The attempt is then to explore how different factors come into play in defining our responsibilities to the environment and to examine the grounds for our environmental policy decisions. A background in basic ecology or environmental issues or ethics is helpful.

## B. Social Sciences/Humanities

Foundation (two courses, one from any two areas)

## 1. History of Science

[HIST 315(3150) Environmental History: The U.S. and the World (also AM ST 349[3510])
Spring. 4 credits. Next offered 2008-2009.
A. Sachs.

For description, see HIST 315.]

## NTRES 232(2320) Nature and Culture

Spring. 3 credits. J. Tantillo.
For description, see NTRES 232.

## NTRES 332(3320) Introduction to Ethics

 and EnvironmentFall. 4 credits. J. Tantillo.
For description, see NTRES 332.

## [82TS 233(2331) Agriculture, History,

 and Society: From Squanto to BlotechnologyFall. 3 credits. Next offered 2009-2010. M. Rossiter.

For description, see S\&TS listings, S\&TS 233.]
S\&TS 281(2821) Science in Western Civilization: Medieval and EarlyModern Europe up to Isaac Newton (also HIST 281[2810])
Fall. 4 credits. May be taken for
Foundation credit if course time period
better meets students theme/interest, S\&TS
282 preferred for major. P. Dear.
For description, see HIST 281

## S8TS 282(2821) Science In Western

 Civilization: Newton to Darwln, Darwin to Einstein (also MIST 282[2820])Spring. 4 credits. S. Seth.
For description, see HIST 282
S8.TS 287(2871) Evolution (also BIOEE 207[2070], HIST 287[2870])
Fall or summer. 3 credits. May not be taken for credit after BIOEE 278.
W. Provine.

For description, see BIOEE 207.
8\&TS 355(3551) Computers: From the 17 th Century to the Dot.com Boom (also INFO 355[3551], COMM 355[3551]]
Fall. 4 credits. S $\$$ TS 355 and 356 may be taken separately or in any order. J. Ratcliff. For description, see S\&TS listings, S\&TS 355.
[8s.Ts 358(3561) Computing Cultures (also COMM 356[3561), INFO 356[3561], VISST 356[3560])
Spring. 4 credits. S\&TS 355 and 356 may be taken separately or in any order. Next offered 2008-2009. Staff.
For description, see S\&TS listings, S\&TS 356.]

## seTs 433(4331) International History of

 ScienceSpring. 4 credits. M. Rossiter.
For description, see S\&TS listings, S\&TS 433.

## s8TS 444(4441) Historical lasues of Gender and Science (also Fass 444[4440])

Spring. 4 credits. M. Rossiter.
For description, see S\&TS listings, S\&TS 444.
S8TS 447(4471) Seminar in the History of Biology (also BIOEE 467[4670], B\&SOC 447[4471], HIST 415[4150]) Fall or summer (six-week session). 4 credits. Limited to 18 students. S-U or letter grades. Fall, W. Provine and G. Gorman; summer, A. MacNeill.
For description and prerequisites, see BIOEE 467.

## 2. Philosophy of Science

## S\&TS 201(2011) What is Science? An

 Introduction to the Social Studles of Science and Technology (also SOC $210[2100]$ ]Spring. 3 credits. T. Pinch.
For description, see S\&TS listings, S\&TS 201.
S8TS 381(3811) Philosophy of Science: Knowledge and Objectivity (also PHIL 381[3810])
Spring. 4 credits. R. Boyd.
For description, see PHIL 381.

## 3. Sociology of Science

## Besoc 301(3011) Life Sciences and

 Society (also S\&TS 301[3011]) (SBA)Fall. 4 credits. May be used to meet sociology of science requirement if not used to meet core course requirement. J. Crane.

For description, see "Core Courses," B\&SOC 301.

## HD 452(4520) Culture and Muman

 DevelopmentFall. 3 credits. Q. Wang.
For description, see HD 452.

## NS 245(2450) Social Science

Perspectives on Food and Nutrition
Fall. 3 credits. C. Bisogni and J. Sobal.
For description and prerequisites, see NS 245.
D SOC 220(2200) Sociology of Health and Ethnic MInorities (also LSP 220[2200])
Fall. 3 credits. Limited to 25 students. P. Parra.

For description, see D SOC 220.
S\&Ts 201(2011) What Is Science? An Introductlon to the Social Studies of Science and Technology (also SOC 210[2100])
Spring. 3 credits. T. Pinch.
For description, see S\&TS listings, S\&TS 201.

## S\&T\$ 311(3111) The Soclology of

 Medicine (also SOC 313[3130])Fall. 4 credits. Not open to freshmen.
C. Leuenberger.

For description, see S\&TS listings, S\&TS 311.
[S8TS 411(4111) Knowledge, Technology, and Property
Spring. 4 credits. Next offered 2008-2009.
S. Hilgartner.

For description, see S\&TS 411.]

## 4. Politics of Science

BeSOC 407(4071) Law, Science, and Public Values (also S\&TS 407[4071])
Spring. 4 credits. M. Lynch.
For description, see S\&TS listings, S\&TS 407
[CRP 380(3800) Environmental Politics
Fall. 4 credits. Next offered 2008-2009.
R. Booth.

For description, see CRP 380.J
PAM 230(2300) Introduction to Policy Analysis
Fall. 4 credits. R. Avery and J. Gerner.
For description, see PAM 230.
sers 324(3241) Environment and Society (also D SOC/SOC 324[3240])
Fall and spring. 3 credits. C. Geisler and
G. Gillespie.

For description, see D SOC 324.
[SatS 391(3911) Science in the American Polity: 1960 to Now (also GOVT 309[3091], AM ST 389[3891])
Spring. 4 credits. Next offered 2008-2009.
S. Hilgartner.

For description, see S\&TS 391.]
5. Science Communication
[COMM 260(2600) Sclentific Writing for Public Information
Fall and spring. 3 credits. Limited to 25 non-freshmen or graduate students per section. Not open to freshmen. Next
offered 2008-2009. S. Conroe.
For description and prerequisites, see COMM

## 260.]

[COMM 421(4210] Communication and the Environment
Spring. 3 credits. May be used in Foundation only if not taken as senior seminar. Offered odd-numbered years; next offered 2008-2009. J. Shanahan.
For description, see COMM 421.]
S\&TS 285(2851) Communication in the Life Sciences (also COMM 285[2850])
Spring. 3 credits. B. Lewenstein.
For description, see COMM 285.

## SaTS 352(3521) Science Writing for the

Mass Media (also COMM 352[3520])
Fall and summer. 3 credits. L. Levitan and staff.
For description and prerequisites, see COMM 352.

## S\&TS 466(4661) Public Communication

 of Science and Technology (also COMM 466[4660])Spring. 3 credits. Limited to 15 students. May be used in Foundation only if not taken as senior seminar. Offered evennumbered years. B. Lewenstein.
For description and prerequisites, see COMM 466.
C. Biology foundation (breadth requirement): Three courses: one from three of the following subject areas:

1. Biochemistry, Molecular and Cell Biology
BIOBM 330(3300) Principles of Biochemistry, Individual Instruction Fall and spring. 4 credits. J. Blankenship and P. Hinkle.
For description and prerequisites, see BIOBM 330.

BIOBM 331(3310) Principles of Biochemistry: Protelns and Metabolism
Fall. 3 credits. May not be taken for credit after BIOBM 330 or 333 . G. Feigenson.
For description and prerequisites, see BIOBM 331.

BIOBM 333(3330) Principles of Blochemistry, Lectures
Summer 4 credits. H. Nivison.
For description and prerequisites, see BIOBM 333.
[NS 320(3200) Introduction to Human Blochemistry
Fall. 4 credits. Next offered 2008-2009.
P. Stover

For description and prerequisites, see NS 320.]
2. Ecology

BIOEE 261(2610) Ecology and the Environment
Fall and summer. 4 credits. Not open to freshmen. Fall, B. Chabot, A. Dhondt, and staff; summer, A. Vawter.
For description and prerequisites, see BIOEE 261.

BIOSM 364(3640) Field Marine Science
Summer. 6 credits. Taught at the Shoals Marine Laboratory, for more information and application, contact the SML office at G14 Stimson Hall. Staff.
For description and prerequisites, see BIOSM 364.

## BIOSM 375(3750) Fleld Marine Biology

 and EcologySummer. 6 credits. Taught at the Shoals
Marine Laboratory, for more information
and application, contact the SML office at G14 Stimson Hall. Staff.
For description and prerequisites, see BIOSM 375.

## 3. Genetics and Development

## BIOGD 281(2810) Genetics

Fall, spring, and summer. 5 credits. Limited to 200 students. Not open to freshmen fall semester. M. Goldberg, T. Fox,
R. MacIntyre, and D. Nero.

For description and prerequisites, see BIOGD 281.

BIOGD 282(2820) Human Cenetics
Spring. 2 or 3 credits ( 2 credits if taken after BIOGD 281); must be taken for 3 credits to fulfill Biology \& Society requirements. Limited to 25 students per disc. M. Goldberg.
For description and prerequisites, see BIOGD 282.

## PL BR 225(2250) Plant Genetics <br> Spring. 3 credits. S. Naithani.

For description, see PL BR 225.

## 4. Evolutionary Biology

BIOEE 278(2780) Evolutionary Biology
Fall, spring, and summer. 3 or 4 credits.
Fall, M. Geber; spring, K. Zamudio.
For description, see BIOEE 278.

## 5. Animal Behavior

## BIONB 221(2210) Neurobiology and

 Behavior I: Introduction to Behavior Fall. 3, 4, or 5 credits. P. W. Sherman and staff.For description and prerequisites, see BIONB 221

## BIOSM 329(3290) Ecology of Animal

 BehaviorSummer. 4 credits. Taught at the Shoals Marine Laboratory, for more information, contact the SML office at G14 Stimson Hall. Staff.
For description and prerequisites, see BIOSM 329.

## 6. Neurobiology

BIONB 222(2220) Neurobiology and Behavior II: Introduction to Neurobiology
Spring. 3 or 4 credits. C. D. Hopkins and staff.
For description and prerequisites, see BIONB 222.
7. Physiology and Anatomy

BIOAP 311(3110) Introductory Animal Physiology, Lectures (also VTBMS 346)

Fall. 3 credits. E. Loew and staff. For description and prerequisites, see BIOAP 311.

## 8. Biological Diversity

BIOMI 290(2900) General Microblology Lectures
Fall, spring, and summer. 2 or 3 credits; must be taken for 3 credits to fulfill major requirement. B. Batzing (summer) and W. Ghiorse.

For description and prerequisites, see BIOMI 290.

## BIOPL 241(2410) Introductory Botany

Fall. 3 credits. K. Niklas.
For description, see BIOPL 241.
BIOEE 274(2740) The Vertebrates: Structure, Function, and Evolution
Spring. 4 credits. B. McGuire.
For description and prerequisites, see BIOEE 274

## BIOEE 373(3730) Biology of the Marine

 InvertebratesFall. 5 credits. D. Harvell.
For description and prerequisites, see BIOEE 373.
[BIOEE 450(4500) Mammalogy (Lecture) Spring. 3 credits. Next offered 2008-2009. B. A. McGuire.

For description and prerequisites, see BIOEE 450.]
[BIOEE 470(4700) Herpetology, Lectures Spring. 2 credits; must be taken in conjunction with 472 to count for major credit. Next offered 2008-2009. H. Greene. For description and prerequisites, see BIOEE 470.1

## [BIOEE 472(4720) Herpetology, Laboratory

Spring. 2 credits; must be taken in conjunction with 470 to count for major credit. Offered alternate years; Next offered 2008-2009. H. Greene.
For description and prerequisites, see BIOEE 472.)

## BIOEE 475(4750) Ornithology

Spring. 4 credits. D. Winkler.
For description and prerequisites, see BIOEE 475.

## [BIOEE 476(4760) Biology of Fishes

Fall. 4 credits. Next offered 2008-2009. A. McCune.

For description and prerequisites, see BIOEE 476.$]$

## BIOSM 310(3100) Marine Symblosis

Summer. 4 credits. Taught at the Shoals Marine Laboratory, for more information, contact the SML office at G14 Stimson Hall. Staff.
For description and prerequisites, see BIOSM 310.

## BIOSM 374(3740) Field Ornithology

Summer. 4 credits. Taught at the Shoals
Marine Laboratory, for more information,
contact the SML office at G14 Stimson Hall. Staff.
For description and prerequisites, see BIOSM 374.

BIOSM 377(3770) Diversity of Fishes
Summer. 4 credits. Taught at the Shoals Marine Laboratory, for more information,
contact the SML office at G14 Stimson Hall
Staff.
For description and prerequisites, see BIOSM 377.

BIOSM 449(4490) Seaweeds, Plankion,
and Seagrass: the Ecology and Systematics of Marine Plants
Summer. 4 credits. Taught at the Shoals Marine Laboratory, for more information, contact the SML office at G14 Stimson Hall. Staff.
For description and prerequisites, see BIOSM 449.

## ENTOM 212(2120) Insect Biology

Fall. 4 credits. J. P. Sanderson.
For description and prerequisites, see ENTOM 212.

## PL PA 301(3010) Biology and

Management of Plant Diseases
Fall. 3 credits. M. Milgroom.
For description, see PL PA 301.
PL PA 309(3090) Fungi
Fall. 3 credits. K. Hodge.
For description and prerequisites, see PL PA 309.
9. Nutrition

NS $115(1150)$ Nutrition, Health, and Society
Fall. 3 credits. D. Levitsky.
For description, see NS 115 .
D. Biology foundation (depth
requirement): one course for which one of the above breadth requirement courses (2C) is a prerequisite.

## E. Statistics (one course)

AEM 210(2100) Introductory Statistics Spring. 4 credits. C. VanEs.
For description and prerequisites, see AEM 210.

## BTRY 301(3010) Statistical Methods I

Fall and summer. 4 credits. Fall, P. Sullivan; Spring: F. King.
For description and prerequisites, see BTRY 301.

## ECON 319(3190) Introduction to Statistics and Probability

Fall and spring. 4 credits. Y. Hong.
For description and prerequisites, see ECON 319.

ILRST 212(2120) Statistical Reasoning
Fall. 3 credits. Staff.
For description, see ILRST 212.
MATH 171(1710) Statistical Theory and Application in the Real World
Fall and spring. 4 credits. Staff.
For description, see MATH 171.

## PAM 210(2100) Introduction to Statistics

Fall and spring. 4 credits. J. Lewis,
W. Rosen, S. Unur, and staff.

For description, see PAM 210.

## PSYCH 350(3500) Statistics and

Research Design
Fall. 4 credits. Staff.
For description, see PSYCH 350.

## SOC 301(3010) Evaluating Statistical Evidence

Fall. 4 credits. Limited to Arts and Sciences
students. Staff.
For description, see SOC 301.

## IV. Core Courses

BeSOC 301(3011) Life Scionces and Society (also 5\&T5 301[3011]) (SBA-AS)
Fall. 4 credits. Limited to 50 students. Prerequisite: two semesters of social science or humanities and one year of introductory biology or permission of instructor. J. Crane.
Critical thinking about the diverse influences shaping the life sciences. Topics include evolution and natural selection, heredity and genetic determinism, biotechnology, and reproductive interventions. Students interpret episodes, past and present, in biology in light of scientists' historical location, economic and political interests, use of language, and ideas about causality and responsibility. Readings, class activities, and written assignments are designed so that students develop interpretive skills and explore their own intellectual and practical responses to controversies in biology and society.
[S\&TS 286(2861) Science and Human Nature (also PHIL 286[2860])
Spring. 4 credits. Next offered 2008-2009. R. Boyd.

For description, see PHIL 286.]

## V. Themes

## A. Natural Science Issues/Biology

Elective (two courses). Select from the following list of B\&SOC approved natural science issues courses or choose course(s) with intro biology as a prerequisite.
[B\&SOC 214(2141) Biological Basis of Sex Differences (also BIOAP/FGSS 214[2140]) (PBS)
Fall. 3 credits. Next offered 2008-2009 J. Fortune

For description, see BIOAP 214.]
B8SOC 344(3441) Insect Conservation Biology (also ENTOM 344[3440])
Spring. 3 credits. J. Losey.
For description, see ENTOM 344.
[BESOC 347(3471) Human Growth and Development: Biological and Behavioral Interactions (also HD/NS 347[3470])
Spring. 3 credits. Offered alternate years; next offered 2008-2009. J. Haas and S. Robertson.

For description and prerequisites, see HD 347.]

NS 275(2750) Human Biology and Evolution (also ANTHR 275[2750])
Fall. 3 credits. J. Haas.
For description, see NS 275.
[BIOEE 673(6730) Human Evolution: Concepts, History, and Theory (also ANTHR 673[6373])
Fall. 3 credits. Next offered 2008-2009.
K. Kennedy.

For description, see BIOEE 673]
BIO G 305(3050) Basic Immunology (also VETMI 315[3150])
Fall. 3 credits. J. Marsh.
For description, see VETMI 315.
[BIOPL 247(2470) Ethnoblology
Fall. 3 credits. Offered alternate years; next offered 2008-2009. D. Bates.
For description, see BIOPL 247.$]$
ENTOM 210(2100) Plagues and People (also B\&SOC 210[2101])
Fall. 3 credits. L. Harrington.
For description, see ENTOM 210 ,
ENTOM 277(2770) Natural Enemies and Invasive Species
Spring. 2-3 credits (Biology \& Society students must take 3 -credit option).
J. P. Nyrop.

For description, see ENTOM 277.
EAS 322(3220) Biogeochemistry of the Hawailan Islands
Spring. 4 credits. Prerequisites: enrollment in EES Semester in Hawaii; EAS 220, EAS
303, or permission of instructor. L. Derry.
For description, see EAS 322.
EAS 351(3510) Marine Ecosystems Field Course
Spring. 4 credits. Prerequisites: EAS 240; enrollment in EES Semester in Hawaii.
Recommended: oceanography course.
C. Greene, B. Monger, and C. D. Harvell.

For description, see EAS 351.
[HD 220(2220) Biological Issues in Human Development: The Human Brain and Mind
Fall. 3 credits. Next offered 2008-2009. E. Temple.

For description, see HD 220.]
HD 366(3660) Emotional Functions of the Braln
Spring. 3 credits. R. Depue
For description, see HD 366.
[HD 320(3200) Human Developmental Neuropsychology: Neurobiology of Human Diseases and Disorders
Spring. 3 credits. Next offered 2008-2009.
E. Temple.

For description, see HD 320.3
HD 344(3440) Infant Behavior and Development
Fall. 3 credits. Not open to freshmen.
S. Robertson.

For description and prerequisites, see HD 344.
HD 466(4660) Psychobiology of Temperament and Personality
Fall. 3 credits. R. DePue.
For description and prerequisites, see HD 466.
[HD 433(4330) Developmental Cognitive Neuroscience
Spring. 3 credits. May be used as depth course if BIONB 221 or 222 taken as breadth. Next offered 2008-2009. E. Temple.

For description, see HD 433.]
[HD 337(3370) Language Development (also LING 436[4436], PSYCH/COGST 436[4360])
Spring. 4 credits. Next offered 2008-2009. B. Lust.

For description, see HD 337.]
[NS 222(2220) Maternal and Child Nutrition
Fall. 3 credits. Limited to 25 students. Next
offered 2008-2009. P. Brannon.
For description and prerequisites, see NS 222.]
NS 331(3310) Physiological and Biochemical Bases of Human Nutrition
Spring. 4 credits. C. McCormick.
For description and prerequisites, see NS 331.
[NS 361(3610) Biology of Normal and Abnormal Behavior (also PSYCH 361[3610])
Spring. 3 credits. Prerequisite: junior or
senior standing. Next offered 2008-2009.
B. Strupp.

For description and prerequisites, see NS 361.]
NS 475(4750) Mechanisms of Birth Defects
Spring. 3 credits. P. Stover.
For description and prerequisites, see NS 475
NTRES 201(2010) Environmental Conservation
Spring. 3 credits. T. Fahey.
For description, see NTRES 201.

## NTRES 428(4280) Principles and

 Practices of Applied Wildlife ScienceSpring. 3 credits. M. Richmond, P. Curtis and R. Malecki.
For description, see NTRES 428.

## PSYCH 223(2230) Introduction to

 BiopsychologyFall. 3 credits. D. Smith.
For description, see PSYCH 223.

## PSYCH 326(3260) Evolution of Human

 BehaviorSpring. 4 credits. B. Johnston.
For description and prerequisites, see PSYCH 326.

Examples of biology electives
AN SC 300(3000) Animal Reproduction and Development
Spring. 3 credits, J. Parks.
For description, see AN SC 300.

HD 466(4660) Psychobiology of Temperament and Personality
Fall. 3 credits. R. DePue.
For description and prerequisites, see HD 466.
NS 331(3310) Physiological and Blochemical Bases of Human Nutrition
Spring. 4 credits. C. McCormick.
For description, see NS 331.

## B. Humanities/Social Science elective (two

 courses)Courses listed earlier as social science/
humanities foundation courses (2B) are
particularly appropriate as social science/
humanities electives. However, a single course
cannot be used to meet both requirements.
Examples of recommended social science or humanities electives are listed below. A more complete list is available in 306 Rockefeller Hall.
Examples of social science electives
AEM 464(4640) Economics of Agricultural Development (also ECON 464[4640])
Fall. 3 credits. R. Christy.
For description, see AEM 464.
[ANTHR 211(2411) Nature and Culture
Spring, 4 credits. Next offered 2008-2009.
S. Sangren.

For description, see ANTHR 211.]
B\&SOC 331(3311) Environmental Governance (also S\&TS 331[3311], NTRES $331[3310]$ )
Spring. 3 credits. S. Wolf.
For description, see NTRES 331.
B\&SOC 343(3431) Biotechnology and the Economy (also S8TS 343[3431]) (SBA-AS)
Fall. 4 credits. J. Reppy
For description, see S\&TS 343.
[B\&SOC 354(3541] Sociology of Contemporary Cultures
Fall. 4 credits. Next offered 2008-2009.
C. Leuenberger.

For description, see S\&TS 354.]
[B\&SOC 435(4351) Postcolonial Science]
BEE 299(3299) Sustainable Development
Spring. 3 credits. Web-based course.
N. Scott.

For description and more information, see BEE 299.
[BIOEE 671(6710) Paleoanthropology of South Asia (also ANTHR 671[6371])
Fall. 3 credits. Next offered 2008-2009.
K. Kennedy.

For description, see BIOEE 671.]
CRP 451(4510) Environmental Law (also CRP 551[5510])
Fall. 4 credits. R. Booth.
For description, see CRP 451.
DEA 422(4220) Ecological Literacy in Design (also ARCH 464.01[4264])
Spring. 3 credits. J. Elliott.
For description, see DEA 422.
D SOC 201 (2010) Population Dynamics (aiso SOC 202[2020])
Spring. 3 credits. D. Brown.
For description, see D SOC 201

D SOC 205(2050) Rural Sociology and International Development (also SOC 206[2060])
Spring. 3 credits. P. McMichael.
For description, see D SOC 205.
D SOC 410(4100) Health and Survival Inequalities (also SOC 410[4100], FGSS 410[4100])
Fall. 4 credits. A. Basu.
For description, see D SOC 410.
HD 251(2510) Social Gerontology: Aging and the Life Course
Spring. 3 credits. Limited to 60 students.
Highly recommended: HD 250 or
equivalent, to be determined by instructor.
E. Wethington.

For description, see HI) 251.
HD 319(3190) Memory and the Law
Fall. 3 credits. C. Brainerd.
For description, see HD 319.
[HD 336(3360) Connecting Social, Cognitive, and Emotional Development
Fall. 3 credits. Next offered 2008-2009. P. Casasola.

For description and prerequisites, see HD 336.]

HD 343(3430) Social Worlds of Childhood
Spring. 4 credits. J. Ross-Bernstein
For description, see HD 343.
[HD 362(3620) Human Bonding
Fall. 3 credits. Next offered 2008-2009. C. Hazan.

For description, see HD 362.]
HD 370(3700) Adult Psychopathology (also PSYCH 325[3250])
Spring. 3 credits. H. Segal.
For description, see HD 370.
HD 457(4570) Health and Social Behavior (also SOC 457[4570])
Fall. 3 credits. E. Wethington.
For description, see HD 457.
[LAW 408(4081) Law, Science, and Sustainability
Fall. 4 credits. Next offered 2008-2009.
D. A. Kysar.

For description, see Law 408.]
NS 260(2600) Introduction to Global Health (also B\&SOC 260[2601])
Spring. 3 credits. R. Stolzfus.
For description, se NS 260.
NS $\mathbf{4 2 1 ( 4 2 1 0 )}$ Nutrition and Exercise
Spring. 3 credits. Limited to nutrition majors, others by permission of the
Instructor. S. Travis.
For description and prerequisites, see NS 421.
NS 450(4500) Public Health Nutrition
Spring. 3 credits. K. Rasmussen and D. Pelletier.

For description and prerequisites, see NS 450.

## [NS 650(6500) Food and Nutrition

Assessment in a Social Context
Fall. 3 credits. Next offered 2008-2009.
D. Pelletier and G. Pelto.

For description and prerequisites, see NS 650.]
NTRES 431(4310) Environmental Strategies
Spring. 3 credits. S. Wolf.
For description, see NTRES 431.

PAM 337(3370) Racial and Ethnic Differentiation (also SOC 337[3370])
Spring. 3 credits. A. Sassler.
For description, see PAM 337.
PAM 350(3500) Contemporary Issues in Women's Health (also FGSS 350[3500])
Fall. 3 credits. A. Parrot.
For description, see PAM 350.
PAM 380(3800) Human Sexuality
Spring. 4 credits. A. Parrot.
For description, see PAM 380.
PAM 435(4350) U.S. Health Care System
Spring. 3 credits. S. Nicholson.
For description, see PAM 435.

## PAM 437(4370) Economics of Health

 PolicySpring. 3 credits, K. Simon.
For description and prerequisites, see PAM 437.

Examples of humanities electives
PHIL 241(2410) Ethics
Spring. 4 credits. N. Sturgeon.
For description, see PHIL 241.

## C. Senior Seminars

B\&SOC 402(4021) Bodies in Medicine, Science and Technology (also S HUM 420, S\&TS 402[4021]) (sr sem)
Spring. 4 credits. R. Prentice.
For description, see S HUM 420.
B\&SOC 447/4471) Seminar in the History of Biology (also BIOEE 467[4670], HIST 415[4150], S\&TS 447[4471]) (PBS)
Summer. six-week session. 4 credits.
A. MacNeill.

For description, see BIOEE 467.
B\&SOC 461(4611) Environmental Policy (also BIOEE/ALS 661[6611]) (PBS)
Fall and spring (yearlong); must be started in fall. 3 credits each semester. Limited to 12 students. D. Pimentel.
For description and prerequisites, see BIOEE 661.

## [B\&SOC 471(4711) The Dark Side of

 Biology: Biological Weapons, Bioterrorism, and Biocriminality (also S8TS 471[4711]) (SBA-AS)Fall. 4 credits. Prerequisites: at least one course in S\&TS and one semester of biology beyond introductory biology. Next offered 2008-2009. K. Vogel.
Rapid advances in biotechnology, as well as changing social and political climates, have created new public fears that the malicious release of pathogens and toxins by states and/ or terrorist groups is a serious threat. Dehates have also emerged as to what biological research and publications should be restricted and censored to prevent misuse. The course explores the scientific, social, political, legal, and ethical discussions surrounding historical and current work on dangerous pathogens and toxins. This course also takes a look at the role that the expert and lay communities play in the shaping of popular perceptions and public policies in these threat
discussions.]
B\&SOC 496(4961) History of Medicine in China (also ASIAN 496[4961], HIST 496[4961], S\&TS 496[4961])
Spring. 4 credits. T. J. Hinrichs.
For description, see HIST 496.
[COMM 421(4210) Communication and the Environment
Spring. 3 credits. Offered odd-numbered
years; next offered 2008-2009. J. Shanahan.
For description, see COMM 421.]
CSS 410(4100) Environmental Impacts of Agricultural Biotechnology
Spring. 3 credits. D. Buckley and P. Hobbs. For description, see CSS 410.
D SOC 410(4100) Health and Survival Inequalities (also SOC 410[4100], FGSS 410[4100])
Fall. 4 credits. A. Basu.
For description, see D SOC 410.
D SOC 438(4380) Population and Development (also SOC 437[2370], D SOC 638[6380])
Spring. 3 credits. D. Gurak.
For description, see D SOC 438.
[HD 336(3360) Connecting Social, Cognitive and Emotional Development
Fall. 3 credits. Next offered 2008-2009.
M. Casasola.

For description, see HD 336.]
HD 343(3430) Social Worlds of Childhood
Spring. 4 credits. J. Ross-Bernstein.
For description, see HD 343.
HD 414(4140) Social and Psychological Aspects of the Death Penalty
Spring. 3 credits. C. J. Brainerd.
For description, see HD 414.

## HD 418(4180) Aging: Contemporary

 IssuesFall. 3 credits. J. Mikels.
For description, see HD 418.
HD 419(4190) Midlife Development
Spring. 3 credits. A. Ong.
For description, see HD 419.
[HD 432(4320) Cognitive, Social, and Developmental Aspects of Scientific Reasoning (also COGST 432[4320])
Fall. 3 credits. Next offered 2008-2009.
B. Koslowski.

For description, see HD 432.]
HD 474(4740) Autism and the Development of Social Cognition
Fall. 3 credits. M. Belmonte
For description, see HD 474.
[HD 464(4640) Adolescent Sexuality (also FGSS 467[4670])
Fall. 3 credits. Next offered 2008-2009.
R. Savin-Williams.

For description, see HD 464.]
HD 466(4660) Psychobiology of Temperament and Personality
Fall. 3 credits. R. Depue.
For description and prerequisites, see HD 466.
HD 468(4680) Stress in Childhood and Adolescence
Spring. 3 credits. J. Eckenrode.
For description, see HD 468.
HD 478(4780) Attention Deficit/
Hyperactivity Disorder in Children
Spring. 3 credits. S. Robertson.
For description, see HD 478.
NS 452(4520) Molecular Epidemiology and Dietary Markers of Chronic Disease
Spring. 3 credits. P. Cassano.
For description, see NS 452.

## NTRES 433(4330) Applied Environmental

 PhilosophySpring. 4 credits. J. Tantillo.
For description, see NTRES 433.
[PAM 556(5560) Managed Care
Fall. 3 credits. Next offered 2008-2009
J. Kuder.

For description, see PAM 556.]

## [S\&TS 411(4111) Knowledge,

 Technology, and PropertySpring. 4 credits. Next offered 2008-2009. S. Hilgartner.

For description, see S\&TS 411.]
S\&TS 422(4221) New York Women (also FGSS 422[4220], HIST 445[4450]l
Fall. 4 credits. M. Rossiter.
For description, see S\&TS listing, S\&TS 422.
S\&TS 429(4291) Politics of Science
Fall. 4 credits. R. Herring
For description, see GOVT 429.

## [S\&TS 431(4311) From Surgery to

 SimulationSpring. 4 credits. Next offered 2008-2009. R. Prentice.

For description, see S\&TS 431.J
[S8TS 453(4531) Knowledge and Society (also SOC 453[4530])
Fall. 4 credits. Next offered 2008-2009.
C. Leuenberger.

For description, see S\&TS 453.]
S\&:TS 466(4661) Public Communication of Science and Technology (also COMM 466[4660])
Spring. 3 credits. Limited to 15 students.
Offered even-numbered years.
B. Lewenstein.

For description and prerequisites, see COMM 466.

## [S\&TS 468(4681) Understanding

Innovation
Fall. 4 credits. Next offered 2008-2009.
J. Reppy.

For description, see S\&TS 468.\}
[S\&TS 474(4741) Sclence and Race: $A$ History (also S HUM 404[4040])
Fall. 4 credits. Limited to 15 students. Next offered 2008-2009. S. Seth.
For description, see S HUM 404.]
[S\&TS 476(4761) Historlcal Issues in Science, Technology and Colonialism (also S HUM 426[4260])
Spring. 4 credits. Limited to 15 students.
Next offered 2009-2010. S. Seth.
For description, see S HUM 426.]

## [S\&TS 490(4901) Integrity of Scientific

 PracticeFall. 4 credits. Next offered 2008-2009. S. Hilgartner.]

## S\&TS 495(4951) Social Studles of the Human Sciences

Spring. 4 credits. C. Leuenberger. For description, see S\&TS listing, S\&TS 495.

## VI. Other Courses

B\&SOC 375(3751) Independent Study Fall or spring. 1-4 credits. Prerequisite: biology and society majors; written permission of faculty supervisor. Projects under the direction of a Biology and Society faculty member are encouraged as part of the program of study within the student's concentration area. Applications for research projects are accepted by individual
faculty members. Students may enroll for 1 to 4 credits in B\&SOC 375 Independent Study with written permission of the faculty supervisor and may elect either the letter grade or the S-U option. Students may elect to do an independent study project as an alternative to, or in advance of, an honors project. Applications and information on faculty research, scholarly activities, and undergraduate opportunities are available in the Biology and Society Office, 306 Rockefeller Hall. Independent study credits may not be used in completion of the major requirements.

## B8SOC 499(4991/4992) Honors Project I

 and II (also ALS 499[4991/4992], HE 499[4990])Fall and spring (yearlong). Prerequisite: senior biology and society students by permission of department; overall GPA of 3.3. Students should apply in 306 Rockefeller Hall. Arts and Sciences students should enroll in B\&SOC 499 to receive Arts and Sciences credit; CALS students should enroll in ALS 499 to receive College of Agriculture and Life Sciences credit; HE students should enroll in HE 499 for College of Human Ecology credit. Students who are admitted to the honors program are required to complete two semesters of honors project research and to write an honors thesis. The project must include substantial research, and the completed work should be of wider scope and greater originality than is normal for an upper-level course. The student must find a project supervisor and a second faculty member willing to serve as faculty reader; at least one of these must be a member of the Biology and Society faculty.
Students must register for the total credits desired for the whole project each semester (e.g., 8 credits for fall and 8 credits for spring). After the fall semester, students receive a letter grade of " $R$ "; a letter grade for both semesters is submitted at the end of the second semester whether or not the student completes a thesis or is recommended for honors. Minimally, an honors thesis outline and bibliography should be completed during the first semester. In consultation with the advisors, the director of undergraduate studies will evaluate whether the student should continue working on an honors project. Students should note that these courses are to be taken in addition to those courses that meet the regular major requirements.
If students do not complete the second semester of the honors project, they must change the first semester to independent study to clear the " $R$ " and receive a grade. Otherwise, the " $R$ " will remain on their record and prevent them from graduating.

## BURMESE

See "Department of Asian Studies."

CAMBODIAN (KHMER)
See "Department of Asian Studies."

CATALAN
See "Department of Romance Studies."

## CENTER FOR APPLIED MATHEMATICS

The Center for Applied Mathematics administers a broadly based interdepartmental graduate program that provides opportunities for study and research over a wide range of the mathematical sciences. This program is based on a solid foundation in analysis, algebra, and methods of applied mathematics. The remainder of the graduate student's program is designed by the student and his or her Special Committee. For detailed information on opportunities for graduate study in applied mathematics, students should contact the director of graduate studies of the Center for Applied Mathematics, 657 Frank H.

## T. Rhodes Hall

There is no special undergraduate degree program in applied mathematics.
Undergraduate students interested in an application-oriented program in mathematics may select an appropriate program in the Department of Mathematics, the Department of Computer Science, or some department of the College of Engineering.
A listing of selected graduate courses in applied mathematics can be found in the description of the center under
"Interdisciplinary Centers, Programs, and Studies."

## CENTER FOR INTERNATIONAL STUDIES

See "Interdisciplinary Centers, Programs, and Studies."

## CHEMISTRY AND CHEMICAL BIOLOGY

H. D. Abruña, chair (122 Baker Laboratory, 255-4175); G. W. Coates, associate chair; P. J. Chirik, director of undergraduate studies; H. D. Abruna, J. Almy, B. A. Baird, T. P. Begley, R. A. Cerione, G. Chan, P. Chen, P. J. Chirik, G. W. Coates, D. B. Collum, B. R. Crane, H. F. Davis, F. J. DiSalvo, S. E. Ealick, G. S. Ezra, J. H. Freed, B. Ganem, M. A. Hines, R. Hoffmann, P. L. Houston, S. Lee, H. Lin, R. F. Loring, J. A. Marohn, T. McCarrick, D. T. McQuade, J. Njardarson, J. Park, S. Russo, D. Y. Sogah, D. A. Usher, B. Widom, P. T. Wolczanski, D. B. Zax

The Department of Chemistry and Chemical Biology offers a full range of courses in physical, organic, inorganic, analytical, theoretical, bioorganic, and biophysical chemistry. In addition to their teaching interests, chemistry and chemical biology faculty members have active research programs. The link between teaching and research is a vital one in a continuously evolving scientific subject; it ensures that students will be provided with the most advanced information and perspectives and affords opportunities for students to participate in research. For additional information about the department and course offerings, see the department course web page (www.chem.cornell.edu).

## The Major

To fit the widely varying needs of our undergraduate majors, the department offers two different tracks that both lead to the same undergraduate degree:
Standard Major-The standard major provides a comprehensive background in all fields of chemistry. Most students who complete the standard major go on to graduate study in chemistry or to medical school, although some students proceed directly to a position in the chemical industry. With additional independent research (which is not required), the standard chemistry major is fully accredited by the American Chemical Society.
Alternative Major-The alternative major offers a flexible program of study that is primarily designed for students who intend to double major in another field. For example, students majoring in biology can complete the alternative major with little additional class work. This program might also be attractive for students interested in law (especially patent law), as a double major in government or economics plus chemistry is quite feasible. This program is not suited to further graduate work in chemistry. With few exceptions, students in the alternative major are not chosen to participate in the honors program in chemistry. The alternative major is not accredited by the American Chemical Society.
Either version of the major can be completed in three years of study. Most students, however, complete all of the requirements in their first three years with the exception of CHEM 410, Inorganic Chemistry, which is usually taken in the fall semester of the senior year. The typical chemistry course sequence is:
first year: general chemistry and mathematics
second year: organic chemistry, analytical and organic laboratories, and physics
third year: physical chemistry lectures and laboratories

## fourth year: inorganic chemistry

## Admission to the Major

Admission to the chemistry major requires the satisfactory completion of a number of introductory courses which, when taken together, demonstrate an ability to complete the major. These courses include (1) CHEM 215-216 or 207-208 (CHEM 209 or 206 may be substituted for 207 but this is not recommended); (2) CHEM 300; (3) PHYS 207 or 112 or 116 ; and (4) MATH 111 or 191. Second-semester sophomores (or beyond) who have completed all but one of these requirements may be admitted to the major provided that they have a plan for completing the major on schedule.

## The Standard Major

The following courses must be completed for the standard major:
General chemistry: CHEM $207+208$ or CHEM $215+216$. (CHEM 209 or 206 may be substituted for CHEM 207, but is not recommended).
Organic chemistry: CHEM $357+358$ or CHEM $359+360$
Physical chemistry: CHEM $389+390$
Inorganic chemistry: CHEM 410

Laboratory chemistry: CHEM $300+301+302$ $+303$
Physics: (PHYS 207 or 112 or 116) + (PHYS 208 or 213).
Mathematics: MATH $111+112+213$ or MATH $121+122+221+222$ or MATH $191+192+$ 293
Most standard majors also perform independent research at some point in their academic career, either during the semester or in the summer. Many students take advanced courses to complement this program.

## The Alternative Major

The following courses must be completed for the alternative major:
General chemistry: CHEM $207+208$ or CHEM $215+216$. (CHEM 209 or 206 may be substituted for CHEM 207, but is not recommended)
Organic chemistry: CHEM 257 (CHEM 357 + 358 or CHEM $359+360$ may be substituted)
Physical chemistry: CHEM 287 (CHEM 389 + 390 may be substituted)

## Inorganic chemistry: CHEM 410

Laboratory chemistry: CHEM $251+290+300$ (CHEM 301 may be substituted for CHEM 251; CHEM 303 may be substituted for CHEM 290).
Physics: (PHYS 207 or 112 or 116) + (PHYS 208 or 213)
Mathematics: MATH $111+112$ or MATH $121+$ 122 or MATH $191+192$
One additional 3 - or 4 -credit advanced chemistry course at the 300 level or above. (CHEM 358, 360 or 390 can be used to satisfy this requirement.)
Three additional courses, of 3 or more credits each, that form a cohesive unit and are not at the introductory level. These three courses must be approved by the director of undergraduate studies.
The three additional courses may be in another field of study, such as biochemistry, physics, biology, materials science, economics, government, or education. Many students who double major use courses from their second major to satisfy this requirement.
Like the standard majors, many alternative majors perform independent research, either in the chemistry department or in another department.

## Honors

Any student who completes the requirements for a standard major in chemistry with a cumulative GPA of 3.5 or higher shall be awarded a degree with honors (cum laude).
In addition, senior chemistry majors who have superior grades in chemistry and related subjects and who have had good performance in at least 8 credits of undergraduate research (or the equivalent) in chemistry or a related field (e.g., biochemistry) may be nominated for the honors program. To ensure that the nomination process runs smoothly, all students who are interested in the honors program should discuss this possibility with their advisor early in the fall semester of the senior year. Admission to the honors program is by invitation only. Students completing the alternative major are only eligible for the honors program in exceptional cases.

Students in the honors program participate in the honors seminar (CHEM 498) and write a senior thesis. The successful completion of the honors program leads to the degree of bachelor of arts with honors or high honors in chemistry.

## Program for Science Teachers

Chemistry majors who wish to become reachers will be interested to know that Cornell University offers a certification program for teachers of secondary (grades 7-12) science. Interested students apply to the program during their sophomore or junior years. If accepted, students integrate some course work in education with the rest of their undergraduate studies. All chemistry majors who enter this program will remain in the College of Arts and Sciences to complete the major.
After earning the bachelor's degree, certification students enter the graduate field of education to complete a fifth year of study at Cornell. Following this fifth year, students are eligible for a master's degree from Cornell and a teaching certificate from New York State. Additional information is available from Susie Slack, 424 Kennedy Hall, 255-9255, or Professor Deborah Trumbull, 426 Kennedy Hall, 255-3108.

## Laboratory Course Regulations

Students registered for laboratory courses who do not appear at the first meeting of the laboratory will forfeit their place in that laboratory but are not automatically dropped from the course.
Students and members of the teaching staff are required to wear safety goggles and lab aprons in all chemistry
laboratories. Closed-toed footwear is required (no sandals). Students are reminded to take their goggles and lab aprons to the first laboratory session. Those who fail to cooperate with the safety program will be asked to leave the laboratories.
Students in organic and analytical labs are required to pay for glassware and any other items broken or missing from their laboratory desks at the close of each semester. Students who fail to inventory their desks at the appointed time in the presence of their instructor are charged a $\$ 20$ fee in addition to charges for any breakage.

## Courses

Note: Class meeting times are accurate at the time of publication. If changes occur, the department will provide new information as soon as possible.
Preliminary examinations for all courses may be given in the evening.

## Courses with Overlapping Content

Because the department offers several courses with overlapping content, students should select courses carefully to meet the needs of their academic programs and to ensure credit for each course they take. Listed below are groups of courses with largely similar content. In general, students may receive credit for only one course in each group.
CHEM 206, 207, 209, 216
CHEM 208, 215
CHEM 257, 357

## CHEM 105(1150) The Language of

 Chemistry (PBS)Fall. 3 credits. Contributes to satisfying CALS physical science requirement of one course in chemistry. S-U or letter grades. Lec, M W F; prelims Oct. 4, Nov. 8. D. A. Usher.

In his autobiography, A. Kornberg (Nobel Laureate in Medicine, 1959) wrote, "much of life can be understood in rational terms if expressed in the language of chemistry. It is an international language, a language for all time, a language that explains where we came from, what we are, and where the physical world will allow us to go." Through careful examination of a few milestone investigations of biologically important compounds and processes, the principles of chemistry to which Kornberg refers are developed.

## [CHEM 106(1160) The World of Chemistry

 (PBS)Spring. 3 credits. Contributes to satisfying CALS physical science requirement of one course in chemistry. S-U or letter grades. Lec, M W F; prelims, March 4, April 3. P. Houston. Next offered 2008-2009. As posed in a 1987 report produced by the World Commission on Environment and Development, the most important question facing our world is whether or not we can pursue development "that meets the needs of the present without compromising the ability of future generations to meet their own needs." In a keynote address to the State of the Planet 2006 conference, Jeffrey Sachs stated flatly, "We're not on a course of sustainable development; we're not even close

Every major ecosystem on the planet is under profound stress." One goal of The World of Chemistry is to explore the stresses we have placed on our ecosystem-on the atmosphere, on water resources, on energy supply, on our health and to learn how chemistry allows us to understand these problems and to repair them. A second goal is to see how chemistry affects other aspects of our everyday world and how it interacts with culture, politics, and the economy. Major topics include ozone, global warming, energy supply, acid rain, water quality, batteries, plastics, food, medicine, and the chemistry of life. We will explore these issues through case studies, literature, and film.]

CHEM 206(1560) Introduction to General Chemistry (PBS)
Fall or summer. 4 credits. Limited enrollment. Nonrefundable lab fee (covers cost of safety goggles, lab apron, and breakage): \$20. Lec, M W F; lab, M, T, W, R, or F; prelims, Sept. 27 , Nov. 8. B. A. Baird.

A one-semester introduction to chemistry, both qualitative and quantitative. CHEM 206 prepares students for CHEM 257; CHEM 206 is not recommended for premedical or preveterinary students; however, students who have never taken a chemistry course in secondary school or who have a very weak preparation sometimes take CHEM $206+208$.

## CHEM 207-208(2070-2080) General

 Chemistry (PBS)207 , fall or summer; 208, spring or summer. 4 credits each semester. CHEM 207 (or CHEM 209) is a prerequisite for CHEM 208. (CHEM 206 is accepted, but not recommended.) CHEM 207 has a $\$ 20$ nonrefundable lab fee that covers cost of safety goggles, lab apron, and breakage.

Engineering students should take CHEM 209 and cannot take CHEM 207 without written permission from the Chemistry Instructional Office and the College of Engineering. Exceptionally well prepared students may receive credit for CHEM 207 by demonstrating competence in the advanced placement examination of the College Entrance Examination Board or in the departmental examination given at Cornell before classes start in the fall. Taking CHEM 208 after 215 may be done only by permission of the Director of Undergraduate Studies. Lec, T R; lab, M T W R F; secs, M T W R F; prelims, Oct. 5, Nov. 9, Feb. 27, April 10. Fall; B. R. Crane and R. F. Loring; spring, H. F. Davis.
Covers fundamental chemical principles, with considerable attention given to the quantitative aspects and techniques important for further work in chemistry.

## CHEM 209(2090) Engineering General

 ChemistryFall or spring. 4 credits. Enrollment limited to Engineering students; students from other colleges cannot take CHEM 209 without written permission from the Chemistry Instructional Office. Prerequisite: high school chemistry or permission of instructor. CHEM 209 is required of all Engineering freshmen and is a prerequisite for CHEM 208. Entering students exceptionally well prepared in chemistry may receive advanced placement credit for General Chemistry by demonstrating competence in the advanced placement examination of the College Entrance Examination Board or in the departmental examination given at Cornell before classes start in the fall. Nonrefundable lab fee (covers cost of safety goggles, lab apron, and breakage): $\$ 20$. Lec, M W F; lab, M T W R F; prelims, Oct. 4, Nov. 8, Feb. 26, April 8. Fall: D. B. Zax; spring: G. K. Chan. Covers fundamental chemical principles, with considerable attention given to the quantitative aspects and techniques important for further work in chemistry.

## CHEM 215-216(2150-2160) Honors

 General and Inorganic Chemistry (PBS)215, fall; 216, spring. 4 credits each semester. Limited enrollment. Prerequisites: two years high school chemistry or permission of instructor, physics, and mathematics. Corequisite: calculus course at level of MATH 111 or 191 for students who have not taken high school calculus; for CHEM 216, CHEM 215. Recommended for students who intend to specialize in chemistry or in related fields.Taking CHEM 208 after CHEM 215 may be done only by permission of director of undergraduate studies. Nonrefundable lab fee (covers cost of safety goggles, lab apron, and breakage): \$20. Lec, M W F; Lab, M T W R or F; prelims, Oct. 4, Nov. 8, Feb. 26, Apr. 3. Fall: staff; spring: S. Lee.

Intensive systematic study of the laws and concepts of chemistry, with considerable emphasis on quantitative aspects. First semester covers thermochemistry, kinetics, and equilibrium. Second semester includes systematics of inorganic chemistry. Laboratory work covers qualitative and quantitative analysis, transition metal chemistry, and spectroscopic techniques.

## CHEM 251(2510) Introduction to

 Experimental Organic ChemistryFall, spring, or summer. 2 credits. Limited enrollment. Corequisite: CHEM 257 or 357 Not recommended for chemistry majors considering graduate school in chemistry. Lec, fall, R or F; spring, R; lab, M T W R or F; prelims, fall: Nov. 13; spring; Apr. 24. S. Russo.

Introduction to the synthesis, separation, and handling of materials, including applications of different types of chromatography, simple and fractional distillation, crystallization, extraction, and others.

## CHEM 252(2520) Elementary

Experimental Organic Chemistry
Spring. 2 credits. Prerequisite: CHEM 251.
Lec, T; lab, W, R; prelim, Apr. 24. S. Russo. Continuation of CHEM 251. Focus is on structural elucidation of organic compounds and synthesis of biologically interesting organic compounds.

## CHEM 257(1570) Introduction to Organic

 and Biological Chemistry (PBS)Spring or summer. 3 credits. Prerequisite: CHEM 206 or 207. Because CHEM 257 is only a 3 -credit course, it does not provide a practical route to satisfying medical school requirements. Because of duplication of materials, students who take both 257 and 357 will receive graduation credit only for CHEM 257. Lec, M W F; prelims, Feb. 14, Mar. 11, Apr. 8. D. A. Usher.

Introduction to organic chemistry with an emphasis on those structures and reactions of organic compounds having particular relevance to biological chemistry.

CHEM 287-288(2870-2880) Introductory Physical Chemistry (PBS)
287, fall; 288, spring. 3 credits each semester. Prerequisites: CHEM 208 or 216 and MATH 111-112 and PHYS 208, or permission of instructor; for CHEM 288, CHEM 287 or 389. Lec, M W F; 287: rec, M or W, T; 288: rec, M or W; prelims: 287: Oct. 4, Nov. 20. 288; Mar. 6, Apr. 15. Fall: J. H. Freed; spring: P. Chen.

Survey of the fundamental principles of physical chemistry, focusing in the fall on thermodynamics, chemical and enzyme kinetics, and an introduction to quantum mechanics. In the spring the course is oriented to the application of physical chemistry to biological systems, including statistical mechanics, phenomena in condensed phases, transport, electrochemistry, spectroscopy. CHEM 287 satisfies the minimum requirement for physical chemistry in the alternative chemistry major.

## CHEM 290(2900) Introductory Physical

 Chemistry LaboratoryFall or spring. 2 credits each semester. Lec, fall, R; spring, R; lab: fall, M T; spring, M T R F. Fall, T. McCarrick; spring, J. H. Freed. Survey of the methods basic to the experimental study of physical chemistry, with a focus on the areas of kinetics, equilibrium, calorimetry, and molecular spectroscopy.

## CHEM 300(3000) Quantitative Chemistry

 Fall. 2 credits. Prerequisite: CHEM 208 or 216 or advanced placement in chemistry. Lec, R ; lab, M T W R; prelims, Oct. 18. J. A. Marohn.Volumetric, spectrophotometric, and potentiometric methods are emphasized. Techniques are learned by analysis of knowns,
and then are used on unknowns. Lectures and problem sets stress the relationship between theory and applications.

## CHEM 301(3010) Honors Experimental

 Chemistry I (PBS)Spring. 4 credits. Prerequisites: CHEM 300
and 357 or 359 . Lec, M W F; 2 labs, M W or T R. Staff.
Introduction to the techniques of synthetic organic chemistry. A representative selection of the most important classes of organic reactions is explored in the first half of the semester, augmented by lectures on the reaction chemistry and the theory of separation and characterization techniques.

## CHEM 302(3020) Honors Experlmental

 Chemistry II (PBS)Fall. 4 credits. Limited enrollment; priority given to chemistry majors. Prerequisite:
CHEM 301. Lec, M W F; 2 labs, M W T R.

## F. F. J. DiSalvo.

Instrumental methods of analysis, including chemical microscopy, visible and infrared spectroscopies, and gas chromatography. Basic concepts of interfacing are covered.

## CHEM 303(3030) Honors Experimental

 Chemistry III (PBS)Spring. 4 credits. Limited to 10 students per lab. Prerequisites: CHEM 302, 389, 390; coregistration in latter permissible. Lec, M W F; 2 labs, M W or T R. T. McCarrick. Introduction to experimental physical chemistry, including topics in calorimetry, spectroscopy, and kinetics. The analysis and numerical simulation of experimental data is stressed.

## CHEM 357-358(3570-3580) Organic

 Chemistry for the Life Sclences (PBS)Fall or summer, 357; spring or summer, 358. 3 credits each semester. Prerequisite: for CHEM 357, CHEM 208 or 216 or advanced placement; for CHEM 358, CHEM 357 or permission of instructor.
Recommended: concurrent registration in CHEM 251 or 300 . Because of duplication of material, students who take both CHEM 257 and 357 will receive graduation credit only for CHEM 257. Lec, M W F, optional rec may be offered; prelims, Sept. 20, Oct. 16, Nov. 8, Feb. 14, Mar. 11, Apr. 10. Fall: staff; spring: D. Y. Sogah.
Study of the more important classes of carbon compounds-especially those encountered in the biological sciences. Emphasizes their three-dimensional structures, mechanisms of their characteristic reactions, their synthesis in nature and the laboratory, methods of identifying them, and their role in modern science and technology.

## CHEM 359-360(3590-3600) Honor:

 Organic Chemistry I and II (PBS)359 , fall; 360 , spring. 4 credits each semester. Limited enrollment. Prerequisites: CHEM 216 with grade of B or better, CHEM 208 with grade of A or better, or permission of instructor; for CHEM 360 , CHEM 359. Recommended: co-registration in CHEM 300-301-302. Recommended for students who intend to specialize in chemistry or closely related fields. Lec, M W F; disc, W; prelims, Sept. 20, Oct. 16, Nov. 8, Spring: Feb. 14, Mar. 11, Apr. 10. Fall: J. Njardarson; spring, H. Lin.
Rigorous and systematic study of organic compounds, their structures, the mechanisms of their reactions, and the ways they are synthesized in nature and in the laboratory.

CHEM 389-390(3890-3900) Honors Physical Chemistry I and II (PBS) Fall, 389; spring, 390. 4 credits each semester. Prerequisites: MATH 213 or 221222; PHYS 208; CHEM 208 or 216 or permission of instructor; for CHEM 390, CHEM 389. Lec, 389: M W F; rec, M, T, or W. Lec, 390: M W F; prelims: 389, Sept. 25, Oct. 23, Nov. 20; 390, Feb. 14, Mar. 11, Apr 10. Fall, M. A. Hines; spring, 390: J. Park. CHEM 389 is primarily an introduction to the quantum mechanics of atoms and molecules. The behavior of ensembles of quantum mechanical particles (statistical mechanics) is introduced near the end of the semester. Rotational, vibrational and electronic spectroscopy are covered in detail. CHEM 390 is a continuation of CHEM 389 and discusses the thermodynamic behavior of macroscopic systems in the context of quantum and statistical mechanics. Kinetic theory and the laws of thermodynamics are covered in detail.

## [CHEM 404(4040) Entrepreneurship in Chemical Enterprise

Spring. 1 credit. Lec, T. Next offered 20082009. B. Ganem.

Designed to acquaint students with the problems of planning, starting, and managing a new scientifically oriented business venture, the course consists of six weekly 90 -minute meetings focusing on case studies and assigned reading, as well as outside lectures by entrepreneurs in the chemical,
pharmaceutical, and biotechnology industries. Topics include new technology evaluation and assessment, business formation, resource allocation, management development, as well as manufacturing and sales issues.]

## CHEM 410(4100) Inorganic Chemistry

 (PBS)Fall. 4 credits. Prerequisites: CHEM 358 or 360 , and 287 or 390 . Lec, M W F; prelims, Oct. 4, Nov. 8. P. J. Chirik.
Systematic study of the synthesis, structure, bonding, reactivity, and uses of inorganic, organometallic, and solid-state compounds.

## CHEM 421(4210) Introduction to

 Inorganic Chemistry ResearchFall or spring. 2-4 credits. Prerequisites: CHEM 303 and 389-390, or 287-288, and 289-290 with average of B- or better, or permission of instructor. Selected faculty. Research in inorganic chemistry involving both laboratory and library work, planned in consultation with a faculty member.
CHEM 433(4330) Introduction to Analytical Chemistry Research Fall or spring. 2-4 credits. Prerequisites: CHEM 303 and 390 with average of B-or better or permission of instructor. Selected faculty.
Research in analytical chemistry involving both laboratory and library work, planned in consultation with a faculty member.
CHEM 440(4400) Bio-Inorganic Chemistry (PBS)
Spring. 3 credits. Prerequisites: CHEM 215216 or $207-208,357-358,359-360$ or equivalent. Lec, W F. B. R. Crane.
Addresses important aspects of inorganic chemistry in biological systems. Topics include: (1) the distribution and properties of metals in biology; (2) coordination chemistry of biological metals; (3) properties of metalcontaining macromolecules; (4) redox processes and long-range electron transfer; (5) metallocofactors and metal clusters; (6) Lewis
acid catalysis; (7) metal-oxygen reactions in biology; and (8) metal trafficking and metalloprotein assembly.

## CHEM 450(4550) Principles of Chemical

 Blology (1) (PBS)Fall. 3 credits. Prerequisites: CHEM 357-
358, 359-360 or equivalent. Lec, T R.
T. Begley.

Covers topics at the interface of chemistry and biology with a focus on problems where organic chemistry has made a particularly strong contribution to understanding the mechanism of the biological system. Topics include the organic chemistry of carbohydrates, proteins and nucleic acids, strategies for identifying the cellular target of physiologically active natural products, combinatorial chemistry, and chemical aspects of signal transduction, cell division and development.

## CHEM 461(4610) Introduction to Organic Chemistry Research

Fall or spring. 2-4 credits. Prerequisites: CHEM 302 and 358 or 360 with grade of B- or better or permission of instructor. Selected faculty.
Research in organic chemistry involving both laboratory and library work, planned in consultation with a faculty member.

## CHEM 477(4770) Introduction to Physical Chemistry Research

Fall or spring. 2-4 credits. Prerequisite: CHEM 390 with average of B- or better or permission of instructor. Selected faculty. Research in physical chemistry involving both laboratory and library work, planned in consultation with a faculty member.
CHEM 498(4980) Honors Seminar Spring. 0 credits. Admission only by department invitation. Additional pre- or corequisites: outstanding performance in two coherent 4 -credit units of research in course such as CHEM 421, 433, 461, 477; or equivalent amount of research in another context. Lec W. R. Hoffman and S. Lee.

In the Chemistry Honors Seminar students will present their research in written and oral form. The Seminar will also include a broader discussion of professional issues and life skills in the world of chemistry.

## CHEM 600-601(6000-6010) Ceneral Chemistry Colloquium

600 , fall; 601 , spring. 0 credits. R. Staff. Series of talks representative of all fields of current research interest in chemistry given by distinguished visitors and faculty members.

## CHEM 602(6020) Information Literacy for the Physical Scientist

Spring. 1 credit. Primarily for graduate students and undergraduate chemistry
majors doing research. Lec, T. L. Solla. Introduction to physical science information research methods, with hands-on exploration of print and electronic resources. Much important information can be missed and valuable time wasted without efficient information research strategies. Topics include finding chemical and physical properties, reaction and analytical information; patents, web resources; using specialized resources in chemistry, physics, biochemistry, and materials science; and managing citations.

## CHEM 605(6050) Advanced Inorganic Chemistry I: Symmetry, Structure, and Reactlvity

Fall. 4 credits. Prerequisite: CHEM 389-390 or equivalent or permission of instructor. Lec, M W F. P. Wolczanski.
Introduction to chemical bonding and applications of group theory, including valence bond theory, and spectroscopy as applied to main group and transition-metal coordination compounds. An introduction to reactivity covers substitution, electron transfer, and related reactions. Readings are at the level of Carter's Molecular Symmetry and Group Theory and Jordan's Reaction Mechanisms of Inorganic and Organometallic Systems.
[CHEM 606(6060) Advanced Inorganic Chemistry II: Synthesis, Structure, and Reactivity of Coordination Compounds, and Blolnorganic Chemistry
Spring. 4 credits. Prerequisite: CHEM 605 or equivalent or permission of instructor.
Lec, M W F. Next offered 2008-2009.
P. T. Wolczanski.

Synthesis, structure, and reactivity of main group and modern coordination compounds and bioinorganic systems. The mechanisms of transition-metal reactions are emphasized, and evaluation of the current literature are stressed. Background readings are at the level of Reaction Mechanisms of Inorganic and Organometallic Systems by Jordan.]

## CHEM 607(6070) Advanced Inorganic

 Chemistry III: Solld-State ChemlstrySpring. 4 credits. Prerequisite:
undergraduate inorganic chemistry or permission of instructor. Lec, M W F. F. J. DiSalvo.

Third in a three-semester sequence. Interdisciplinary approach to solids. Topics include solid-state structure and X-ray diffraction, phase diagrams, diffusion kinetics, synthetic methods, electronic structure, and physical properties of solids. Texts: Mueller: Structural Inorganic Chemistry; and Hoffmann: Solids and Surfaces. Readings from inorganic chemistry and solid-state primary literature.

## CHEM 608(6080) Advanced Inorganic

 Chemistry I: Organometallic ChemistrySpring. 4 credits. Prerequisites: CHEM 605,
665 , or permission of instructor. M W F.
P. J. Chirik.

Synthesis, structure, and reactivity of organometallic compounds and applications in catalysis. Evaluation of the current literature is emphasized, and background readings are at the level of Applications of Organotransition Metal Cbemistry by Coliman, Hegedus, Finke, and Norton and Organometallic Chemistry of the Transition Metals by Crabtree.

## [CHEM 622(6220) Chemical

Communicatlon
Fall. 3 credits. Lec, M W F. Next offered 2008-2009. J. Meinwald and T. Eisner. For description, see BIONB 623.]

## CHEM 625(6250) Advanced Analytical

 ChemistrySpring. 4 credits. Prerequisite: CHEM 288 or 389 or equivalent. Lec, M W F; occasional labs, TBA. W. D. B. Zax.
Application of high-resolution NMR
spectroscopy, infrared, and mass spectroscopy to chemical problems. Some practical experience in NMR and MS is offered.
[CHEM 627(6270] Advanced Analytleal Chemistry II
Spring. 3 credits. Primarily for graduate students. Prerequisite: CHEM 793 or equivalent preferable. Lec, M W F. Next offered 2008-2009. D. B. Zax.
Modern techniques in nuclear magnetic resonance. Little overlap is expected with CHEM 625, as this course focuses on more general questions of experimental design, understanding of multipulse experiments, and aspects of coherent averaging theory.]
[CHEM 628(6280) Isotoplc and Trace Element Analysis (also NS 690[6900])
Fall. 3 credits. Primarily for graduate students and advanced undergraduates. Prerequisite: CHEM 288 or 390 or 302 , or CHEM 208 and PHYS 208, or permission of instructor. Lec, T R. Offered alternate years. Next offered 2008-2009. J. T. Brenna.
Survey course in modern high-precision isotope ratio mass spectrometry (IRMS) techniques and trace/surface methods of analysis. Topics include dual inlet and continuous flow IRMS, thermal ionization MS, inductively coupled plasma MS, atomic spectroscopy, ion and electron microscopies, X-ray and electron spectroscopies, and biological and solid state applications.]
CHEM 629(6290) Electrochemistry Spring. 4 credits. Primarily for graduate students and junior and senior undergraduates. Prerequisite: CHEM 390 or equivalent. Kecommended: MATH 213. Lec, T R. H. D. Abruña.
Fundamentals and applications of electrochemistry. Topics include the fundamentals of electrode kinetics, electron transfer theory, the electrical double layer, diffusion, and other modes of transport.
CHEM 650-651(6500-6510) Organic and Organometallic Chemistry Seminar
650 , fall; 651, spring. 0 credits.
Requirement for graduate students majoring in organic or bioorganic chemistry. Juniors and seniors encouraged to attend. T R. Staff.
Series of talks representative of all fields of current research interest in organic organometallic chemistry, given by research associates, faculty members, and distinguished visitors.

## CHEM 665(6650) Advanced Organic

 ChemistryFall. 4 credits. Primarily for graduate students and junior and senior undergraduates. Prerequisites: CHEM 358 or 360 , and CHEM 390 or equivalents, or permission of instructor; some knowledge of elementary quantum mechanics. Lec, M W F. B. Ganem.
Discussion of the properties and reactivities of organic molecules and the underlying physical phenomena that affect them.

## CHEM 66e(6660) Synthetic Organic Chemistry

Spring. 4 credits. Primarily for graduate students and upperclass undergraduates. Prerequisite: CHEM 665 or permission of instructor. Lec, T R. B. Ganem.
Modern techniques of organic synthesis; applications of organic reaction mechanisms and retrosynthetic analysis to the problems encountered in rational multistep synthesis, with particular emphasis on modern developments in synthesis design.

CHEM 667(6670) Topics In Chemical Blology
Fall. 4 credits. Prerequisite: CHEM 360 or equivalent, BIOBM 330 or permission of instructor. Lec, M W F. H. Lin.
This course is intended for advanced undergraduate students majoring in chemical biology and graduate students working in related areas. The topics that will be covered fall into two general areas: Antibiotics: Mechanism of action of different types of antibiotics; Biosynthesis of polyketide and non-ribosomal peptide antibiotics; Antibiotic resistance mechanisms and strategies to overcome antibiotic resistance. Protein postranslational modifications (PTM): Types of enzyme-catalyzed PTM; Mechanism of enzymatic reactions involved in PTM; Effects of PTM on protein structure and function; PTM-related human diseases. A general review, specifically tailored for chemistry/ biochemistry students, of the history and background of each topic will be given, followed by discussion of recent literature on the topic.

## [CNEM 668(6680) Chemical Aspects of Biologlical Procesees

Fall. 4 credits. Prerequisite: CHEM 360 or equivalent. Lec, T R. Next offered 20082009. T. P. Begley.

Examines a representative selection of the most important classes of enzyme-catalyzed reactions from a mechanistic perspective. Topics include the chemical basis of enzymatic catalysis, techniques for the elucidation of enzyme mechanism, cofactor chemistry, and the biosynthesis of selected natural products. The application of chemical principles to understanding biological processes is emphasized.]

## CHEM 669(6690) Organic and Polymer Synthesis Using Transition Motal Catalysts

Spring. 4 credits. Prerequisite; primarily for graduate students; CHEM 359/360 or equivalent or permission of instructor. G. W. Coates.

Transition metal-based catalysts are invaluable in both organic and polymer synthesis. This course begins with a brief overview of organometallic chemistry and catalysis. Subsequent modules on organic and polymer synthesis are then presented. Topics of current interest are emphasized.

## [CHEM 670(6700) Fundamental

Principles of Polymer Chemistry
Fall. 4 credits. Prerequisite: CHEM 389/390 and $359 / 360$ or equivalent or permission of instructor. Primarily for graduate students and advanced undergraduates. No previous knowledge of polymers required. Lec, T R. Next offered 2008-2009. D. Y. Sogah. Emphasizes general concepts and fundamental principles of polymer chemistry. The first part of the course deals with general introduction to classes of polymers, molar masses and their distributions, and a brief survey of major methods of polymer synthesis. The second part deals with characterization and physical properties. These include solution properties-solubility and solubility parameters, solution viscosity, molecular weight characterizations (gel permeation chromatography, viscometry, light scattering, osmometry); bulk properties-thermal and mechanical properties; dynamic mechanical properties; and structure-property relationships.]
[CHEM 671(6710) Synthetic Polymer Chemistry (also MS\&E 671[6710], CHEME 675[6750])
Spring. 4 credits. Prerequisites: minimum of organic chemistry at level of CHEM $359 / 360$. Students without this organic chemistry background should see instructor before registering. Primarily for graduate students and advanced undergraduates. Recommended: knowledge of material covered in CHEM 670 or MS\&E 452. Lec, T R. Next offered 2008-2009. D. Y. Sogah.
Emphasizes application of organic synthetic methods to the development of polymerization methods and control of polymer architecture. Emphasizes modern concepts in synthetic polymer chemistry and topics of current interest: the study of new methods of polymer synthesis, the control of polymer stereochemistry and topology, and the design of polymers tailored for specific uses and properties.]

## CHEM 672(6720) Kinetics and Regulation

 of Enzyme SystemsSpring. 4 credits. Primarily for graduate students with interests in biophysical chemistry and quantitative treatments of protein function. Prerequisite: CHEM 288 or 390 , BIOBM 330,331 , or equivalents or permission of instructor. Lec, M W F B. Baird.

Focus is on protein interactions and related changes in structure and activity. Topics include protein structure and dynamics; thermodynamics and kinetics of ligand binding; steady state and transient enzyme kinetics; enzyme catalysis and regulation; and the role of cell membrane receptors in regulating cellular activities.

## [CNEM 677(6770) Chemistry of Nuclelc

 AcidsFall. 4 credits. Primarily for graduate students. Prerequisites: CHEM 358 or 360 . and 390 or equivalents. Lec, M W. Next
offered 2008-2009. D. A. Usher.
Structure, properties, synthesis, and reactions of nucleic acids from a chemical point of view. Special topics include RNAi, antisense and antigene technology, ribozyme reactions (including the ribosome), mutagens, PCR, recent advances in sequencing, DNA as a computer, and alternative genetic materials.]

## [CHEM 681(6810) Introduction to

 Quantum ChemistryFall. 4 credits. Prerequisites: one year of undergraduate physical chemistry, three semesters of calculus, one year of college physics. Lec T R. Next offered 2008-2009. G. S. Ezra.

Introduction to the application of quantum mechanics in chemistry. Covers many of the topics in CHEM 793-794 at a more descriptive, less mathematical level.]

## CHEM 686(6860) Physical Chemistry of

 ProteinsFall. 4 credits. Primarily for graduate students. Prerequisite: CHEM 288 or 390 or equivalents. Letter grades for undergraduate and graduates. Lec, M W F . P. Chen.

Protein studies using physical methods are presented, with focuses on using single molecule spectroscopic methods and on metalloprotein structures/functions. Topics include: (1) physical concepts: chemical structure and conformation of proteins; protein folding energy landscape; electron
transfer theory; enzyme kinetics; proteinprotein interactions; protein-DNA interactions. (2) Experimental methodologies: absorption/ emission spectroscopy; fluorescence resonance energy transfer; confocal microscopy; total internal reflection microscopy; single molecule spectroscopy; time correlated single photon counting; fluorescence correlation spectroscopy; atomic force microscopy; optical/magnetic tweezers. (3) Protein structure and function: oxygen binding and activation proteins; electron transfer proteins; oxygenases and oxidases; metallochaperones; metalloregulatory proteins; green fluorescent proteins; motor proteins (kinesin, dynein and F1-ATPase)

## CHEM 700(7000) Baker Lectures

Fall and spring. Dates TBA.
Distinguished scientists who have made significant contributions to chemistry will come to Cornell for one-day symposiums, which will take place on Saturday (dates to be announced). Refer to the Chemistry and Chemical Biology web site for more information, www.chem.cornell.edu.

## [CHEM 701(7010) Introductory Graduate

 SeminarFall. 0 credits. Highly recommended for all senior graduate students in any field of chemistry. Lec, W. Next offered 2008-2009. R. Hoffmann.

Discussion of professional issues facing young chemists as well as life skills: academic and industrial trends, presentations, employment, immigration, publication, research funding, and ethics.]

## [CHEM 716(7160) Introduction to Solid State Organic Chemistry

Spring. 3 credits. Recommended: CHEM 607 or some exposure to or course in solid state chemistry and quantum mechanics; good undergraduate physical chemistry course may be sufficient for quantum theory; PHYS 443 or CHEM 793 or 794 are at substantially higher level than what is needed. Lec, M W F. Next offered 20082009. S. Lee

Examines some principles of crystallography and also electronic structure theory of solids. We then consider properties such as conduction, superconductivity, ferroelectricity and ferromagnetism. The final portion of this course is concerned with structure-property relations.]

## [CHEM 765[7650] Physical Organic Chemistry I

Spring. 4 credits. Primarily for graduate students. Prerequisite: CHEM 665 or permission of instructor. Lec, M W F. Next offered 2008-2009. Staff
Explores contemporary tools for calculating molecular structures and energies of species of all sizes. The course uses computers extensively but requires only a limited knowledge of mathematics (mainly linear algebra).]

## [CHEM 774[7740) Chemistry of Natural

 Products: Combinatorial ChemistrySpring. 3 credits. Prerequisites: CHEM 360
and BIOBM 330 or equivalent. Lec, M W F
Next offered 2008-2009. T. P. Begley. Combinatorial chemistry has revolutionized the way organic chemists think about structure function studies on biological systems and the design of inhibitors. This course explores the design, synthesis, screening, and use of natural (i.e., peptide, protein, nucleic acid,
carbohydrate) and unnatural (i.e., totally synthetic) libraries.]

## [CHEM 780(7800) Chemical Kinetics and

 Molecular Reaction DynamicsFall. 4 credits. Prerequisite: CHEM 681 or permission of instructor. Lec, T R. Next
offered 2008-2009, P. L. Houston.
Principles and theories of chemical kinetics and molecular reaction dynamics. Topics include potential energy surfaces, transition state theory, and statistical theories of unimolecular decomposition. Depending on class interest, the course also includes special topics such as surface reactions and photochemistry.]

## CHEM 787(7870) Mathematical Methods

 of Physical ChemlstryFall. 4 credits. Prerequisites: one year of undergraduate physical chemistry, three semesters of calculus, and one year of
college physics. Lec, T R. G. S. Ezra. Provides the mathematical foundation for graduate courses in physical chemistry, such as quantum mechanics and statistical mechanics, as well as for research in experimental and theoretical physical chemistry. Topics include linear algebra, matrices, and the eigenvalue problem; functions of a complex variable and contour integration; methods of solution of relevant differential equations; special functions; partial differential equations; integral transforms. The program Mathematica is employed throughout for both analytical and numerical work. At the level of Mathematical Methods for Scientists and Engineers by McQuarrie, and
Mathematical Methods for Pbysicists by Arfken and Weber.

## CHEM 788(7880) Macromolecular Crystallography (also BIOBM 738[7380])

Fall. 3 credits. Prerequisite: permission of instructor. Lec, T R. S. E. Ealick.
Lectures cover the fundamentals of $x$-ray crystallography and focus on methods for determining the three-dimensional structures of macromolecules. Topics include crystallization, data collection, phasing methods, model building, refinement, structure validation, and structure interpretation.

## CHEM 791(7910) Spectroscopy

Spring. 4 credits. Prerequisite: CHEM 793
or PHYS 443 or equivalent. Lec, T R. Next
offered 2008-2009. G. S. Ezra.
Molecular Spectroscopy and Magnetic Resonance Spectroscopy are offered alternate years. Molecular Spectroscopy includes: principles of molecular rotational, vibrational, and electronic spectroscopy; interaction of molecules with radiation; Born-Oppenheimer approximation; diatomic molecules; polyatomic molecules; molecular symmetry groups. At the level of Molecular Rotation Spectra by Kroto. Magnetic Resonance Spectroscopy includes: quantum mechanics of electron and nuclear spins; Fourier Transform and Two Dimensional experiments; spin relaxation; multiple quantum coherence; imaging. At the level of The Principles of Magnetic Resonance by Slichter.

## [CHEM 792(7920) Molecular Collision

 TheorySpring. 4 credits. Lec, T R. Next offered 2008-2009. G. S. Ezra.
The concepts and methods of scattering theory are described with particular emphasis on applications to problems of chemical
interest. At the level of Child's Molecular Collision Theory and Taylor's Scattering Theory.]
CHEM 793(7930) Quantum Mechanics I Fall. 4 credits. Prerequisites: CHEM 390, coregistration in A\&EP 321, or CHEM 787 or equivalents or permission of instructor Lec, M W F. J. Park.
Topics include Schrodinger's equation, wave packets, uncertainty principle, matrix and operator mechanics, orbital and spin angular momentum, exclusion principle, perturbation theory, and the variational principle. At the level of R. Shankar, Quantum Mechanics.
CHEM 794(7940) Quantum Mechanics II Spring. 4 credits. Prerequisites: CHEM 793 or equivalent and CHEM 787 or equivalent or co-registration in A\&EP 322, or permission of instructor. Lec, M W F.
J. A. Marohn.

Topics include: The density matrix; interaction of radiation with matter; unitary evolution in the two-level system, interaction representation, pulsed excitation, adiabatic rapid passage; non-unitary evolution, correlation functions, Bloembergen-PurcellPound relaxation theory, re-equilibration of populations, dephasing of coherences; saturation, hole-burning, and echoes; timedependent perturbation theory, Fermi's Golden rule, second quantization, stimulated emission, spontaneous emission; the Magnus expansion and average Hamiltonian theory, multi-dimensional pulsed spectroscopy; Gaussian wavepackets, femtosecond pulse-pair excitation, vibrational-electronic spectroscopy, the Raman effect; electron transfer, rates of chemical reactions, intermolecular forces, scattering.

## CHEM 795(7950) Statistical Thermodynamics

Fall. 4 credits. Primarily for graduate students. Prerequisite: CHEM 390 or equivalent. Pre- or corequisite: CHEM 681 or 793 or equivalent. Lec, M W F. G. Chan. Classical thermodynamics at the level of Thermodynamics and an Introduction to Thermostatistics by Callen and statistical thermodynamics at the level of the first 12 chapters of Statistical Mechanics by McQuarrie. Topics in the first part include the first and second laws, free energy and Legendre transforms, convexity, thermodynamic potentials, densities and fields, phase equilibrium, thermodynamics of dilute systems, and the third law. Topics in the second part include ensembles and partition functions, fluctuations, ideal gases, ideal harmonic crystals and black-body radiation, the third law (again), chemical-equilibrium constants, imperfect gases, and the quantum ideal gases (Fermi-Dirac and Bose-Einstein statistics).

## CHEM 796(7960) Statistical Mechanics

 Spring. 4 credits. Prerequisites: CHEM 795 and 793 or equivalent. Lec, T R. R. F. Loring.Continuation of CHEM 795. Statistical mechanics of interacting systems. Topics include liquid state theory, computational statistical mechanics, critical phenomena, renormalization group theory, and an introduction to nonequilibrium statistical mechanics.
[CHEM 798(7980) Bonding in Molecules Spring. 4 credits. Prerequisite: some exposure to quantum mechanics; good undergraduate physical chemistry course or CHEM 681 PHYS 433 or CHEM 793-794 are at substantially higher level than what is needed; students should consult instructor if in doubt. Lec, T R. Next offered 2008-2009. R. Hoffmann.
Aims to build a qualitative picture of bonding in all molecules, including organic, inorganic, organometallic systems and extended structures (polymer, surfaces, and threedimensional materials).]

## CHINA AND ASIA-PACIFIC STUDIES

J. Chen, director ( 132 McGraw Hall, 254-6262).
R. Bush, A. Carlson, Z. Chen, S. Cochran,
S. Divo, E. Gunn, P. Katzenstein,
F. Logevall, T. J. Lowi, Affiliated faculty: M. Evangelista, J. Kirshner, J. V. Koschmann, T. Lyons, V. Nee, E. Sanders, M. Shin, E. Tagliocozzo, K. Taylor.
web site: www.einaudi.cornell.edu/caps
China and Asia-Pacific Studies (CAPS) offers a unique approach to the study of China's language, history, politics, society, and foreign relations by providing students with experience both on- and off-campus, including three years in Ithaca, one semester in Washington, D.C., and one semester in Beijing.

## The Major

Students are strongly encouraged to take one of the introductory courses, CAPS 282 (GOVT 282) or CAPS 257 (HIST 257), during their first two years at Cornell, but they may declare the CAPS major before taking either of these or any other CAPS courses. The other required courses are:

- All of the following language courses: CHIN 101-102, 201-202, and 301-302 or CHIN 306 (CAPS 306) or CHIN 109-110 for heritage learners or the equivalent for FALCON students (all in Ithaca or Washington before senior year).
- Two 400-level (or above) Chinese courses in Beijing and Ithaca.
- Two of the following lecture courses: CAPS 385/GOVT 385, CAPS 313/HIST 313, CAPS 314/HIST 314, CAPS 352/HIST 352, and CAPS 469/ECON 469.
- All of the following seminars: CAPS 300 and CAPS 500 (during fall of junior year at Cornell in Washington), CAPS 301 and CAPS 302 (during fall of senior year at Peking University), and CAPS 400 (during spring of senior year in Ithaca).
Students interested in the CAPS major should speak to the program director to arrange for a major advisor.


## Externships

CAPS majors hold externships in government, business, law, the media, museums, research institutions, non-governmental organizations, or other organizations during their semesters in Washington, D.C., and Beijing. They are encouraged to coordinate the two experiences.

## Honors

To become a candidate for honors, a CAPS major must maintain a grade average of $\mathrm{B}+$ and have approval for a senior essay proposal from a faculty advisor. During senior year, a CAPS honors student completes the research and writing of a senior essay by taking two tutorials, CAPS 401 in Beiping and CAPS 402 in Ithaca.

## Introductory Courses

CAPS 257(2570) China Encounters the World (also ASIAN 257[2257], HIST 257[2571]) © (HA-AS)
Fall. 4 credits. J. Chen.
This is a lecture and discussion course
focusing on how China has encountered the world since the 17 th century, with an emphasis on the late 19 th and 20 th centuries. In particular, it will analyze the age-old Chinese "Central Kingdom" conception and how the conception was challenged during modern times as the result of Western and Japanese incursion and China's inability to deal with the consequences of the incursion. It will further analyze the impact of the Chinese "victim mentality" in order to pursue a deeper understanding of why radical revolutions have dominated China's modern history. While the emphasis of this course is on China's external relations, foreign policy issues will be examined in the context of China's political, economic and social developments in broader terms. The course's purpose is not just to impart information but also to cultivate a basic understanding of the significance of the Chinese experience in the age of worldwide modernization. Grades in this class will be calculated on the basis of class participation, quizzes, midterm and final exams, and one essay assignment.

## CAPS 282(2827) China and the World

 (also GOVT 282[2827]) © (CA-AS)Spring. 4 credits. A. Carlson.
This course comes to terms with the dramatic rise of China by reviewing Chinese foreign policy since the establishment of the People's Republic of China. In particular, it concentrates on major developments during the 1980s and 1990s. Such a wide-ranging survey encompasses not only China's relations with its major bilateral partners but also its broader relationship with the international system.

## Courses in Ithaca

CHIN 101-102(1101-1102) Elementary Standard Chinese (Mandarin)
101, fall; 102, spring. 6 credits each semester.
For description, see CHIN 101-102 under "Asian Studies."

## CHIN 201-202(2201-2202) Intermediate

 Standard Chinese (Mandarin) 201, fall; 202, spring. 4 credits each semester.For description, see CHIN 201-202 under "Asian Studies."

## CHIN 301-302(3301-3302) High

 Intermediate Chinese301, fall; 302, spring. 4 credits each semester.
For description, see CHIN 301-302 under "Asian Studies."

CAPS 306(3060) Readings in Chinese History, Culture, Society (also CHIN 306[3306])
Spring. 4 credits. Z. Chen
For description, see CHIN 306.
[CAPS 352(3520) Twentieth-Century Asian-American Relations (also HIST 352[3520]) @ (HA)]

CAPS 385(3857) American Foreign Policy (also GOVT 385[3857])
Fall. 4 credits. P. Katzenstein.
For description, see GOVT 385.
CAPS 314(3140) U.S. Foreign Relations, 1914 to Present (also AM ST 312[3140], HIST 314[3140])
Spring. 4 credits. F. Logevall.
For description, see HIST 314.

## CAPS 400(4000) Senior Seminar on China's Foreign Relations <br> Spring. 4 credits. J. Chen.

[CAPS 402(4020) Honors Essay Tutorial]
CAPS 469(4690) China's Economy Under Mao and Deng (also ECON 469[4690])
Spring. 4 credits. T. Lyons.
For description, see ECON 469
Courses in Washington, D.C.
CAPS 300(3000) Seminar on American Relations with China (also HIST 339[3391])
Fall. 4 credits. R. Bush
A historical review of the fragile and volatile U.S.-China relationship from the opening by Richard Nixon in the early 1970s until the present. Several individual sessions will be led by current or former executive branch or congressional officials, business people, journalists, representatives of nongovernmental organizations and others who have worked in China or have participated in the making of U.S. policy toward China.

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CAPS 500(5000) Politics and Policy: Theory, Research, and Practice (also AM ST 501[4998], PAM 406[4998], GOVT 500[4998], ALS 500[4998])
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Fall and spring. 8 credits.
For description, see GOVT 500.

## CHIN 301(3301) High Intermediate

 ChineseFall. 4 credits.
For description, see CHIN 301 under "Asian Studies."

## Courses in Beijing

## [CAPS 301(3010) Seminar on China:

 Economy, Society, and CultureFall. 4 or 8 credits. Next offered 2008-2009. J. Chen.\}
[CAPS 401(4010) Honors Essay Tutorial
Fall. 4 credits. See J. Chen abour making arrangements with appropriate advisors. Next offered 2008-2009.
Using resources specifically available in China, this course combines lectures, guest lectures, field trips, and faculty-directed research projects to help the students achieve an indepth understanding of China's changing economy, society, and culture.]

## CHINESE

FALCON Program (Chinese)
See Department of Asian Studies.

## CLASSICS

C. Brittain, chair, F. M. Ahl, K. Bowes, K. Clinton, J. E. Coleman, G. Fine,
M. Fontaine, G. Holst-Warhaft, T. Irwin,
D. Mankin, S. Manning, A. Nussbaum, H. Pelliccia (director of undergraduate studies), P. Pucci, H. R. Rawlings III,
E. Rebillard (director of graduate studies),
A. Ruppel, J. Rusten, C. Schroeder, B. Strauss.

The Department of Classics at Cornell is one of the oldest in the country. It offers both the traditional core training in the languages, literature, philosophy, art, and history of ancient Greece and Rome, and also newer approaches developed from the comparative study of Mediterranean civilizations, peace studies, and feminist and literary theory. The broad range of instruction includes courses offered by professors with appointments in the Departments of History, Philosophy, Comparative Literature, History of Art, Linguistics, and Near Eastern Studies, and in the Programs of Archaeology, Medieval Studies, and Religious Studies.
The department offers a wide variety of classical civilization courses in English translation on such subjects as Greek mythology, ancient mystery religions, early Christianity, and Greek and Roman society; ancient epic, lyric, tragedy, comedy, satire, novels, and love-poetry; Periclean Athens, Republican Rome, the Roman Empire, and Plato, Aristotle, and Hellenistic philosophy. These courses are designed to introduce aspects of classical antiquity to the students with very divergent primary interests. Courses in art, archaeology, and dendrochronology also have wide appeal. These courses make use of the university's large collections of ancient coins and of reproductions of sculptures, inscriptions, and other ancient objects. For example, since 1976 over 500 Cornell students have worked in the Aegean Dendrochronology Project's laboratory, measuring the annual rings on thousands of samples of wood and charcoal, and using the rings to date structures as old as 7000 BC . In the summers selected students have participated in collecting trips around the eastern end of the Mediterranean (see web site at www.arts.cornell.edu/dendro). Students who wish to gain first-hand archaeological experience may also join one of several summer Cornell-sponsored field projects in Greece and Turkey.
The study of language is a vital part of classics. Offerings range from 100 -level classes designed to further the understanding of English through the study of the Latin and Greek sources of much of its vocabulary, to courses in linguistics on the morphology and syntax of the ancient languages, comparative grammar, and Indo-European (the reconstructed source of the family of languages that includes Greek, Latin, Sanskrit, and most modern European languages).
The core function of the department is the study of ancient Greek and Latin. Elementary Greek and Latin are taught in both twosemester courses and intensive summer
courses. (For students whose Latin is a bit rusty, the department also offers a rapid, onesemester review class.) Students with a more advanced knowledge of Greek or Latin can choose from a wide selection of courses, from intermediate language classes at the 200 level, which refresh and broaden knowledge of syntax and vocabulary, to graduate and faculty reading groups. All of these courses concentrate on exciting literary texts, whether the poems of Catullus and Virgil, or the dialogues of Plato and Xenophon, at the 200 level, or, in the advanced reading groups, the latest papyrological discoveries, such as the "new" fragments of Empedocles' cosmic poem or the "new" epigrams of Posidippus.
The primary purpose of language instruction is to make possible the study at first hand of the extraordinary range of powerful and challenging ideas embodied in Greek and Latin texts. The department offers undergraduate and graduate seminars on literary, linguistic, historical, and philosophical topics, studied through the Greek and Latin works of authors from Homer (probably from the eighth century BCE ) to Boethius (sixth century CE ), and occasionally from later writers such as Dante, Petrarch, or Milton. The department strives to adapt its program to the needs of individual students from all disciplines.

## Majors in Classics

The major in Classics offers four tracks, which are Greek, Latin, classics, and classical civilization. Only classes passed with a C- or better may be applied to the classics major.

## Classics

The classics track requires: (1) six courses in Greek and Latin numbered 201 or above; and (2) three courses in related subjects selected in consultation with the student's departmental advisor (see below). Classics majors are required to take a minimum of two 300 -level courses in one language and one 300 -level course in the other.
Students who are considering graduate study in classics are strongly advised to complete the classics major.

## Greek

The Greek track requires: (1) GREEK 104; (2) five courses in Greek numbered 201 or above; and (3) three courses in related subjects selected in consultation with the student's departmental advisor (see below). The courses in Greek must include at least three at the 300 level.

## Latin

The Latin track requires: (1) LATIN 109 or 205; (2) five courses in Latin numbered 206 or above; and (3) three courses in related subjects selected in consultation with the student's departmental advisor (see below). The courses in Latin must include at least three at the 300 level.

## Classical Civilization

The classical civilization track requires: (1a) two 200-level courses in either ancient Greek or Latin or (1b) one course at the 200-level in ancient Greek and Latin; (2) CLASS 211, 217 or HIST 265; CLASS 212 or HIST 267 and 268; and one course at the 200-level in ancient Greek or Roman material culture; (3) six
additional courses in classical civilization, classical archaeology, ancient history, ancient philosophy, ancient Greek or Latin (at 200level or above), or related subjects (this last may number up to two).

## Related Subjects

Classics is an interdisciplinary field concerned with the study of Mediterranean civilizations from the 15 th century $\operatorname{BCE}$ to the sixth century CE. Subjects in the field include Greek and Latin language, literature, and linguistics; ancient philosophy, history, archaeology, and art history; papyrology, epigraphy, and numismatics. In addition to the required courses in language and literature, the majors include a requirement for related courses intended to give breadth and exposure to the other disciplines within the field and to enrich the student's study of classical languages and literature. Since the influence of the Greek and Roman world extended far beyond antiquity, a related course may focus on some aspect of the classical tradition in a later period. Students select related courses in consultation with their departmental advisors or the director of undergraduate studies.

## Honors

Candidates for the degree of bachelor of arts with honors in classics, Greek, Latin, or classical civilization must fulfill the requirements of the appropriate major and complete the two-semester honors course, CLASS 472. (Credit for the honors course may be included in the credits required for the major.) Candidates for honors must have a cumulative average grade of 3.0 and an average of 3.5 in their major. Students choose an honors advisor by the end of their sixth semester, in consultation with the
departmental honors committee or the DUS. By the second week of their seventh semester, they submit an outline of their proposed research to their advisor and the committee. The thesis is written in the second semester of the course, under the supervision of the student's honors advisor. The level of honors is determined by the committee, in consultation with students' advisors. Copies of successful honors theses are filed with the department. Further details about this program are provided in the brochure Guidelines for Honors in Classics, available in the department office, 120 Goldwin Smith Hall, or on the department weh page: www.arts.cornell.edu/ classics/honors.asp.

## Independent Study

Independent study at the 300 level may be undertaken by undergraduates upon
completion of one semester of work at the 300 level in the relevant field and only with the permission of the director of undergraduate studies.

## Study Abroad

Cornell is associated with four programs that provide opportunities for summer, semester, or yearlong study abroad in Greece and Italy.

The American School of Classical Studies at Athens offers a summer program for graduate students and qualified undergraduates; College Year in Athens offers semester-long courses (consult Cornell Abroad for details). The Intercollegiate Center for Classical Studies in Rome provides semester-long courses in Latin, Greek, ancient history, art, archaeology, and Italian; the American Academy in Rome offers both full-year and summer programs for qualified graduate students. The Department of Classics awards several travel grants each year for graduate students from the Townsend Memorial Fund; undergraduates are eligible for the Caplan Travel Fellowships (see "Caplan Fellowships," below). Detailed information on these programs is available in the department office, 120 Goldwin Smith Hall.

## Summer Support for Language Study

The Department of Classics has at its disposal resources to assist students who wish to enroll in intensive Latin or Greek in the Cornell summer session. These courses are designed to enable students to enter second-year Latin or Greek the following fall. Preference is given to undergraduate majors in classics and other students needing Latin or Greek for completion of their majors or graduate programs; dyslexic students are accorded additional preference. Two different kinds of support are available: (1) The KandersTownsend Prize Fellowship provides a $\$ 3,725$ stipend to cover living expenses and full tuition for either CLASS 103 or 107, and is open only to freshman or sophomore classics majors (or potential classics majors) who have already begun one classical language and wish to start the other in the summer. (2) Classics department tuition support is open to Cornell undergraduate and graduate students and provides some level of tuition support, up to the full amount; no stipend for living expenses is offered. Applications are due to the chair of the Department of Classics by March 31. See also "Caplan Fellowships," below.

## Placement in Greek and Latin

Placement of first-year undergraduates in Greek and Latin courses is determined by examinations given by the Department of Classics during orientation week. For details concerning these examinations, contact the director of undergraduate studies.

## Satisfying the College Language Requirements with Ancient Greek or Latin

Greek: option 1 is satisfied by taking GREEK 201 or above. Option 2 is satisfied by taking either (a) GREEK 101, 102, and 104 or (b) GREEK 103 and 104. (GREEK 103 counts as two courses. Although credits for 103 and 104 add up to only 9 , this sequence does satisfy Option 2 of the college's language requirement).

Latin: option 1 is satisfied by taking LATIN 205 or above. Option 2 is satisfied by taking either (a) LATIN 105, 106, and 109 or (b) LATIN 107 and 109. (LATIN 107 counts as two courses. Although credits for 107 and 109 add up to only 9, this sequence does satisfy Option 2 of the college's language requirement.) The sequence Latin 108-109 does not satisfy Option 2. Students can place into LATTN 205 with an A- or better in LATIN 106, 107 or 108. Upon completing 205, they satisfy Option 1.

LATIN 108 overlaps with LATIN 106 therefore cannot be taken (or counted toward the degree) after completing LATIN 106 or 107.

## First-Year Writing Seminars

The department offers first-year writing seminars on a wide range of classical and medieval topics. Consult John S. Knight Writing Seminar Program brochures for times, instructors, and descriptions.

## Caplan Fellowships

The Harry Caplan Travel Fellowships are awarded annually to one or two outstanding juniors by the College of Arts and Sciences for summer travel or projects in Europe or the Near East. Interested juniors should consult the director of undergraduate studies.

## Classical Civilization

CLASS 211(2601) The Greek Experience \# (CA-A5)
Fall. 3 credits. Limited to 50 students. F. Ahl.

Introduction to the literature and thought of ancient Greece. Topics include epic and lyric poetry, tragedy and comedy, and historical, political, philosophical, and scientific writings. Some attention is also given to the daily life of ordinary citizens, supplemented by slides of ancient art and architecture.

## CLASS 212(2620) The Roman Experience

 \# (CA-AS)Spring. 3 credits. D. Mankin.
Introduction to the civilization of the Romans as expressed in their literature, religion, and social and political institutions.

## CLASS 216(2616) Small Wars in Greece and Rome (also HIST 206[2061]) \# (HA-AS)

Fall. 3 credits. B. Strauss.
For description, see HIST 206.
CLASS 217(2603) Initiation to Greek Culture \# (LA-AS)
Fall. 4 credits. Limited to 18 students. Intended especially for freshmen. Students must apply in writing to chair, Department of Classics, 120 Goldwin Smith Hall.
P. Pucci and C. Schroeder.

Knowledge of Greek or Latin is not necessary, since all texts are in translation. What is necessary is the willingness to participate in three one-hour seminars each week and also a supplementary one- or two-hour session, during which the class participates in workshops with specially invited guests. This course covers a wide range of Greek literary and philosophical works as well as modern critical and philosophical writings on the Greeks. The focus throughout is on the status of language, the many forms of discourse that appear in the literature, and the attempts the Greeks themselves made to overcome the perceived inadequacies and difficulties inherent in language as the medium of poetry and philosophy. The course inquires into the development of philosophy in the context of a culture infused with traditional, mythological accounts of the cosmos. It asks how poetic forms such as tragedy responded to and made an accommodation with philosophical discourse while creating an intense emotional effect on the audience; how the first historians, using literary and philosophical discourse, created space for their own inquiry; and discusses how these issues persist and are formulated in our own thinking.

CLASS 223|2641) The Comic Theater (also THETR 223[2230], COM L 223[2230] ${ }^{\text {\# (LA-AS) }}$
Spring. 3 credits. J. Rusten.
The origins of comic drama in ancient Greece and Rome, and its subsequent incarnations especially in the Italian renaissance
(Commedia erudita and Commedia dell'arte), Elizabethan England, 17th-century France, the English Restoration, and Hollywood in the thirties and forties. Chief topics include the growth of the comic theatrical tradition and conventions; techniques and themes of comic plots (trickster, parody, farce, caricature); and the role of comedy in society. All readings in English.
CLASS 226(2646) Atheism Then and Now (also RELST 226[2646]) " (KCM-AS)
Spring. 3 credits. J. Coleman.
Introduction to atheism, defined as the belief that the entities commonly called gods have no real existence. Begins with the origins of western atheism in ancient Greece. Students then read and discuss a selection of later writings illustrating the historical development of atheism and its relationship with deism, naturalism, and modern science. Students are encouraged to make critical use of some of the extensive resources available on the web at atheist, freethinker, and secular humanist sites. Particular themes considered in class discussions and student presentations include: faith vs. reason as means of knowledge; scientific evidence for and against the existence of divinity; the comparison of nonreligious moral and ethical codes with religious ones; atheist critiques of historical Christian attitudes toward science and slavery; the problem of the existence of multiple exclusive religions; and the positive aspects of atheism. Students must give two oral presentations of particular questions chosen in consultation with the instructor that are subsequently written up as 12-page papers; two in-class preliminary exams and a final exam.

## [CLASS 229|2650) War and Peace in Greece and Rome (also HIST 256[2560]) \# (HA-AS)

Spring. 4 credits. Next offered 2008-2009. B. Strauss.

For description, see HIST 256.]

## CLASS 231(2661) Ancient Philosophy

 (also PHIL 211[2110]) \# (KCM-AS)Fall. 4 credits. G. Fine.
For description, see PHIL 211.

## CLASS 236(2604) Greek Mythology \# (LA-AS)

Summer and fall. 3 credits. Limited to 50 students in summer; 200 in fall. D. Mankin. Survey of the Greek myths, with emphasis on the content and significance of the myths in Mediterranean society, including the place of myth in Greek life and consciousness; the factors and influences involved in the creation of myths; and the use of myths for our understanding of Greek literature, religion, and moral and political concepts.

## CLASS 265(2650) Ancient Greece from

 Homer to Alexander the Great (also HIST 265[2650]) \# (HA-AS)Fall. 4 credits. Open to freshmen.
B. Strauss.

For description, see HIST 265.
[CLASS 267(2683) History of Rome I (also HIST 267[2670]) \# (HA-AS)
Fall. 4 credits. Open to freshmen. Next offered 2009-2010. E. Rebillard.
Rome's beginnings and the Roman Republic. A general introduction to Roman history from the foundation of Rome in the middle of the eighth century $B C$ to the end of the Republic ( 31 BC ). The course is the first part of a twosemester survey of Roman history up to the deposition of the last Roman emperor in the West (AD 476). Examines the rise of Rome from a village in Italy to an imperial power over the Mediterranean world and consider the political, economic, and social consequences of that achievement.]

## [CLASS 268(2684) History of Rome II (also HIST 268[2671]) \# (HA-AS)

Spring. 4 credits. Open to freshmen. Next
offered 2009-2010. E. Rebillard.
Roman History II: the Roman Empire. This course, the second part of a two-semester survey of Roman history, examines the history of the Roman Empire from the beginnings of the Augustan Principate ( 31 BC ) to the fall of the Western Empire in the fifth century (AD 476). Students consider the creation and development of the imperial regime, explore the various types of challenges (military, cultural, and religious) to the hegemony of the Roman state, and try to understand the transformations of Roman society and culture down to the middle of the fifth century AD .]

## [CLASS 332(3644) Sages and Saints/

 Ancient World (also HIST 338[3644], RELST 332[3644]) \# (HA-AS)Spring. 4 credits. Next offered 2008-2009. E. Rebillard

This seminar considers the continuities and changes in the representations of the holy man, from the sages of classical antiquity to the saints of early Christianity.]
CLASS 340(3664) Aristotle (also PHIL 310[3100]) \# (KCM-AS)
Spring. 4 credits. C. Shields.
Aristotle's practical and productive works (his Ethics, Politics, Rbetoric, and Poetics), with attention to their grounding in his theoretical works.
[CLASS 341(3661) Hellenistic Philosophy (also PHIL 308[3080]) \#(KCM-AS)
Fall. 4 credits. Prerequisite: CLASS 231 or philosophy course. Next offered 20092010. C. Brittain.

Topics include scepticism, Stoic and Epicurean psychology of action, theories of language, concept development and content, determinism and responsibility, virtue ethics, and scientific epistemologies.]
[CLASS 345(3645) The Tragic Theater (also COM L 344[3440], THETR 345[3450]) \# (LA-AS)
Fall. 4 credits. Limited to 40 students. Next offered 2009-2010. F. Ahl.
Tragedy and its audiences from ancient Greece to modern theater and film. Topics: origins of theatrical conventions; Shakespeare and Seneca; tragedy in modern theater and film. Works studied include: Aeschylus' Agamemnon; Sophocles' Oedipus Tyrannus, Philoctetes; Euripides' Alcestis, Helen, Iphigeneia in Aulis, Orestes; Seneca's Thyestes, Trojan Women; Shakespeare's Julius Caesar, Titus Andronicus, Othello; Strindberg's The Father, Dürenmatt's The Visit; Bergman's Seventh Seat, Cacoyannis' Iphigeneia.]

CLASS 348(3648) Aeneid: Influence of the Epic (also COM L 346[3460]) \# (LA-AS)
Spring. 4 credits. F. Ahl.
A careful reading of the Aeneid in translation with discussion of its literary predecessors, contemporary politics and philosophy, and a discussion of its place in the western literary tradition from late antiquity to modern times. Every effort will be made to accommodate students interested in Virgil's influence on Dante, Milton, Camoens, and Eliot.

## CLASS 362(3662) History of Battle (also

 HIST 363[3631])Spring. 4 credits. B. Strauss/Baptiste.
For description, see HIST 363.

## [CLASS 382(3642) Greeks, Romans, and

 Victorians " (LA-AS)Spring. 4 credits. Next offered 2008-2009. F. Ahl.

Explores how 19th-century (and especially
Victorian English and Irish) poets, dramatists, and to a lesser extent, novelists, present Greco-Roman antiquity.]

## CLASS 387(3686) Independent Study in

 Classical Civilization, Undergraduate LevelFall and spring. Up to 4 credits.
[CLASS 405(4665) Augustine's Confessions (also RELST 405[4665]) (KCM-AS)
Spring. 4 credits. Next offered 2008-2009. C. Brittain.

This course studies Augustine's conception of the mind, focusing on his analysis of memory, desire, and understanding and its relation to Greek and Latin philosophical antecedents.]
[CLASS 436(4320) Topics in Ancient Greek History (also HIST 432/633[4320/6330])
Spring. 4 credits. Limited to 15 students. Next offered 2008-2009. Staff.
Topic: Aristotelian Constitution of Athens.]
[CLASS 441(4410) Fourth Century and Early History of Greece (also HIST 441[4411]) \# (HA-AS)
Fall. 4 credits. Undergrads and grads will meet for two hours; grad students must stay for one additional hour. Next offered 2009-2010. B. Strauss.
For description, see HIST 441.]
CLASS 448(4648) Platonism (also PHIL 413[4130]) \# (KCM-AS)
Spring. 4 credits. C. Brittain.
[CLASS 475(4625) The Christianization of the Roman World, 300 to 600 CE (also RELST 475[4625], HIST 483[4831]) \# (HA-AS)
Fall. 4 credits. Next offered 2009-2010.
E. Rebillard.

Christianization of the Roman world is
concerned by the impact of Christianity on the late antique society and by the resistance and/ or persistence of the old belief and practices.]

## CLASS 545(7345) Graduate TA Training

Fall and spring. 1 credit. Staff.
Pedagogical instruction and course
coordination. Requirement for all graduate student teachers of CLASS 105-106 and

## Classics first-year writing seminars.

## [CLASS 632(7682) Topics in Ancient History (also HIST 630[6300])

Fall. 4 credits. Next offered 2009-2010.
Staff.
Topic: TBA.]

## [CLASs 638(7686) Anclent Warfare (also

 HIST 636[6360])Spring. 4 credits. Next offered 2009-2010. B. Strauss.

A survey of recent theories, methods and publications as well as readings in Greek and Latin. At least one course in ancient history and permission of the instructor, reading knowledge of Greek or Latin.]

## CLASs 667(7667) Seminar In Ancient

History: Spartacus (also HIST 667 [6671])
Spring. 4 credits. B. Strauss.
For description, see HIST 667.

## CLASs 673(7173) Ancient Philosophy

 (also PHIL 611[6110])Fall. 4 credits. C. Shields.
For description, see PHIL 611.

## CLASS 700(9900) Doctoral Dissertation

 ResearchFall and spring. 0 credits. Letter grades only. Staff.
CLass 70317690) Independent Study for Graduate Students In Classical Clvillization
Fall and spring. Up to 4 credits.

## Greek

## GREEK 101(1101) Elementary Anclent

 Greek IFall. 4 credits. J. Rusten.
Introduction to Attic Greek. Designed to enable the student to read the ancient authors as soon as possible.

## OREEK 102(1102) Elementary Ancient Oreek II

Spring. 4 credits. Prerequisite: CLASS 101 or equivalent. H. Pelliccia.
Continuation of CLASS 101, prepares students for CLASS 104.

## OREEK 103:1103) Intensive Greek

Summer. 6 credits. Staff.
Intensive introduction combining the fundamentals of ancient Greek grammar with readings from a variety of classical authors in the original Greek. Prepares students in a single semester for CLASS 104.

## GREEK 104(1105) Elementary Anclent

 Oreek III \#Fall. 3 credits. Prerequisites: CLASS 102,
103, or placement by departmental exam. H. Pelliccia.

Introduces students to reading Greek literary texts (Xenophon's Anabasis) and a dialogue of Plato. Covers complex syntax and reviews the grammar presented in CLASS 102 or 103.
[OREEK 201(2101) Greek Prose \# (LA-AS)
Spring. 3 credits. Satisfies Option 1.
Prerequisite: CLASS 104. Next offered
2008-2009. H. Rawlings.]
[CREEK 202(2105) The Greek New Testament (also RELST 202[2105]) \# (LA-AS)
Spring. 3 credits. Prerequisites: at least one year of ancient Greek (CLASS 101-103 or 104) or permission of instructor. Next offered 2008-2009. E. Rebillard. Sequel to NES 229/CLASS 215. Selections in Greek from all four gospels, the letters of Paul, and Acts.]
CREEK 203(2103) Homer \# (LA-AS)
Spring. 3 credits. Satisfies Option 1.
Prerequisite: CLASS 104. A. Nussbaum.

Readings in the Homeric epic.
[OREEK 204(2104) Euripides: Alcestis \# (LA-AS)
Spring. 3 credits. Satisfies Option 1. Next offered 2009-2010. Staff.]
[GREEK 301(3101) Greak Epic \# (LA-AS) Spring. 4 credits. Satisfies Option 1. Prerequisite: one 200 -level Greek course. Next offered 2009-2010. P. Pucci.
Undergraduate seminar.]
[GREEK 302(3102) Greek Historiography and Oratory " (HA-AS)
Fall. 4 credits. Satisfies Option 1.
Prerequisite: one 200 -level Greek course. Next offered 2009-2010. P. Pucci.
Undergraduate seminar.]

## OREEK 303(3103) Undergraduate

 Seminar: Greek Drama (LA-AS)Spring. 4 credits. Satisfies Option 1.
Prerequisite: one 200-level Greek course J. Rusten.
Topic: Aristophanes.
GREEK 304(3104) Greek Philosophy and Rhetoric (LA-AS)
Fall. 4 credits. Satisfies Option 1.
Prerequisite: one 200-level Greek course. H. R. Rawlings.

Undergraduate seminar. Topic: Greek rhetoric.
We will read speeches by several Greek orators.

## OREEK 385(3185) Independent Study in

 Greek, Undergraduate LevelFall and spring. Up to 4 credits.
Prerequisite: permission of DUS in the case of documented schedule conflict. Staff.
[GREEK 417(4101) Advanced Readings in Greek Literature " (LA-AS)
Fall. 4 credits. Next offered 2008-2009. Staff.]

GREEK 605-606(7105-7106) Graduate Survey of Greek Literature
605 , fall; 606 , spring. 4 credits each
semester. Prerequisite: linguistic proficiency
to be determined by instructor. Staff.
Survey of Greek literature in two semesters. 605: Greek literature from Homer to the midfifth century. 606: Greek literature from the late fifth century to the Empire.

GREEK 611(7111) Greek Philosophical Texts (also PHIL 411[4110])
Fall and spring. Up to 4 credits.
Prerequisites: knowledge of Greek and permission of instructor. C. Shields.
Readings of Greek philosophical texts in the original.
GREEK 671(7171) Graduate Seminar in Greek
Fall. 4 credits. P. Pucci.
Topic: The Late Euripides.

## GREEK 672(7172) Graduate Seminar In Greek (also HIST 662[6620]) <br> Spring. 4 credits. F. Ahl.

Topic: Sophocles.
GREEK 701(7910) Independent Study for Graduate Students in Greek
Fall and spring. Up to 4 credits. Was CLASS 701-702.

## Latin

LATIN 105(1201) Elementary Latin I
Fall. 4 credits. Staff.
Introductory course designed to prepare
students to start reading Latin prose at the end
of a year. The class moves swiftly and includes extensive memorization of vocabulary and paradigms; study of Latin syntax; and written homework, quizzes, tests, and oral drills.

## LATIN 106(1202) Elementary LatIn II

 Spring. 4 credits. Students may not receive credit for both LATIN 106 and LATIN 108. Students should be ready for LATIN 109 by the end of the course, but may take LATIN 205 if they pass with A- or better.Prerequisite: 105 or equivalent. Staff.
Continuation of CLASS 105, using readings
from various authors; prepares students for CLASS 109.

## LATIN 107(1203) IntensIve Latin

Summer. 6 credits. Students must register for CLASS 107 and 107.1. Students may not receive credit for both LATIN 106 and LATIN 108. Staff.
Intensive introduction that quickly instills the essentials of Latin grammar before progressing to readings in the original Latin. Prepares students in a single semester for CLASS 109.

## LATIN 108(1204) Latin in Review

Fall. 4 credits. Students may not receive credit for both LATIN 106 and LATIN 108. Prerequisite: placement by departmental examination. A. Ruppel.
Designed to accommodate students who have had some Latin, but are insufficiently prepared to take 106. It begins with review of some material covered in 105 and then continues with second-semester Latin material (106). The class moves swiftly and includes extensive memorization of vocabulary and paradigms; study of Latin syntax; and written homework, quizzes, tests, and oral drills. Students should be ready for LATIN 109 by the end of the course, but may take LATTN 205 if they pass with A- or better.
LATIN 109(1205) Elementary Latin III Fall and spring. 3 credits. Prerequisites: CLASS $106,107,108$ or placement by departmental exam. Fall, J. Rusten; spring, A. Ruppel.

Introduces students to reading a literary Latin text (Cicero's Speech for Archias and one other). Covers complex syntax and reviews the grammar presented in CLASS 106, 107, or 108.

## LATIN 205(2201) Latin Prose " (LA-AS)

 Fall and spring. 3 credits. Satisfies Option 1. Prerequisite: CLASS 109 or grade of Aor above in CLASS 106, 107, 108 orplacement by departmental exam. Fall,
C. Brittain; spring, M. Fontaine.

Fall: Cicero. Spring: Plautus.

## LATIN 206(2202) Ovid: Erotic Poetry \#

 (LA-AS)Spring. 3 credits. Satisfies Option 1.
Prerequisites: CLASS 109, 205, or
placement by departmental exam. D. Mankin.

Ovid's erotic poetry is relatively easy to translate but rich in its literary structure and influence.
[LATIN 207(2203) Catullus \# (LA-AS)
Fall. 3 credits. Satisfies Option 1.
Prerequisite: CLASS 109. Next offered 2008-2009. Staff.
Aims to present the poems of Catullus within their cultural and historical context. The poems are read and translated, and their significance both individually and as products of Late Roman Republican culture discussed in class. Selections from the works of Catullus's contemporaries are assigned in translation.J

## [LATIN 208(2204) Roman Drama " (LA-

 AS)Spring. 3 credits. Satisfies Option 1
Prerequisite: CLASS 109. Next offered 2008-2009. Staff.
Topic: TBA.]

## [LATIN 209(2205) Virgil \# (LA-AS)

Spring. 3 credits. Satisfies Option 1.
Prerequisite: CLASS 109. Next offered 2008-2009. Staff.]

## [LATIN 210(2206) Roman Letters " (LA-

 AS)Spring. 3 credits. Satisfies Option 1.
Prerequisite: CLASS 109. Next offered 2008-2009. Staff.
Topic: TBA.]
[LATIN 306(3201) Roman Epic \# (LA-AS)
Spring. 3 credits. Satisfies Option 1
Prerequisite: 200-level Latin. Next offered 2008-2009 P. Pucci.
Undergraduate seminar.]

## [LATIN 307(3202) Roman Historiography

 (LA-AS)Fall. 4 credits. Satisfies Option 1.
Prerequisite: one semester of 200 -level Latin or permission of instructor. Next offered 2008-2009. H. Rawlings. Undergraduate seminar. Close reading of several Roman historians, particularly Sallust and Livy. Students will focus upon Latin prose style, Roman historical traditions and historiographical analysis: source criticism, study of narrative technique and the rhetoric of speeches, and appreciation of irony and implied meaning. The course will also touch upon Greek historiographical models.]

## LATIN 308(3203) Roman Poetry (LA-AS)

Fall and spring. 3 credits. Satisfies Option

1. Prerequisite: one 200 -level Latin course. Fall, D. Mankin; spring, M. Fontaine.
Undergraduate seminar. Fall topic: Virgil, Georgics. Spring topic: Catullus.

## [LATIN 309(3204) Roman Prose \# (LA-AS)

Fall. 3 credits. Satisfies Option 1.
Prerequisite: one 200-level Latin course.
Next offered 2008-2009. Staff.
Undergraduate seminar.]

## [LATIN 315(3215) Imperial Latin

Spring. 4 credits. Satisfies Option 1.
Prerequisite: one semester of 200 -level
Latin. Next offered 2009-2010. Staff.
Undergraduate Latin seminar. Topic: TBA.]

## [LATIN 317(3217) Latin Prose

Composition " (LA-AS)
Fall. 4 credits. Satisfles Option 1. Prerequisite: one semester of 200 -level Latin. Next offered 2008-2009
A. Nussbaum.]

## LATIN 386/3286) Independent Study in

 Latin, Undergraduate LevelFall and spring. Variable to 4 credits.
Prerequisite: permission of DUS in the case of documented schedule conflict. Staff.

## [LATIN 411 (4201) Advanced Readinge in Latin Literature \# (LA-AS)

Fall. 4 credits. Next offered 2008-2009. Staff.
Topic: TBA.]

## LATIN 412(4202) Advanced Readings In Latin Literature * (LA-AS) <br> Spring. 4 credits. H. Pelliccia.

Topic: Cicero, Speeches against Verres.

LATIN 413(4213) Survey of Medeval Latin Literature (also MEDVL 413/613[4103/6103], LATIN 613[7213])
Fall. 3 credits. C. Ruff.
For description, see MEDVL 413.

## Latin 414(4216) Advanced Latin Prose

 Composition \# (LA-AS)Fall. 4 credits. Prerequisite: graduate standing; undergraduates who have completed LATIN 317 and have permission of instructor. F. Ahl.

## LATIN 612(7212) Latin Philosophical

 Texts (also PHILRELST $410[4100]$ )Fall. Up to 4 credits. Prerequisites: knowledge of Latin and permission of instructor. S. MacDonald.

## LATIN 613(7213) Survey of Medieval

 Latin Literature (also MEDVL 413/613[4103/6103], LATIN 613[7213])Fall. 3 credits. C. Ruff.
For description, see MEDVL 413.
[LATIN 625-626(7205-7206) Graduate Survey of Latin Literature
625, fall; 626, spring. 4 credits each
semester. Prerequisite: linguistic proficiency to be determined by instructor. Next
offered 2008-2009. Staff.
Survey of Latin literature in two semesters.]

## [LATIN 679(7271) Graduate Seminar in

 LatinFall. 4 credits. Next offered 2008-2009. Staff.]

## [LATIN 680(7272) Graduate Seminar in Latin

Spring. 4 credits. Next offered 2009-2010. Staff.]
LATIN 702(7920) Independent Study for Graduate Students in Latin
Fall and spring. Up to 4 credits. Staff.

## Classical Art and Archaeology

CLASS 220(2700) Introduction to Art History: The Classical World (also ART H 220[2200]) \# (HA-AS)
Fall. 4 credits. Each student must enroll in a sec. K. Bowes.
Overview of the art and archaeology of the Greek and Roman world.
[CLASS 221(2726) Minoan-Mycenaean Art and Archaeology (also ARKEO 221[2726]) \# (CA-AS)
Spring. 3 credits. Next offered 2008-2009. J. Coleman.

The birth of civilization in Greece and the Aegean islands during the Bronze Age. The main focus is on the rise and fall of Minoan Crete and Mycenaean Greece, with consideration given to the nature and significance of Aegean interactions with Egypt, the Near East, and Anatolia.]

## [CLASS 227(2727) Art and Archaeology

 in the Ancient Mediterranean World (also ARKEO 228[2727], ART H 227[2227]) \# (HA-AS)Fall. 4 credits. Next offered 2009-2010.
S. Manning.

This course introduces students to a selection of the major themes and issues in the archaeology and art of the ancient Mediterranean region from the later prehistoric period (the Bronze Age) through to the Roman era. Emphasis is placed on: (i) study
of some key evidence and issues from the various periods/contexts; (ii) the history of the field (temporal and intellectual) and the impact of this on our experience of the past, and (iii) placing material culture into a social and historical context and analysis. The course is divided into the following sections: (a) discovery of the past and the invention of Classical art and archaeology, (b) prehistoric art, archaeology and material culture studies, (c) Greek art and archaeology, (d) Roman art and archaeology.]

## [CLASS 240(2725) Greek Art and Archaeology " (CA-AS)

Spring. 3 credits. Next offered 2009-2010. Staff.
Introduction to the material culture of Greece from the Early Iron Age to the coming of the Romans (ca. 1000 BC to 31 BC ). Focuses not only on famous monuments such as the Parthenon but also on the evidence for daily life and for contact with other civilizations of the Mediterranean. A critical attitude is encouraged toward the interpretation of archeological remains and toward contemporary uses (and misuses) of the past.]

## [CLASS 321[3721] Mycenae and Homer

(also ARKEO 321[3721]) (HA-AS)
Fall. 4 credits. Prerequisite: at least one
course in archaeology, classics, or history
of art. Next offered 2008-2009. J. Coleman Studies the relationship between the Mycenaean period of Greece (known primarily from archaeology) and the Homeric Iliad and Odyssey. Topics include Mycenaean architecture, burial customs, kingship, and military activities; the reasons for the collapse of the Bronze Age palatial economies; the archaeological evidence for society in the "Dark Ages" that followed; the writing systems of Mycenaean Greece (Linear B) and the Iron Age (the Semitic/Greek alphabet); the nature of the Homeric poems and their value as historical sources.]

## [CLASS 322(3722] Greeks and Thelr

 Nelghbors (also ART H 328[3228]) \# (HA-AS)Fall. 4 credits. Prerequisite: CLASS 220 or 221, or permission of instructor. Next offered 2009-2010. J. Coleman.
Studies the archaeological and other evidence for the interaction between Greek civilization and the peoples of the eastern and western Mediterranean from the 13 th to the fourth centuries BCE, Focuses on Greek relationships with Egypt, Phoenicia, Cyprus, Anatolia, and Italy in the post-Bronze Age period.]

## CLASS 323(3723) Aegean Archaeology

 [also ARKEO 323[3223], ART H 333[3260]) ( (HA-AS)Fall. 4 credits J. Coleman.
The archacology and art of Greece, Crete, the Cycladic Islands, and Western Anatolia from the beginnings of settled life in the Neolithic period to the end of the Bronze Age (ca. $1200-1100$ bce). Subjects include the origins of Neolithic culture, possible Indo-European migrations in the Chalcolithic or Early Bronze Age, the flourishing of Early Bronze Age culture in the mid-third millennium bce, the rise and development of Minoan Crete and the Mycenaean Greek mainland, the significance of the volcanic eruption of Thera, what we can learn from Mycenaean Greek (Lin B), the history and mythology of Troy and interactions between the Greek world and the Eastern Mediterranean.
[CLA8s 325(3725) Oreek Vase Painting (also ART H 325[3205]) \# (LA-AS)
Spring. 4 credits. Next offered 2008-2009. Staff.
For description, see ART H 325.]
CLAS8 330/3750) Introduction to Dendrochronology (also ARKEO 309[3090], ART H 309[3250]) \# (HAA8)
Fall. 4 credits Limited to 10 students. Prerequisite: permission of instructor. Letter grades only. S. Manning.
Mediterranean and New World applications to archaeology, art-history and environment. Introduction and training in dendrochronology and its applications through participation in a research project dating ancient to modern tree-ring samples from both the Mediterranean and the Upper New York State region. Supervised reading, laboratory/project work, fieldtrip(s) in local area. A possibility exists for summer fieldwork in the Mediterranean.

## CLASs 331(3731) Archaeology/Ancient

 Mediterranean ReligionFall. 4 credits. K. Bowes.
This course will survey the material remains of religious practices in the ancient
Mediterranean from the Greek Dark Ages to early Christianity. Organized chronologically and thematically, the course will consider issues like the function of animal sacrifice, the homes for the gods (temples, churches, etc), religion and the city, ruler cult, funerary rites, home-based rituals, and "alternative" cults. We will pay particular attention to the methodological issues raised by the archaeology of religion and how our own modern assumptions about religion impact our study of the ancient world.
CLASS 336(3736) The Archaeology of the Clity of Rome (also ART H 320[3210])
Spring. 4 credits. A. Alexandridis.
For description, see ART H 320.

## CLASS 337(3727) Iconography of Greek

 Myth (also ART H 330[3230])Spring. 4 credits. A. Alexandridis.
For description, see ART H 330.

## CLAS\$ 344(3644) Hellenistic Culture

 (also ART H 324[3224])Fall. 4 credits. A. Alexandridis.
For description, see ART H 324.
[CLASS 434(4734) The Rise of Classical Greece (also ARKEO 434[4734]) \# (HA-AS)
Spring. 4 credits. Recommended: CLASS 220 or 221 , ART H 220 or 221 , or permission of instructor. Next offered 2008-2009. Staff.
For description, see ARKEO 434.]
[Class 435(4735) Seminar on Roman Art and Archaeology (also ARKEO 435[4207]) " (CA-AS)
Spring. 4 credits. Prerequisite: permission of instructor. Next offered 2008-2009. Staff.
For description, see ART H 427.]
CLASS 446/646(4746/7746) Topics in Classical Archaeology
Spring. Up to 4 credits. K. Bowes. Topic: The Late Roman Countryside.

## [CLASS 629(7729) The Prehistoric

Aegean (also ARKEO 629[7729])
Fall. 4 credits. Next offered 2008-2009.
J. Coleman.

Seminar with focus on the Aegean and neighboring regions in the Neolithic and Early Bronze Ages.]

## CLASS 630(7750) Seminar in Classical

 Archaeology (also ARKEO 520[5200], ART H 520[5200])Fall. 4 credits. A. Alexandridis
For description, see ARKEO 520.

## Class 637(7737) Metamorphosis (also ART H 435[4235])

Fall. 4 credits. A. Alexandridis.
For description, see ART H 435.

## CLASS 642(7742) Research Methods and

 ArchaeologySpring. 4 credits. S. Manning.
CLASS 705(7970) Independent Study for Graduate Students in Classical Archaeology
Fall and spring. Up to 4 credits. Staff.

## Greek and Latin Linguistics

[GREEK 421(4451) Greek Comparative Grammar (KCM-AS)
Spring. 4 credits. Prerequisite: thorough
familiarity with morphology of classical
Greek. Next offered 2008-2009.
A. Nussbaum.

The prehistory and evolution of the sounds and forms of ancient Greek as reconstructed by comparison with the other Indo-European languages.]

LATIN 422(4452) Latin Comparative Grammar (also LING 452[4452]) (KCM-AS)
Fall. 4 credits. Prerequisite: thorough
familiarity with morphology of classical
Latin. A. Nussbaum.
The prehistory and evolution of the sounds and forms of Classical Latin as reconstructed by comparison with the other Indo-European languages.
[GREEK 425(4455) Greek Dialects (also LING 455[4455]) (KCM-AS)
Fall. 4 credits. Next offered 2009-2010.
A. Nussbaum.

Survey of the dialects of ancient Greek
through the reading and analysis of
representative epigraphical and literary texts.]

## [LATIN 426(4456) Archaic Latin (also

 LINO 456[4456]) (LA-AS)Spring. 4 credits. Prerequisite: reading
knowledge of Latin. Next offered 2009-
2010. A. Nussbaum.

Reading of epigraphic and literary preClassical texts with special attention to archaic and dialectal features. The position of Latin among the Indo-European languages of ancient Italy, the rudiments of Latin historical grammar, and aspects of the development of the literary language.]
[GREEK 427(4457) Homeric Philology (also LING 457[4457]) " (LA-AS)
Spring. 4 credits. Prerequisite: ability to read Homeric Greek. Next offered 2008 2009. A. Nussbaum.

The language of the Homeric epics: dialect background, archaisms, modernizations. The notion of a Kunstsprache: its constitution, use, and internal consistency. The phonological and morphological aspects of epic compositional technique.]
[GREEK 429(4459) Mycenaean Greek (also LING 459[4459]) (LA-AS)
Spring. 4 credits. Prerequisite: thorough familiarity with morphology of Classical Greek. M. Weiss.]
LATIN 453(4453) Structure of Latin (also LING 453[4453]) (KCM-AS)
Fall. 4 credits. Staff.
For description, see LING 453.
LATIN 682(7292) Seminar In Latin and Italic Linguistics (also LING 700[7700]
Spring. 4 credits. A. Nussbaum and M. Weiss.

## Sanskrit

## CLASS 191-192(1331-1332) Elementary

 Sanskrit (also LINO/SANSK 131-132[1131-1132])191, fall; 192, spring. 4 credits each semester. A. Ruppel.
Introduction to the essentials of Sanskrit grammar. Designed to enable the student to read classical and epic Sanskrit as quickly as possible.

## [CLASS 291-292(2351-2352)

Intermediate Sanskrit (also LINO/
SANSK 251-252[2251-2252]) © "
291, fall; 292, spring. 3 credits each
semester. CLASS 291 satisfies Option 1.
Prerequisite: CLASS 192 or equivalent. Next
offered 2008-2009. A. Ruppel.
Readings from the literature of Classical Sanskrit. Fall: selections from the two Sanskrit epics, the Mababbarata and the Ramayana. Spring: more selections from the epics, and from either Sanskrit story literature or from Sanskrit dramas.]
CLASS 391(3391) Independent Study in Sanskrit, Undergraduate Level
Fall and spring. Variable to 4 credits. Staff.
CLASS 393(3393) Advanced Sanskrit I (also SANSK 301[3301])
Fall. 4 credits. Staff.
For description, see SANSK 301.

## CLASS 394(3394) Advanced Sanskrit I

 (also SANSK 302[3302])Spring. 4 credits. Staff.
For description, see SANSK 302.
[CLASS 490(4490) Sanskrit Comparative Grammar (also LINQ 460[4460]) (KCM-AS)
Fall. 4 credits. Next offered 2008-2009.
A. Nussbaum.

Survey of the historical phonology and morphology of Sanskrit in relation to the Indo-Iranian and Indo-European comparative evidence.]
CLASs 704(7950) Independent Study for Graduate Students in Sanskrit
Fall and spring. Variable to 4 credits. Staff.

## Honors Courses

## Class 472(4720) Honors Course: Senior Essay

Fall and spring. 8 credits. Student must
choose advisor by end of sixth semester.
Topics must be approved by Standing
Committee on Honors by beginning of
seventh semester.
See "Honors" under Classics front matter.

## Related Courses in Other Departments and Programs

See listings under:
Archaeology
Asian Studies
Comparative Literature
English
Feminist, Gender \& Sexuality Studies
History
History of Art
Linguistics
Medieval Studies
Near Eastern Studies
Philosophy
Religious Studies
Society for the Humanities

## COGNITIVE SCIENCE PROGRAM

M. Spivey (psychology), director. G. Gay, J. Hancock (communication); C. Cardie, R. Constable, J. Halpern, D. Huttenlocher, T. Joachims, L. Lee, B. Selman, R. Zabih (computer science); G. Evans, A. Hedge (design and environmental analysis); K. Basu, L. Blume, D. Easley (economics); J. Dunn, R. Ripple, D. Schrader (education); S. Wicker (electrical and computer engineering); M. Belmonte, C. Brainerd, M. Casasola, S. Ceci, B. Koslowski, B. Lust, V. Reyna, S. Robertson, E. Temple, Q. Wang, E. Wethington, W. Williams (human development); J. Hancock (information science); K. O'Connor, J. Russo,
M. Thomas-Hunt (Johnson Graduate School of Management); J. Bowers, A. Cohn, M. Diesing, W. Harbert, S. McConnell-Ginet, A. MillerOckhuizen, M. Rooth, C. Rosen, Y. Shirai, M. Wagner, J. Whitman, D. Zec (linguistics); A. Nerode, R. Shore (mathematics); F. ValeroCuevas (mechanical and aerospace engineering); R. Harris-Warrick, H. Howland, R. Hoy, C. Linster, H. K. Reeve (neurobiology and behavior); R. Boyd, M. Eklund, C. Ginet, H. Hodes, S. Shoemaker, B. Weatherson (philosophy); M. Christiansen, J. Cutting, R. Darlington, T. DeVoogd, D. Dunning,
S. Edelman, M. Ferguson, D. Field, B. Finlay,
T. Gilovich, M. Goldstein, B. Halpern, A. Isen,
R. Johnston, C. Krumhansl, U. Neisser,
D. Pizzarro, E. Adkins Regan, M. Spivey
(psychology); M. Macy (sociology).
R. Canfield, S. Hertz (associate members).

Cognitive Science comprises a number of disciplines that are linked by a major concern with fundamental capacities of the mind, such as perception, memory, reasoning, language, the organization of motor action, and their neural correlates. In the College of Arts and Sciences these disciplines are represented in the departments of Computer Science, Economics, Linguistics, Mathematics, Neurobiology and Behavior, Philosophy, Psychology, and Sociology. Elsewhere in the university they are represented in the departments of Computer Science, Mechanical and Computer Engineering, and Mechanical and Aerospace Engineering (College of

Engineering); the departments of Design and Environmental Analysis and Human Development (College of Human Ecology); the departments of Communication and Education (College of Agriculture and Life Sciences), the Information Science Program, and the Johnson Graduate School of Management.
The issues addressed in Cognitive Science arise at several levels. At the broadest level are problems of characterizing such basic notions as "mind," "knowledge," "information," and "meaning." At a more specific level are questions regarding the abstract operating principles of individual components of the mind, such as those underlying visual perception, language ability, and understanding of concepts. These principles concern the organization and behavior of the components and how they are biologically represented in the brain. At the most specific level are questions about the properties of the elementary computational structures and processes that constitute these components.
Important insights into issues of these kinds have been achieved in recent years as a result of the various Cognitive Science disciplines converging in their theoretical and methodological approaches. It is this convergence, in fact, that warrants grouping the disciplines together under the single term "Cognitive Science." Even greater progress can be expected in the future as a consequence of increasing cooperation among the disciplines.

## Undergraduate Concentration

An interdisciplinary undergraduate concentration in Cognitive Science is available to Cornell University undergraduates in the College of Arts and Sciences. Students from other colleges who seek such a concentration should discuss such possibilities with the Cognitive Science office, which will provide information and contacts concerning such concentrations.

The undergraduate concentration in Cognitive Science is designed to enable students to engage in a structured program directly related to the scientific study of cognition and the mind. The concentration provides a framework for the design of structured, supervised programs of study in this growing interdisciplinary field. Such programs of study serve as complements to course work in a single discipline as represented by an individual department. It is considered crucial that students gain a strong background in their major, independent of their work in the concentration. Independent majors and college scholars may also apply. Colleges vary in their procedures for formal recognition of this concentration (contact the Cognitive Science office for details). The Cognitive Science Program faculty have designed five structured "tracks" that offer students different ways of satisfying the concentration. In addition, students are always able to construct their own programs of study subject to approval by their concentration advisor. The courses listed under each track are program suggestions. The student should consult his or her Cognitive Science advisor to develop a more customized curriculum. In some cases, students may want to combine or cross tracks.
In general, it is expected that students in the concentration will take COGST 101 or COGST 214 as their introductory course requirement; either COGST 412, COGST 416, COGST 450,
or COGST 470 as their lab course
requirement; and three courses at the 300 and 400 level in at least two departments (or certain suitable 200 -level courses by petition). Courses are to be chosen by student and advisor to provide a coherent program. Even though only five courses are required to complete the concentration, we assume students interested in Cognitive Science will often end up taking more. An independent research project (e.g., COGST 470 if this is not used to satisfy the lab requirement) and a research workshop (COGST 471) are encouraged. Please note: minor modifications to this outline may be made in extenuating circumstances by the advisor, in consultation with the program director.
The five typical tracks are as follows. Note that many of these courses have substantial prerequisites.

## 1. Perception and Cognition

This track focuses on psychological, computational, and neurobiological approaches to the interface between perception and cognition. Students will develop a grasp of the continuum between sensory impressions and complex thought.
COGST 101/CS 101/LING 170/PHIL 191/ PSYCH 102 Introduction to Cognitive Science
COGST/PSYCH 214 Cognitive Psychology
COGST/PSYCH 231 Borges and I: A Quest for Self-Knowledge
COGST/PSYCH 342 Human Perception: Applications to Computer Graphics, Art, and Visual Display
COGST/PSYCH 416 Modeling Perception and Cognition
COGST 450/HD 437/LING 450/PSYCH 437 Lab Course: Language Development
BIONB 326 The Visual System
PSYCH 305 Visual Perception
PSYCH 316 Auditory Perception
PSYCH 412 Laboratory in Cognition and Perception
PSYCH 418 Psychology of Music
PSYCH 419 Neural Networks Laboratory
COGST 465/CS 392/PSYCH 465 Topics in High-Level Vision

## 2. Language and Cognition

This track focuses on the representation, processing, and acquisition and learning of language, as well as its role in cognition and culture. Students will acquire skills and knowledge in formal and applied linguistic theory,
psycholinguistic experimentation, and computational modeling techniques.
COGST 101/CS 101/LING 170/PHIL 191/
PSYCH 102 Introduction to Cognitive Science
COGST/PSYCH 214 Cognitive Psychology COGST/LING/PSYCH 215 Psychology of Language
COGST/PSYCH 416 Modeling Perception and Cognition
COGST/PSYCH 427 Evolution of Language
COGST/LING/PSYCH 428 Connectionist
Psycholinguistics
COGST/HD 434 Current Topics in
Cognitive Development
COGST 436/HD 436/LING 436/PSYCH 436 Language Development
COGST 450/HD 437/LING 450/PSYCH 437 Lab Course: Language Development

CS 411 Programming Languages and Logics
LING 203 Introduction to Syntax and Semantics
LING 301-302 Introduction to Phonetics
LING 303 Introduction to Syntax
LING 304 Introduction to Semantics Pragmatics
LING 309 Morphology
LING 403 Syntax I, II
LING 421-422 Semantics I and II
PHIL 332 Philosophy of Language
PSYCH 415 Concepts, Categories, and Word Meanings
3. Cognition and Information Processing

This track focuses on how the mind (or a computer) can encode, represent, and store information. Students will develop an understanding of concepts, categories, memory, and the nature of information itself.
COGST 101/CS 101/LING 170/PHIL 191/ PSYCH 102 Introduction to Cognitive Science
COGST/PSYCH 214 Cognitive Psychology
COGST/PSYCH 414 Comparative Cognition
COGST/PSYCH 416 Modeling Perception and Cognition
COGST/HD 334 The Growth of the Mind
COGST/HD 432 Cognitive, Social, and Developmental Aspects of Scientific Reasoning
COGST 450/HD 437/LING 450/PSYCH 437 Lab Course: Language Development
CS 211 Computers and Programming
CS 472 Foundations of Artificial Intelligence
CS 473 Practicum in Artificial Intelligence
PSYCH 412 Laboratory in Cognition and Perception
PSYCH 413 Information Processing:
Conscious and Nonconscious
PSYCH 415 Concepts, Categories, and Word Meanings
PSYCH 417 The Origins of Thought and Knowledge
4. Cognitive Neuroscience

This track focuses on neurobiological and computational approaches to
understanding how perception and
cognition emerge in the human brain.
Students will acquire knowledge of what neural structures subserve what
perceptual/cognitive processes, and how they interact.
COGST 101/CS 101/LING 170/PHIL 191/ PSYCH 102 Introduction to Cognitive Science
COGST/PSYCH 214 Cognitive Psychology
COGST/HD 220 The Human Brain and Mind
COGST/BIONB/PSYCH 330 Introduction to Computational Neuroscience
COGST/PSYCH 416 Modeling Perception and Cognition
PSYCH 332/BIONB 328 Biopsychology of Learning and Memory
PSYCH/BIONB 396 Introduction to Sensory Systems
PSYCH 425 Cognitive Neuroscience
PSYCH 440 The Brain and Sleep
5. Independent Study

With approval from the Cognitive Science undergraduate curriculum committee, a student and advisor in the Cognitive Science program can arrange their own
unique collection of courses that do not belong to the above categories for satisfying the concentration requirements.
COGST 470 Undergraduate Research in Cognitive Studies
COGST 471 Cognitive Studies Research Workshop
A Cognitive Science undergraduate laboratory and computer facility (201 Uris Hall) is
available for all students in a Cognitive
Science concentration. This facility will help link resources from different laboratories across the Cornell campus as well as providing a central location for developing and conducting experimental research in Cognitive Science.

Students who complete the concentration requirements will have their concentration in Cognitive Science officially represented on their transcript. In addition, students who have made substantial progress toward completing the requirements for the concentration will be eligible for enrollment in the graduate courses in Cognitive Science during their senior year.

## Concentration Application Procedures.

Initial inquiries concerning the undergraduate concentration should be made to the Cognitive Science Program coordinator, Julie Simmons-Lynch, cogst@cornell.edu, 255-6431, who will provide application materials.
To formally initiate the concentration in Cognitive Science, a student must gain approval for a selection of courses from a concentration advisor (one of the program faculty). The courses selected must form a coherent cluster that makes sense to both the advisor and the student. To be admitted to the concentration, the student must submit this plan of study to the Cognitive Science undergraduate faculty committee for final approval
In addition to assisting in and approving the student's selection of courses, the concentration advisor serves as a general source of information about the field of Cognitive Science, relevant resources around the university, and job and graduate school opportunities. Often, the advisor can help the student develop independent research experience.
Independent Research. The concentration encourages each student to be involved in independent research that bears on research issues in Cognitive Science, if possible
COGST 470 is available for this purpose. It is recommended that students report on their research activities in an annual undergraduate forum. The Undergraduate Concentration Committee is committed to helping students find an appropriate research placement when needed.
The Committee for Undergraduate
Concentration in Cognitive Science consists of: Bart Selman, Computer Science, 255-5643, 4144 Upson Hall, selman@cs.cornell.edu; Draga Zec, linguistics, 255-0728, 217 Morrill Hall, DZ17@cornell.edu; Michael Spivey, psychology, 255-9365, 238 Uris Hall, spivey@ cornell.edu. The current director of undergraduate studies is Draga Zec

## Graduate Minor

Entering graduate students, as well as advanced undergraduates, who are interested in cognition and in the cognitive sciences are advised to take the proseminar course COGST 501 Introduction to Cognitive Science in the
fall semester. Enrolling in this 4 -credit version of COGST 101 involves a weekly section meeting with the instructor and will satisfy the introductory course requirement.

Graduate students minoring in Cognitive
Science will take additional courses recommended by their graduate committee to complete their course requirements.
For more information, consult the program office (278G Uris Hall, 255-6431, cogst@ cornell.edu) or the director of graduate studies, Michael Spivey (255-9365, spivey@ cornell.edu)

## Courses

## Cognitive Science

COGST 101(1101) Introduction to Cognitive Science (also CS 170[1710], LING $170[1170$ ], PHIL 191[1910], PSYCH 102[1200]) (KCM-AS)
Fall. 3 or 4 credits; 4 -credit option involves writing section instead of exams. M. Spivey.

Surveys the study of how the mind/brain works. Examines how intelligent information processing can arise from biological and artificial systems. Draws primarily from five disciplines that make major contributions to cognitive science: philosophy, psychology, neuroscience, linguistics, and computer science. The first part of the course introduces the roles played by these disciplines in cognitive science. The second part focuses on how each of these disciplines contributes to the study of five topics in cognitive science: language, vision, learning and memory, action, and artificial intelligence.

## COGST 111(1110) Brain, Mind, and Behavior (also BIONB/PSYCH 111[1110]) (PBS)

Spring. 3 credits. Intended for freshmen and sophomores in humanities and social sciences; seniors not allowed. Not recommended for psychology majors; biology majors may not use course for credit toward major. Letter grades only. R. Hoy and E. Adkins Regan.

Understanding how the brain creates complex human behavior and mental life is a great scientific frontier of the next century. This course enables students with little scientific background from any college or major to appreciate the excitement. What are the interesting and important questions? How are researchers trying to answer them? What are they discovering? Why did the brain evolve this remarkable capacity?

## COGST 150(1500) Intro to Human Environment Relations (also DEA 150[1500])

Spring. 3 credits. G. Evans.
For description, see DEA 150.

## [COGST 172(1720) Computation, Information, and Intelligence (also CS/ENGRI/INFO 172[1700]) (MQR)

Fall. 3 credits. Prerequisite; some knowledge of calculus. Next offered 20082009. Staff.

Introduction to computer science using methods and examples from the field of artificial intelligence. Topics include game playing, search techniques, learning theory, computer-intensive methods, data mining, information retrieval, the web, natural language processing, machine translation, and the Turing
test. This is not a programming course; rather, "pencil and paper" problem sets are assigned. Not open to students who have completed the equivalent of CS 100.]

## COGST 214(2140) Cognitive Psychology

 (also PSYCH 214/614[2140/6140]) (KCM-AS)Fall. 4 credits. Limited to 175 students.
Prerequisite: sophomore standing. Note:
Undergraduates who want 5 credits also
should enroll in COGST 501. S. Edelman.
Introduces the idea of cognition as
information processing, or computation, using examples from perception, attention and consciousness, memory, language, and thinking. Participants acquire conceptual tools that are essential for following the current thought on the nature of mind and its relationship to the brain.

## COGST 215(2150) Psychology of Language (also LING/PSYCH $215[2150]$ ) (KCM-AS]

Spring. 3 credits. Prerequisite: sophomore, junior, or senior standing; any one course in psychology or human development. M. Christiansen.

Provides an introduction to the psychology of language. The purpose of the course is to introduce students to the scientific study of psycholinguistic phenomena. It covers a broad range of topics from psycholinguistics, including the origin of language, the different components of language (phonology, morphology, syntax, and semantics), processes involved in reading, computational modeling of language processes, the acquisition of language (both under normal and special circumstances), and the brain bases of language.
COGST 220(2200) The Human Brain and Mind: Biologlcal Issues in Human Development (also HD 220[2200]) (PBS Supplementary list)
Fall. 3 credits. Prerequisite: HD 115 or permission of instructor. E. Temple. This course explores the biology that underlies cognitive processes like language, decision making, and emotion. What do we know about the biology of the mind? As long ago as the 1600 s, when the philosopher Descartes speculated on how the mind and body interact, humans have been fascinated by how the chunk of tissue we call the brain can give rise to all the complexity that is human behavior. This course is designed as an introduction to the biology underlying human behavior. After studying basic concepts in neurobiology and neuroanatomy, the course will explore a variety of topics, such as how our brain underlies our perception, thought, language, emotions, memories, and desires. In addition, we will discuss relevant human clinical disorders throughout the course. This course will give background necessary for other courses in HD that focus on biological mechanisms of human development and serves as a prerequisite for many of them.

## COGST 230(2300) Cognitive Development

 (also HD 230[2300])Spring. 3 credits. Prerequisite: HD 115 or PSYCH 101. Q. Wang.
Designed to help students develop a broad understanding of the mechanisms, processes, and current issues in cognitive development and learn to do critical, in-depth analyses of developmental research. Discusses how children's thinking changes over the course of development and evaluate psychological
theories and research on various aspects of cognitive development. Topics include perception, representation and concepts, reasoning and problem solving, social cognition, memory, metacognition, language and thought, and academic skills. Students also have hands-on research experiences with "real" kids.
COGSt 231(2310) Borges and I; A Quest for Self-Knowledge (also PSYCH/ BIONB 231[2310])
Spring. 4 credits. Limited to 15 students. S. Edelman.

This seminar will survey the state of the art in theoretical neuroscience, a discipline whose ultimate goal is finding the mind in the brain. Our journey through the scientific literature on minds and brains, covering topics such as memory and identity, love, solitude and society, language, creativity, religion, and morality, will be accompanied by a choice of short stories by Jorge Luis Borges.
This seminar is sponsored by the John $S$. Knight Institute's Sophomore Seminars Program and is not restricted to sophomores.

## COGST 238(2380) Thinking and

 Reasoning (also HD 238[2380])- Fall. 3 credits. Prerequisite: HD 115 or

PSYCH 101. B. Koslowski.
Examines problem solving and transfer, precausal thinking, logical thinking, practical syllogisms, causal reasoning, scientific reasoning, theories of evidence, expert vs. novice differences, and nonrational reasoning. Two general issues run through the course: the extent to which children and adults approximate the sorts of reasoning that are described by various types of models, and the extent to which various models accurately describe the kind of thinking that is required by the types of problems and issues that arise and must be dealt with in the real world.

## COGSt 330(3300) Introduction to

 Computational Neuroscience (also BIONB/PSYCH 330[3300]) (PBS)Fall. 3-4 credits; 4-credit option includes lab providing additional computer simulation exercises. Limited to 25 students. Prerequisite: BIONB 222 or permission of instructor. Offered alternate years. C. Linster.
Covers the basic ideas and techniques involved in computational neuroscience. Surveys diverse topics including: neural dynamics of small networks of cells, neural coding, learning in neural networks and in brain structures, memory models of the hippocampus, sensory coding, and others.

## [COGST 333(3330) Problems in

 Semantics-Guantification in Natural Language (also LING 333[3333], PHIL 333[3330]) (KCM-AS)Spring. 4 credits. Prerequisites: course in logic or semantics or permission of instructor. Next offered 2008-2009. M. Rooth. Looks at problems in the semantic analysis of natural languages, critically examining work in linguistics and philosophy on particular topics of current interest.]

## COGST 334(2340) The Growth of the

 Mind (also HD 334[3340])Spring. 4 credits. Prerequisite: course in human experimental psychology, cognitive psychology, statistics, HD 115, or equivalent, or permission of instructor. Primarily intended for sophomores through seniors. B. Lust.

The fundamental issues of cognition are introduced in this course. What is the nature of human intelligence? Of logical and scientific reasoning? How are knowledge and understanding acquired and represented in the human mind? What is the nature of mental representation? What are the cognitive characteristics of the mind at birth? What is the relation of the acquisition of knowledge and understanding to their final representation? What are the relations between language and thought? In the study of those issues, how can epistemology and experimental psychology be related through the experimental method? Basic debates within the study of cognition are introduced and discussed throughout. The course will analyze Piaget's comprehensive theory of cognitive development and experimental results. Current research in cognitive development will be contrasted.

## COGST 337(3370) Language

## Development (also HD 337[3370], LING 436[4436], PSYCH 436[4360]) (KCM-AS)

Spring. 4 credits. Open to undergraduate and graduate students. Graduate students should also enroll in HD 633, LING 700, or PSYCH 600, a supplemental graduate seminar. Prerequisite: at least one course in developmental psychology, cognitive psychology, cognitive development, or
linguistics. S-U or letter grades. B. Lust.
Surveys basic issues, methods, and research in the study of first-language acquisition. Major theoretical positions in the field are considered in the light of experimental studies in first-language acquisition of phonology, syntax, and semantics from infancy on. The fundamental linguistic issues of "Universal Grammar" and the biological foundations for acquisition are discussed, as are the issues of relations between language and thought. The acquisition of communication systems in nonhuman species such as chimpanzees is addressed, but major emphasis is on the child. An optional lab course supplement is available (see COGST 450/HD 437/LING 450/PSYCH 437).

COGST 342(3420) Human Perception: Applications to Computer Graphics, Art, and Visual Display (also PSYCH 342/642[3420/6420], VISST 342[3342])
Fall. 3 or 4 credits; 4 -credit option involves term paper. Prerequisite: PSYCH 101 or permission of instructor. Highly
recommended: PSYCH 205. D. Field. Our present technology allows us to transmit and display information through a variety of media. To make the most of these media channels, it is important to consider the limitations and abilities of the human observer. The course considers a number of applied aspects of human perception with an emphasis on the display of visual information Topics include "three-dimensional" display systems, color theory, spatial and temporal limitations of the visual systems, attempts at subliminal communication, and "visual" effects in film and television.

## COGST 412(4120) Laboratory in

 Cognition and Perception (III) (also PSYCH 412[4120])Spring. 4 credits. Limited to 15 students. Prerequisite: statistics and one course in cognition or perception recommended. Graduate students, see PSYCH 612. M W. D. J. Field.

Laboratory course designed to introduce students to experimental methods in perception and cognitive psychology. Students take part in a number of classic experiments and develop at least one independent project. Computers are available and used in many of the experiments although computer literacy is not required, Projects are selected from the areas of visual perception, pattern recognition memory, and concept learning,

## [COGST 414(4140) Comparative <br> Cognition (also PSYCH 414/714[4140/7140]) (KCM-AS)

Spring. 3 or 4 credits; 4 -credit option involves annotated bibliography or creating relevant web site. Prerequisites: PSYCH $205,209,214,223,292$, or permission of instructor. Next offered 2008-2009. Staff.
Examines some of the conceptual and empirical work resulting from and fueling the recent surge of interest in animals' thinking. Specific topics may include whether nonhumans behave intentionally; whether they show concept and category learning, memory, and abstract thinking similar to that of humans; the role of social cognition in the evolution of intelligence; and whether animals are conscious or self-aware. Evidence from communication studies in which animal signals provide a "window on the mind" plays a strong role in the deliberations, including studies of naturally occurring signaling in various species and experiments in which nonhumans are trained in human-like language behavior. Cognition in nonhuman primates is a specific focus throughout. The course is a mix of lecture and discussion, emphasizing the latter as much as possible.]

## COGST 416(4160) Modeling Perception and Cognition (also PSYCH 416/616[4160/6160])

Spring. 4 credits. Prerequisites: PSYCH 205, 209,214 , or 215 , or permission of instructor. M. Spivey.
Offers a survey of several computational approaches to understanding perception and cognition. Explore linear systems analysis, connectionist models, dynamical systems, and production systems, to name a few. Emphasis is placed on how complex sensory information gets represented in these models, as well as how it gets processed. This course covers computational accounts of language processing, language acquisition, visual perception, and visual development, among other topics.

## COGST 424(4240) Computational

 Linguistics (also CS 324[3470], LING 424[4424]) (MQR)Fall. 4 credits. Prerequisite: LING 203.
Recommended: CS 114. Labs involve work
in Unix environment. M. Rooth.
For description, see LING 424.
COGST 425(4250) Cerebral Seductions (also S HUM 425)
Spring. 4 credits. W. Jones.
For description, see S HUM 425 .
[COGST 426(4260) Learning Language (also PSYCH 426/726[4260/7260])
Spring. 4 credits. Limited to 20 students. Prerequisite: PSYCH 214 or by permission of the instructor. Next offered 2008-2009 S. Edelman.

In this seminar, we shall survey a promising new approach to the understanding of the cognitive function that is at the core of the
human nature: language. Thematically, the material to be covered focuses on two aspects of the study of language: (1) psycholinguistic data and their interpretation, and (2) algorithmic studies and computational modeling. In psycholinguistics, we shall read key papers that shed light on the nature of linguistic knowledge ("grammar") possessed by normal adult speakers, and on the acquisition of this knowledge by children. In computation, the focus is on acquisition of grammar from raw data.]

## COGST 427(4270) Evolution of Language

 (also PSYCH 427/627[4270/6270])Fall. 3 credits. Limited to 20 students. Prerequisite: senior standing or permission of instructor. Offered alternate years. M. Christiansen.

Fueled by theoretical constraints derived from recent advances in the brain and cognitive sciences, the last decade of the 20th century saw a resurgence of scientific interest in the evolution of language. This seminar surveys a cross section of modern theories, methods, and research pertaining to the origin and evolution of language. Considers evidence from psychology, the cognitive neurosciences, comparative psychology, and computational modeling of evolutionary processes. Topics for discussion may include: What does the fossil record tell us about language evolution? What can we leam from comparative perspectives on neurobiology and hehavior? Can apes really leam language? Did language come about through natural selection? What were the potential preadaptations for language? What is the relationship between phylogeny and ontogeny?

## [COGST 428(4280) Connectionist

## Psycholinguistics (also LING/PSYCH

 428/628[4280/6280])Fall. 3 credits. Prerequisite: senior standing or permission of instructor. Offered alternate years; next offered 2008-2009. M. Christiansen.

Connectionist psycholinguistics involves using (artificial) "neural" networks, which are inspired by brain architecture, to model empirical data on the acquisition and processing of language. As such, connectionist psycholinguistics has had a far-reaching impact on language research. This course surveys the state of the art of connectionist psycholinguistics, ranging from speech processing and word recognition, to inflectional morphology, sentence processing, language production, and reading. An important focus of discussion is the methodological and theoretical issues related to computational modeling of psychological data. The broader implications of connectionist models of language are discussed, not only for psycholinguistics, but also for computational and linguistic perspectives on language.]

COGST 432(4320) Cognitive, Social, and Developmental Aspects of Scientific Reasoning (also MD 432[4320])
Fall. 3 credits. Prerequisites: HD) 115 or
PSYCH 101. Offered alternate years.
B. Koslowski.

The first section of the course will examine case studies of examples of scientific reasoning, such as identifying the causes of "childbed fever," whether a prehistoric population engaged in cannibalism, whether T. Rex was a fierce hunter or a wimpy scavenger, whether a primitive nomadic tribe might have included warrior women, etc. The
case studies will be examined to try to identify the sorts of principles that an adequate description of scientific reasoning would need to include
We will then consider various models of scientific reasoning with an eye towards identifying the extent to which the models can account for the sort of thinking that is exemplified in the case studies. Along the way, we will consider such questions as the role of theory in scientific reasoning, strategies for responding to anomalous or disconfirming data, when disconfirming data ought to (and do) prompt rejection rather than modification of a theory, confirmation bias, magical thinking in children, other developmental differences, sociocultural influences on scientific reasoning, etc. In discussing all of these questions, we will also consider developmental aspects of scientific reasoning, such as whether "magical thinking" in children is qualitatively different than what adults do

## COGST 433(4330) Developmental Cognitive Neuroscience (also HD 433[4330])

Spring. 3 credits. Limited to 25 students Prerequisite: HD 115 or PSYCH 101 and one semester of biology; permission of instructor. E. Temple.
What are the brain mechanisms underlying human behavior and cognition? How do those underlying brain mechanisms develop? These are the questions that we explore in this course through both lecture and reading and discussion of primary literature. The first weeks of class cover basics of developmental neurobiology and neuroanatomy and methods used in the field of cognitive neuroscience (especially neuroimaging techniques). After the introductory and methods information is covered the format changes to a weekly one including lecture and discussion of current research papers. Each week students focus on a particular cognitive ability such as language, memory, attention, or inhibitory control. For each topic students explore what is known about the brain mechanisms that underlie that particular function, how those brain mechanisms develop over the life span, and where possible, the brain mechanisms underlying disorders of that particular cognitive function.

COGST 434(4340) Current Topics in Cognitive Development (also HD 434[4240]) (KCM-AS)
Spring. 3 credits. Prerequisites: Course HD 234/COGST 234 (simultaneously); permission of instructor. Offered alternate years.
The course will supplement survey course HD 234/COGST 234 with additional discussion of current research in the area of cognitive development. Selected current papers will be read and discussed in parallel with the HD 234/COGST 234 survey course. Modern interpretations and challenges to Piaget's theory will be evaluated in light of current literature in the field. A small group format will be adopted to encourage discussion.
COGST 435(4350) Mind, Self, and Emotion: Research Seminar (also HD 431[4310])
Fall. 3 credits. Limited to 20 students. Prerequisite: upperclass undergraduate or graduate standing. Letter grades only Q. Wang.

Examines current data and theory concerning memory, self, and emotion from a variety of
perspectives and at multiple levels of analysis, particularly focusing on the interconnections among these fields of inquiry. A special emphasis is given to cross-cultural studies on memory development, self-construal, and conception of emotion
COGST 450(4500) Lab Course: Language Development (also HD/PSYCH 437[4370], LING 450[4500])
Fall. 2 credits. In conjunction with COGST HD 337, LING/PSYCH 436. B. Lust.
Optional supplement to the survey course Language Development (COGST/HD/LING/ PSYCH 436). The lab course provides students with a hands-on introduction to scientific research, including design and methods, in the area of first-language acquisition
COGST 452(4520) Culture and Human Development (also HD 452[4520]) (CA-AS)
Fall. 3 credits. Limited to 30 students.
Prerequisite: HD 115 or PSYCH 101. Q. Wang

Takes an interdisciplinary approach to address the central role of culture in human development. Draws on diverse theoretical perspectives, including psychology, anthropology, education, ethnography, and linguistics, to understand human difference, experience, and complexity. Empirical reflections are taken upon major developmental topics such as cultural aspects of physical growth and development; culture and cognition; culture and language; culture, self, and personality; cultural construction of emotion; culture issues of sex and gender; and cultural differences in pathology.

## COGST 470(4700) Undergraduate

 Research in Cognitive ScienceFall or spring. 1-4 credits. Prerequisite: permission of major advisor; written permission of Cognitive Science faculty member who supervises research and assigns grade. S-U or letter grades. Cognitive Science faculty
Experience in planning, conducting, and reporting independent laboratory, field, and/or library research in an interdisciplinary area relevant to Cognitive Science.

## COGST 471(4710) Cognitive Science Research Workshop

Fall or spring. Variable credit. Prerequisites: enrollment in an independent research course either in Cognitive Science (e.g. COGST 470) or in a related department or in honors thesis research in one of the departments relevant to Cognitive Science. Staff (interdisciplinary faculty from Cognitive Science Program).
Provides a research workshop in which undergraduate students who are engaged in research in a particular area relevant to cognitive science can meet across disciplines to learn and practice the essentials of research using interdisciplinary approaches. In this workshop, students critique and discuss the existing literature in a field of inquiry, individual students present their research designs, methods, and results from their independent research studies, debate the interpretation of their research results, and participate in the generation of new research hypotheses and designs, in a peer group of other undergraduate students involved in related research.
[COGST 474(4740) Introduction to Natural Language Processing (also CS 474[4740], LING 474[4474])
Fall. 4 credits. Next offered 2008-2009. C. Cardie.

For description, see CS 474.]
[COGST 476-477(4760-4770) Decision Theory I and II (also COGST/ECON 676-677[6760-6770], ECON 476-477[4760-4770]) (MQR)
Fall and spring. 4 credits each semester. In fall, course is lecture based. Students are required to complete several problem sets and there is a final exam. In spring, there are additional lectures as well as visiting speakers. Students are required to read speakers' papers, participate in discussions, and complete a research project. L. Blume D. Easley, and J. Halpern.

Research on decision theory resides in a variety of disciplines including computer science, economics, game theory, philosophy, and psychology. This new course attempts to integrate these various approaches. The course is taught jointly by two economists/game theorists and a computer scientist. The course covers several areas: (1) basic decision theory. This theory, sometimes known as "rational choice theory," is part of the foundation for the disciplines listed above. It applies to decisions made by individuals or by machines. (2) the limitations of and problems with this theory. Issues discussed here include decision theory paradoxes revealed by experiments, cognitive and knowledge limitations, and computational issues. (3) new research designed in response to these difficulties. Issues covered include alternative approaches to the foundations of decision theory, adaptive behavior, and shaping the individual decisions by aggregate/ evolutionary forces.]

COGST 491(4910) Research Methods in Psychology (also COGST 691[6910], PSYCH 491/691[4910/6910])
Spring. 4 credits. Limited to 15 students. Recommended: permission of instructor, PSYCH 350, experience in upper-division psychology courses, or graduate standing. Graduate students, see COGST 691. V. Zayas.

Intensive examination of the basic research methods used in social, personality, cognitive, and developmental psychology. The course focuses on designing and conducting experiments, i.e., how to turn vague theories into concrete and testable notions, evaluate studies, avoid common pitfalls, and, finally, remain ethical. Beyond learning methods of "correct" and rigorous experimentation, we also discuss what makes a research study actually interesting. The course, in addition, covers test construction, survey methods, and "quasi experiments." Students concentrate on completing a small research project in which they conduct an experiment, interpret its data and write up the results.

## Computer Science

CS 170(1710) Introduction to Cognitive Science (also COGST 101[1101], LING 170[1170], PHIL 191[1910], PSYCH 102[1020])
Fall. 3 or 4 credits. M. Spivey.
[CS 172(1700) Computation, Information, and Intelligence (also COGST 172[1720], ENGRI 1721700], INFO 172[1700])
Fall. 3 credits. Next offered 2008-2009. L. Lee.

For description, see COGST 201.]
CS 211(2110) Computers and Programming
Fall, spring, or summer. 3 credits.

## CS 312(3110) Data Structures and

 Functional ProgrammingFall or spring. 4 credits.
CS 324(3470) Computational Linguistics (also COGST 424[4240], LING 424[4424])
Fall. 4 credits. M. Rooth

## CS 381(3810) Introduction to Theory of Computing

Fall, summer. 4 credits.

## [CS 411(4110) Programming Languages

 and LogicsFall. 4 credits. Next offered 2008-2009.]
CS 472(4700) Foundations of Artificial Intelligence
Fall. 3 credits. T. Joachims.

## Cs 473(4701) Practicum In Artificial Intelligence

Fall. 2 credits. T. Joachims.
[CS 474(4740) Introduction to Natural Language Processing (also COGST/ LING 474[4474])
Fall. 4 credits. Next offered 2008-2009. M. Rooth.]

## CS 478(4780) Machine Learning Spring. 3 credits. <br> Cs $\mathbf{4 8 6 ( 4 8 6 0 )}$ Applied Logic (also MATH 486[4860]) Spring. 4 credits.

## Education (College of Agriculture and Life Sciences)

[EDUC 614(6140) Gender, Context, and Epistemological Development Fall. 3 credits, Next offered 2008-2009. D. Schrader.]

## Human Development (College of Human Ecology)

HD 115(1150) Human Development Fall or summer. 3 credits.

HD 220(2200) The Human Brain and Mind: Biological Issues in Human Development (also COGST 220[2200]]
Fall. 3 credits. E. Temple.
[HD 230(2300) Cognitive Development (also COGST 230[2300])
Spring. 3 credits. Next offered 2008-2009. Q. Wang.]

HD 238(2380) Thinking and Reasoning (also COGST 437[4370])
Fall. 3 credits. B. Koslowski.
HD 266(2660) Emotional Functions of the Brain
Spring. 3 credits.
HD 320(3200) Human Developmental Neuropsychology
Spring. 3 credits. B. Koslowski.

HD 336(3360) Connecting Soclal, Cognitive, and Emotional Development
Fall. 3 credits. M. Casasola.
HD 337(3370) Language Development (also COGST 436[4360], LING 436[4436], PSYCH 436[4360]]
Spring. 4 credits. B. Lust
HD 344(3440) Infant Behavior and Development
Fall. 3 credits. S. Robertson.
HD 347(3470) Human Growth and Development: Biological and Behavioral Interactions (also BeSOC 347[3470], NS 347[3470])
Spring. 3 credits. S. Robertson and J. Haas.
HD 362(3620) Human Bonding Fall. 3 credits.

HD 431(4310) Mind, Self, and Emotion: Research Seminar (also COGST 435[4350])
Fall. 3 credits. Q . Wang
HD 432(4320) Cognitive, Social, and Developmental Aspects of Scientific Reasoning (also COGST 432[4320])
Fall. 3 credits. B. Koslowski.
For description, see COGST 432.
HD 433(4330) Developmental Cognitive Neuroscience (also COGST 433[4330])
Spring. 3 credits. E. Temple.
HD 437(4370) Lab Course: Language Development (also COGST/LING 450[4450], PSYCH 437[4370])
Spring. 2 credits. In conjunction with HD 337, COGST/LING/PSYCH 436. B. Lust.
[HD 452(4520) Culture and Muman Development (also COGST 452[4520]]
Fall. 3 credits. Next offered 2008-2009. Q. Wang.]

## Linguistics

LING 170(1170) Introduction to Cognitive Science (also COGST/CS 101[1101], PHIL 191[1910], PSYCH 102[1020])
Fall. 3 or 4 credits. M. Spivey.
[LING 215(2215) Psychology of Language (also COGST $215[2150]$, LING
715[7715], PSYCH
215/715[2150/7150])
Spring. 3 credits. Next offered 2008-2009. M. Christiansen.]

LING 332(3332) Philosophy of Language (also PHIL 332[3320])
Fall. 4 credits. Staff.
[LING 333(3333) Problems in Semantlcs-Quantification in Natural Language (also COQST/PHIL 333[3330])
Spring. 4 credits. Next offered 2009-2010. S. McConnell-Ginet.]

## [LING 424(4424) Computational

 Linguistics (also COGST 424[4240], CS 324[3470])Fall. 4 credits. Next offered 2008-2009. M. Rooth.]
LING 425(4425) Pragmatics
Spring. 4 credits. Next offered 2008-2009.]
[LING 428(4428) Connectionist
Psycholinguistics (also COGST 428[4280], LING 628[6628], PSYCH 428/628[4280/6280])
Fall. 3 credits. Offered alternate years. Next offered 2008-2009. M. Christiansen.]

LING 436(4436) Language Development (also COGST/HD/PSYCH 436[4360])
Fall. 4 credits. B. Lust.
LING 450(4450) Lab Course: Language Development (also COGST 450[4500], HD/PSYCH 437[4370])
Fall. 2 credits. In conjunction with COGST/
HD/LING/PSYCH 436. B. Lust.
[LING 474(4474) Introduction to Natural Language Processing (also COast 474[4740], CS 474[4740])
Fall. 4 credits. Next offered 2008-2009.
C. Cardie.]

## Mathematics

## [MATH 281(2810) Deductive Logic (also

 PHIL 331[3310])]MATH 481(4810) Mathematical Logic (also PHIL 431[4310])
Spring. 4 credits. Offered alternate years.
MATH 486(4860) Applled Logic (also CS 486[4860])
Spring. 4 credits.

## Neurobiology and Behavior

BIONB 111(1110) Brain, Mind, and Behavior (also COGST/PSYCH 141[1110])
Spring. 3 credits. R. Hoy and E. Adkins Regan
BIONB 221(2210) Neurobiology and Behavior I: Introduction to Behavior Fall. 3 or 4 credits.
BIONB 222(2220) Neurobiology and Behavior II: Introduction to Neurobiology
Spring. 3 or 4 credits.
BIONB 326(3260) The Visual System Spring. 4 credits. H. Howland.
BIONB 328(3280) Biopsychology of Learning and Memory (also PSYCH 332[3320])
Spring. 3 credits. T. DeVoogd.
BIONB 330(3330) Introduction to Computational Neuroscience (also COGST/PSYCH 330[3300])
Fall. 3-4 credits. C. Linster.
BIONB 392(3920) Drugs and the Brain Spring. 4 credits. R. Harris-Warrick and L. M. Nowak.

BIONB 396(3960) Introduction to Sensory Systems (also PSYCH 396[3960]) Spring. 3 or 4 credits. B. Halpern.
BIONB 421(4210) Effects of Aging on Sensory and Perceptual Systems (also PSYCH 431/631[4310/6310]) Fall. 3 or 4 credits. B. Halpern.
BIONB 424(4240) Neuroethology (also PSYCH 424[4240])
Spring. 4 credits.
BIONB 426(4260) Animal Communication Spring. 4 credits.

BIONB 492(4920) Sensory Function (also PSYCH 492/692[4920/6920], VISST 492)

Spring. 3 or 4 credits. H. Howland.
BIONB 496(4960) Bioacoustic Signals in Animals and Man
Fall. 3 credits. C. Clark and R. Hoy.

## Philosophy

PHIL 262(2620) Introduction to Philosophy of Mind
Fall. 4 credits.
PHIL 431(4310) Mathematical Logic (also MATH 481[4810])

## Psychology

## PSYCH 102[1200) Introduction to

 Cognitive Science (also COOST/ CS 101[1101], LING 170[1170], PHIL 191[1910])Fall. 3 or 4 credits. M. Spivey
PSYCH 111(1110) Braln, Mind, and Behavior (also BIONB 111[1111], COGST 111[1110]]
Spring. 3 credits. R. Hoy and E. Adkins Regan.
PSYCH 205(2050) Perception (also PSYCH 605[6050])
Spring. 3 credits. J. Cutting.
PSYCH 209(2090) Developmental Psychology (also PSYCH 709[7090])
Spring. 4 credits. M. Goldstein.
PSYCH 214(2140) Cognitive Psychology (also COGST 214[2140])
Fall. 3 credits. S. Edelman.
PSYCH 215(2150) Psychology of Language (also COGST 215, LING 215/715[2215/7715], PSYCH 715[7150])
Spring. 3 credits. M. Christiansen
PSYCH 223(2230) Introduction to Blopsychology
Fall. 3 credits. Staff
PSYCH 305(3050) Visual Perception (also VISST 305)
Fall. 4 credits. J. Cutting.

## [PSYCH 316(3160) Auditory Perception

 (also PSYCH 716[7160])Fall. 3 or 4 credits. Next offered 2008-2009. C. Krumhansl.]

PSYCH 326(3260) Evolution of Human Behavlor (also PSYCH 626[6260])
Spring. 4 credits. R. Johnston.
PSYCH 330(3300) Introduction to Computational Neuroscience (also BIONB/COGST 330[3300)
Fall. 3-4 credits. C. Linster.
PSYCH 332(3320) Biopsychology of Learning and Memory (also BIONB 328[3280], PSYCH 632[6320])
Spring. 3 credits. T. DeVoogd.
PSYCH 342(3420) Human Perception: Applications to Computer Graphics, Art, and Visual Display falso COGST 342[3420], VISST 342[3342], PSYCH 642(6420])
Fall. 3 or 4 credits. D. Field.

PSYCH 361(3610) Biopsychology of Normal and Abnormal Behavior (also NS 361[3610])
Fall. 3 credits. B. J. Strupp.
[PsYCH 396/3960) Introduction to Sensory Systems (also BIONB 396[3960], P8YCH 696[6960])
Spring. 3 or 4 credits. Next offered 2009-
2010. B. Halpern.]

PSYCH 412(4120) Laboratory in Cognition and Perception (also PSYCH 612[6121])
Spring. 4 credits. D. Field.
PsYCH 413(4130) Information Processing: Conscious and Monconsclous
Spring. 4 credits.
[PSYCH 414(4140) Comparative Cognition (also COGST 414[4140], PSYCH 714[7140])
Spring. 3 or 4 credits. Next offered 2008-2009.]
PsYCH 415(4150) Concepts, Categories, and Word Meanings (also PsYCH 615[6150])
Fall. 4 credits.

## PSYCH 416(4160) Modeling Perception and Cognition (also COGST 416[4160], PSYCH 616[6160]) <br> Spring. 4 credits. M. Spivey.

PsYCH 417(4170) The Origins of Thought and Knowledge (also PSYCH 717[7170])
Fall. 4 credits.
PsYCH 418(4180) Psychology of Music (also PSYCH 618[6180])
Fall. 3 or 4 credits. C. Krumhansl.
PSYCH 424(4240) Neuroethology (also BIONB 424[4240])
Spring. 4 credits.

## PSYCH 425(4250) Cognitive

 Neuroscience |also PSYCH 625[6250])Fall. 4 credits. B. Finlay.
PsYCH 427(4270) Evolution of Language (also COOST 427[4270], PSYCH 627(6270])
Fall. 3 credits. Offered alternate years.
M. Christiansen.
[PSYCH 428(4280) Connectionist Paycholinguistics (also COGST 428, LING 428/628[4428/6628], PSYCH 628[6280])
Fall. 3 credits. Offered alternate years; next offered 2008-2009. M. Christiansen.]
PSYCH 431(4310) Effects of Aging on Sensory and Percoptual Systems (also BIONB 421[4210], PSYCH 631[6310])
Fall. 3 or 4 credits. B. Halpern.
[PSYCH 436(4360) Language Development (also COGST 436, HD 436[4360], LINO 436[4436])
Spring. 4 credits. Next offered 2008-2009. B. Lust.]

PSYCH 437(4370) Lab Course: Language Development (also COGST/LING 450[4500], HD 437[4370)
Fall. 2 credits. In conjunction with COGST/ HD/LING/PSYCH 436. B. Lust.

PSYCH 465(4650) Topics in High-Level Vision (also COGST 465[4650], CS 392, PSYCH 665[6655])
Spring. 4 credits. Offered alternate years. S. Edelman.

PSYCH 491(4910) Research Methods In Psychology (also COGST 491/691[4910/6910], PSYCH 691[6910])
Spring. 4 credits. V. Zayas.
[PSYCH 492(4920) Sensory Function (also BIONB/VISST 492[4920], PSYCH 692[6920])
Spring. 4 credits. Next offered 2009-2010. B. Halpern and H. Howland.]

## Graduate Courses and Seminars

The following courses and seminars are generally for graduate students only. However, some may be appropriate for advanced undergraduates. The director of the concentration must approve an undergraduate's use of any of these for satisfying the concentration requirements.

## COGST 501(6150) Introduction to

 Cognitive Science, Proseminar Fall. 4 credits. M. SpiveyCOGST 501 surveys the study of how the mind/brain works and draws primarily from five disciplines that make major contributions to cognitive science: philosophy, psychology, neuroscience, linguistics, and computer science. The first part of the course introduces the roles played by these disciplines in cognitive science. The second part focuses on how each of these disciplines contributes to the study of five topics of cognitive science: language, vision, learning and memory, action, and artificial intelligence. Graduate students enrolled in this course will observe the Tuesday/Thursday lectures for COGST 101 and also attend a weekly discussion section with Professor Spivey.
[COGST 530/6300) Representation of Structure in Vision and Language (also LING 530[5530], PSYCH 530[6300])
Spring. 4 credits. Limited to 20 students. Graduate seminar. Prerequisites: graduate standing or undergraduates by permission of instructor; one course each in cognitive psychology, linguistics, and computer science, or permission of instructor. Offered alternate years; next offered 2008 2009. S. Edelman.

Concentrates on the nature of the representation of visual objects and scenes in the brain and compares it with the structural framework that serves as the main explanatory tool in current theories of language processing. Data and ideas are drawn from visual psychophysics, neurophysiology, psycholinguistics, computational vision and linguistics, and philosophy. Students present published research papers and preprints, which are then discussed and critiqued.]

## COGST 550(5500) Special Topics in Cognitive Sclence: Language and Thought

Fall. 4 credits. G. Lupyan.
In recent years there has been a revival of interest in the Whorf hypothesis. This seminar will present students with the most recent experimental evidence examining how language and thought interact. Do people who speak different languages think differently? Are there cognitive functions that
depend on acquiring a language? ... on acquiring a specific language? We will start by discussing the classic works in the field and then dive into recent empirical and theoretical work that has been examining the effects of language on category-learning, visual processing, and representations of time, space, and number. Students will also be introduced to methodologies used to study language-leaming in children and adults, effects of bilingualism on neural organization, and effects of language impairments (aphasia) on cognition.

## COGST 614(6140) Cognitive Psychology

 (also PSYCH 614[6140])Fall. 5 credits. Includes (M W F) lec of COGST/PSYCH 214 and a sec. S. Edelman. Introduces the idea of cognition as information processing, or computation, using examples from perception, attention and consciousness, memory, language, and thinking. Participants acquire conceptual tools that are essential for following the current thought on the nature of mind and its relationship to the brain.

## COGST 633(6330) Language Acquisition

 Seminar (also HD 633[6633], LING 633[6633])Fall or spring. 1-4 credits. Prerequisite:
COGST/HD/LNG/PSYCH 436 or equivalent, or permission of instructor. B. Lust.
Reviews and critiques current theoretical and experimental studies of first-language acquisition, with a concentration on insights gained by cross-linguistic study of this area. Attention is also given to the development of research proposals.
[COAST 671(6710) Introduction to Automated Reasoning (also Cs 671[6762])
Fall. 4 credits. Prerequisite: (CS 611 and graduate standing) or permission of instructor. Next offered 2008-2009. Topics in modern logic needed to understand and use automated reasoning systems such as HOL, Nuprl, and PVS. Special emphasis is on type theory and logic and on tactic-oriented theorem proving.]
[COOST 676-677(6760-6770) Decision Theory (also coast 478/477[4760/4770], CS 576/577[5760/5770], ECON 476-477/676-677[4460-4470/6760-6770])
Fall and spring. 4 credits each semester. Fall: lecture-based; students must complete several problem sets and a final exam. Spring: additional lectures as well as visiting speakers; students must read speakers' papers, participate in discussions, and complete a research project. Next offered 2008-2009. L. Blurne, D. Easley, and J. Halpern.
Research on decision theory resides in a variety of disciplines including computer science, economics, game theory, philosophy, and psychology. This new course attempts to integrate these various approaches. The course covers several areas: (1) basic decision theory. This theory, sometimes known as "rational choice theory," is part of the foundation for the disciplines listed above. It applies to decisions made by individuals or by machines; (2) the limitations of and problems with this theory. Issues discussed here include decision theory paradoxes revealed by experiments, cognitive and knowledge limitations, and computational issues; (3) new research designed in response to these difficulties. Issues covered here include
alternative approaches to the foundations of decision theory, adaptive behavior, and shaping the individual decisions by aggregate/ evolutionary forces.]

## COGST 691(6910) Research Methods in Psychology (also COQST 491[4910], PSYCH 491/691[4910/6910])

Spring, 4 credits. Limited to 15 students. D. Dunning.

Intensive examination of the basic research methods used in social, personality, cognitive, and developmental psychology. Focuses on designing and conducting experiments, i.e., how to turn vague theories into concrete and testable notions, evaluate studies, avoid common pitfalls, and, finally, remain ethical. The course, in addition, covers test construction, survey methods, and "quasi experiments." Students concentrate on completing a small research project in which they conduct an experiment, interpret its data, and write up the results.

COGST 710(7100) Research in Human Enperimental Psychology (also PSYCH 710[7100])
Fall or spring. Credit TBA. Prerequisite: permission of instructor.
cs 664(6670) Machine Vision Spring. 4 credits. R. Zabih.
[CS 671(6762) Introduction to Automated Reasoning (also COGST 671[6710])
Fall. 4 credits. Next offered 2008-2009.]
C8 672(6700) Advanced Artificial Intelligence
Spring. 4 credits. Prerequisite: CS 472.
C8 674(6740) Natural Language Processing
Fall. 4 credits. Prerequisite: CS 472 . Not offered every year.

Cs 676(6764) Reasoning about Knowledge
Fall. 4 credits. Prerequisites: mathematical maturity and acquaintance with propositional logic.

## [Cs 677(6766) Reasoning about

 UncertaintyFall. 4 credits. Prerequisites: mathematical maturity and acquaintance with propositional logic. Next offered 20082009.]

## Cs 772(7970) Seminar in Artificial

 IntelligenceFall and spring. 2 credits

## Cs 775(7794) Seminar in Natural

 Language UnderstandingFall and spring. 2 credits. C. Cardie
EDUC 614(6140) Gender, Context, and Eplatemological Development (also Fass 624[6240])
Fall. 3 credits. D. Schrader.
HD 633(6330) Language Acquisition Seminar (also coost/LING 633[6633])
Fall. 1-4 credits. Prerequisite: COGST/HD/ LING/PSYCH 436 or equivalent. B. Lust.

## HD 600/700 Graduate Seminars

[LING 530(5530) Representation of Structure in Vision and Language (also COOST/PSYCH 530[6150])
Spring. 4 credits. Offered alternate years; next offered 2008-2009. S. Edelman.]
[LING 609(6609) Second Language Acquisition and the Aslan Languages (also ASIAN 610[6610])
Fall. 4 credits. Prerequisite: LING 414-415 Next offered 2008-2009. Y. Shirai.]
[LINO 628 Connectionist
Psycholingulstics (also COGSt/LING 428, PSYCH 428/628[4280/6280])
Fall. 3 credits. Offered alternate years; next offered 2008-2009. M. Christiansen.]

LING 633(6633) Language Acquisition Seminar (also COGST/HD 633[6330]) Fall. 1-4 credits. Prerequisite: COGST/HD/ LING/PSYCH 436 or equivalent. B. Lust.
LING 700(7700) Graduate Seminars
MATH 681(6810) Logic
Spring. 4 credits.
MATH 781-782(7810-7820) Seminar In Logic
Fall and spring. 4 credits each.
MATH 788(7880) Topics in Applled Logic Fall. 4 credits.
NBA 663(6630) Managerial Decision Making
Fall. 3 credits. J. Russo.
PHIL 700(7000) Graduate Seminars
PSYCH 519(6830) Affects and Cognition (also NRE 507)
Fall. 4 credits. A. M. Isen.
PSYCH 521(6210) Behavioral and Brain Sclences
Fall and spring. 4 credits each semester.
[PSYCH 530(6300) Representation of Structure in Vision and Language (also COGST 530[6300], LING 530[5530])
Spring. 4 credits. Offered alternate years; next offered 2008-2009. S. Edelman.]
PsYCH 550(5500) Special Topics in Cognitive Science (also COGST 550[5500])
Spring. 4 credits. M. Spivey.
[PSYCH 614(6140) Cognitive Psychology (also CoGst 614[6140])
Fall. 5 credits. S. Edelman.
PSYCH 616(6160) Modeling Perception and Cognition (also COGST/PSYCH 416[4160])
Spring, 4 credits. M. Spivey,
PSYCH 618(6180) Psychology of Music (also PSYCH 418[4180])
Fall. 4 credits. C. Krumhansl.
[PSYCH 628|6280) Connectionist Psycholinguistics (also COGST/ PSYCH 428[4280], LING 428/628[4428/6628])
Fall. 3 credits. Next offered 2008-2009. M. Christiansen.]

PSYCH 631(6310) Effects of Aging on Sensory and Perceptual Systems (also BIONB 421[4210], PSYCH 431[4310])
Fall. 3 or 4 credits. B. Halpern.
PsYCH 665(6650) Toples In High-Level Vision (also cs 392[3920], COGST 465[4650], PSYCH 465[4650])
Spring. 4 credits. Offered alternate years. S. Edelman.

PSYCH 691(6910) Research Methods in Psychology (also COGST 491/891[4910/6910], PSYCH 491[4910])
Spring. 4 credits. D. Dunning.
[PSYCH 714(7140) Comparative Cognition (also COGST/PSYCH 414[4140])
Spring. 3 or 4 credits. Next offered 20082009.]

## [PSYCH 716(7160) Auditory Perception

 (also PSYCH 316[3160])Fall. 4 credits. Next offered 2008-2009.
C. Krumhansl.]

## COLLEGE SCHOLAR PROGRAM

K. Gabard, director ( 55 Goldwin Smith Hall, 255-5792)
The College Scholar Program is described in the introductory section of Arts and Sciences.
COLLS 397(3970) Independent StudySenior Project
Fall or spring. $1-4$ credits. Prerequisite: permission of program office.
COLLS 499(4990) Honors Research Fall or spring. $1-8$ credits; max. 8 credits may be earned for honors research. Prerequisite: permission of program director. Each participant must submit brief proposal approved by honors committee.

## COMPARATIVE LITERATURE

W. J. Kennedy, acting chair ( 247 Goldwin Smith Hall), TBA, director of undergraduate studies (247 Goldwin Smith Hall); N. Melas, director of graduate studies (fall) ( 247 Goldwin Smith Hall); T. Murray, director of graduate studies (spring) ( 247 Goldwin Smith Hall); F. Ahl, A. Banerjee, C. Carmichael, D. Castillo, C. Chase, J. Culler, C. Dean, B. deBary,
A. François, E. Hanson, P. Hohendahl, G. HolstWarhaft, W. J. Kennedy, D. LaCapra, P. Liu, B. Maxwell, T. McNulty, J. Monroe, N. Saccamano, N. Sakai. Emeritus: A. Caputi, D. Grossvogel, W. Holdheim, E. Rosenberg, L. Waugh. Also cooperating: R. Brann, C. Canth, H. Emmett, S. Fathy, A. Galloway, A. Garces, P. Gilgen, M. Greenberg, S. Haenni, K. Hirone, W. Jones, R. Klein, P. Lorenz, K. Long, C. Nealon, S. Pinet, D. Reese, D. Riley, D. Rubenstein, D. Schwarz, D. Starr, G. Waite

The Department of Comparative Literature provides a broad range of courses in European and non-European literature as well as visual and media studies. Courses stress significant authors, themes, problems, styles, genres, historical periods, and theoretical perspectives. In cooperation with related departments in the humanities, the departmental offerings reflect current interdisciplinary approaches to literary study: hermeneutics, semiotics, deconstruction, cultural criticism, Marxism, reception aesthetics, feminism, and psychoanalysis.

## The Major

The Department of Comparative Literature provides a broad range of courses in European as well as non-European literatures. Courses devoted to literary studies variously stress significant authors, themes, problems, genres, historical periods, and theoretical perspectives.

The Department also offers an array of courses in visual and media studies and enables the study of literature in relation to the history and theory of film, video, and other arts, as well as media. In cooperation with related departments in the humanities, the department encourages the interdisciplinary study of literature-in conjunction with anthropology, history, philosophy, sexuality studies, psychology sociology, and so forth. The course offerings reflect current theoretical approaches to literature, media, and the arts-hermeneutics, semiotics, deconstruction, cultural criticism, Marxism, postcolonialism, reception aesthetics, feminism, and psychoanalysis.

## Requirements for the Major

All majors in Comparative Literature are expected to have completed 10 courses, half of which must be devoted to the study of works in cultures other than English in their original languages.
Five of these courses must be taken in the Department of Comparative Literature. One of these must be a Core Course, to be taken in the junior or the senior year. The designated core courses change each semester (for 20072008, COM L 423 [fall], COM L 422 [spring]. If elected, an honors essay will also count as one of these required five courses.

An honors essay (COM L 493) of roughly 50 pages is optional. It is to be written during the senior year under the direction of a faculty member, preferably from within the department, who has agreed to work in close cooperation with the student. Students are urged to begin research on their thesis topic during the summer preceding their senior year.

Students who elect to do a double major with another literature department may count up to three courses from that major toward their requirements in Comparative Literature

The department encourages students to study abroad in pursuit of their cultural and linguistic interests, and the number of courses that may be counted toward the major will be determined in consultation with the faculty advisor and with the approval of the director of undergraduate studies.
The major enables students to pursue this commitment to a comparative study that includes a substantial non-English component by offering two tracks.
A. Comparative Literary Studies. This track is designed for students who wish to place greater emphasis on literary study in their course work. Students who select this track are required to complete:

1. Five courses in Comparative Literature at the 200 level and above.
2. Five courses in literature or other areas of the humanities at the 200 or higher level, to be taken in one or more foreign literature departments. Texts must be read in the original language A student may offer one advancedlevel foreign language course (conversation, composition, etc.) toward fulfilling this requirement.
B. Literary, Visual, and Media Studies. This track is designed for students who wish to pursue their comparative study of literature and theory by integrating rigorous work on film, video, or other arts
and media. Students who select this track are required to complete
3. Four courses in literary study at the 200 or higher level offered by the Department of Comparative Literature or other humanities departments or programs.
4. Six courses in visual arts or media studies at the 200 or higher level offered by the Department of Comparative Literature or other humanities departments or programs
The following guidelines might be used to determine whether a course in Literary, Visual, and Media Studies may be counted toward the five courses in non-English cultural study required of all majors. Where the media involve a large component of speech or writing (such as film, video, or hypertext), the student would need to work with this material in the original foreign language. Where text or speech in a foreign language is peripheral in a course that focuses on visual material (such as art or architecture) from non-English cultures, the student would need to draw on primary and secondary materials in a foreign language for oral reports, papers, and so forth. Because of the flexibility and interdisciplinary range of this track, students who select it should work closely with their faculty advisor to organize a coherent plan of study and to determine, with the approval of the Director of Undergraduate Studies, which courses satisfy the foreign language requirement of the major.

## Honors

A student who completes the requirements for the major is eligible for the degree of bachelor of arts with honors in Comparative Literature. The department bases its decision on the students achieving grades of at least B+ on the senior essay, in course work for the major, and in their overall academic performance at Cornell.

## First-Year Writing Seminars

Most 100 -level courses may be used toward satisfying the first-year writing seminar requirements. See "John S. Knight Institute for Writing in the Disciplines" for a full description of the first-year seminar program

## Courses

COM L 200(2000) Introduction to Visual Studies (also VISST 200[2000], ENGL 292[2920]) (LA-ASI
Spring. 4 credits. Staff.
For description, see VISST 200.
COM L 201(2010) Great Books \# (LA-AS)
Fall. 4 credits. COM L 201 and 202 may be taken independently of each other.
H. Emmert.

A reading of seminal texts that represent and have shaped Western culture and hence form an essential part of the student's intellectual equipment. By evaluating and interpreting selections from the Bible, Homer, Sophocles, Seneca, Dante, Castiglione, and Shakespeare, students gain practice in critical reading, thinking, and writing

## COM L 202(2020) Great Books (LA-AS)

Spring. 4 credits. A. Banerjee.
The course traces the evolution of the story of the road as theme, trope, and organizing principle of seminal books from the Renaissance to the postmodern. Through
readings of Rabelais, Cervantes, Swift, Sterne, Twain, Gogol, Conrad, Hemingway, Nabokov, and Kerouac, we will explore how literary adventures structure our experience of the world.

## COM L 203(2030) Introduction to Comparative Literature (LA-AS)

Fall. 4 credits. P. Liu.
The course is intended to answer the question persistently asked by undergraduates: "What is Comparative Literature, anyway?" We will read texts from a wide range of national cultures, genres, and historical periods (from Roman comedy to postmodern Japanese fiction) to develop some tentative answers. In the first section of the course, "Text and Language," we will read literature as a product of linguistically specific cultures in order to understand why we Comparatists work in multiple languages. In "Comparing Cultures," we will learn different models for studying cultures in a comparative or transnational framework. Finally, we will explore "the Question of World Literature" with the help of literary and philosophical works, and we will think about how the discipline of Comparative Literature might contribute to these debates.

## COM L 204(2040) Global Fictions (CA-AS)

Spring. 4 credits. N. Melas.
This course will be an introduction and an inquiry into global perspectives on fiction. Can the reading of fiction point us towards becoming citizens of the world? How might we know this world? How might we imagine it? We will consider the condition of the stranger in this global era as well as construct a geography of reading. Readings will be drawn mainly but not only from the contemporary period and outside Europe. Readings will change depending on instructor, but may include works of Rushdie, Marquez, Conde, Munif, Castellanos, Oe, Ngugi, Wolf, Kincaid, and Homer.

## [COM L 205|2050) Introduction to Poetry

 [LA-AS]Fall. 4 credits. Next offered 2008-2009.
W. J. Kennedy.]

COM L 213(2130) Cultures of the Middle Ages (also ENGL 213[2130]) " (CA-AS)
Spring. 4 credits. A. Galloway
For description, see ENGL 213.
[COM L 215(2150) Comparative American Literatures (also AM ST 215[2150]) (LA-AS)
Spring. 4 credits. Limited to 15 students.
Next offered 2008-2009. B. Maxwell.]
[COM L 220(2200) Thinking Surrealisms (also ART H 219[2019], VISST $219[2190]$ ) (LA-AS)
Spring. 4 credits. Next offered 2008-2009. B. Maxwell.]

COM L 231(2310) Holy War, Jihad, Crusade (also HIST 269[2691], JWST 251[2651], NES 251[2651]) © \# (HA-AS)
Fall. 4 credits. R. Brann.
For description, see NES 251
COM L 248(2480) Literatures of Exile and Return
Spring. 4 credits. H. Emmett.
This course examines Classical texts from Greece and Rome in comparison with contemporary works in English in order to track both the shifts and the continuities of the theme of exile and its associated concepts:
otherness, dehumanization and dispossession, recognition, refuge and belonging. We will focus on the historical circumstances of each text's production, but at the same time investigate the ways in which these diverse texts raise common questions about what it means to be human. Readings will include The Odyssey of Homer, Ovid's Metamorphoses and Euripides' Medea alongside selected modern texts that may include Margaret Atwood's Penelopiad, Derek Walcott's Omeros, David Malouf's An Imaginary Life, and Toni Morrison's Beloved.

COM L 276(2760) Desire (also ENGL 276[2760], THETR 278[2780], FGSS 276[2760]) (LA-AS)
Spring. 4 credits. E. Hanson.
For description, see ENGL 276.
COM L 293(2930) Middle Eastern Cinema (also NES 293[2793], FILM 293[2930], VISST 293[2193], JWST 291[2793]) © (LA-AS)
Fall. 4 credits. Limited to 15 students. D. Starr.

For description, see NES 293.
COML 302(3020) Liferature and Theory (LA-AS)
Fall. 4 credits. C. Caruth.
An introduction to literary theoretical thinking, focusing on 20th-century structuralism, poststructuralism and contemporary theory. Readings by Saussure, Barthes, Eichenbaum, Freud, Derrida, De Man, Felman, Cixous, Baudrillard, among others. No previous knowledge of literary theory is assumed.
[COM L 304(3040) Europe and Its Others: An Introduction to the Literature of Colonialism © (LA-AS)
Fall. 4 credits. Next offered 2008-2009. N. Melas.]
[COM L 306(3060) Comparative Martial Arts Film and LIterature © (LA-AS)
Fall. 4 credits. Next offered 2008-2009. P. Liu.]

## [COM L 317(3170) Postcolonial State

 Theory (CA-AS)Spring. 4 credits. Next offered 2008-2009. P. Liu.]

## COM L 326(3260) Christianity and

 Judaism (also RELST 326[3260]) " (LA-AS)Spring. 4 credits. C. Carmichael.
Study of the New Testament as a product of the first-century Palestinian and Hellenistic Judaism. Other text (also in translation): The Passover Haggadah.
[COM L 328(3280) Literature of the Old Testament (also RELST 328[3280]) © \# (LA-AS)
Fall. 4 credits. Next offered 2008-2009. C. M. Carmichael.]

COM L 329(3290) The Mistory and Theory of Sexualliy in Europe since Freud Fall. 4 credits. C. Dean.
This course will provide an introduction to the various lines of inquiry informing "the history of sexuality." The course asks how historians and others constitute sexuality as an object of inquiry, and addresses different theoretical currents upon which historians draw.

COM L 330(3300) Political Theory and Cinema (also GERST 355[3550], GOVT 370[3700], FILM 329[3290]) (CA-AS)
Spring. 4 credits, G. Waite.
For description, see GERST 355.
[COM L 344|3440) Tragic Theatre (also CLASS 345[3646], THETR 345[3450]) \# (LA-AS)
Fall. 4 credits. Next offered 2009-2010. F. Ahl.]

COM L 348(3480) Shakespeare and Europe (also ENGL 349[3490]) (LA-AS)
Fall. 4 credits. W. J. Kennedy.
In their own times, Shakespeare's plays registered a strong interest in the culture and society of Renaissance Europe beyond England. In later times, they cast a powerful spell over culture and society in 19th- and 20th-century Europe. This course will examine their debts to and influences upon continental drama. Readings will focus upon
Shakespeare's plays in relation to Italian comedy, early French tragedy, and plays by Anton Chekhov, Bertolt Brecht, and Yasmina Reza.
COM L 353(3530) Monsters A-X-files (also FREN 353/FGSS 353[3530]) \# [CA-AS]
Fall. 4 credits. K. Long.
For description, see FREN 353.
COM L 356(3560) Renaissance Literature: "Blood Politics" (also ENGL 320[3200] \# (LA-CA)
Fall. 4 credits. P. Lorenz.
The course examines the problem of "blood" not only as a marker of racial, religious, and sexual difference, but also as a dramatic player in the (early?) modern historical imagination. How does a politics of blood appear on stage at a time when populations are being simultaneously expelled and colonized for reasons related to blood? How does drama (dis)figure an ideology of blood? In the course of trying to answer these questions, we will read plays by Shakespeare, Marlowe, Webster, Kyd, Cervantes, Lope de Vega, and Calderón. Topics include Honor, Revenge, Purity, the Body, Sexuality,
Conversion and Death.
[COM L 362(3620] The Culture of the Renaissance II (also ENGL 325[3250], HIST 364[3640], MUSIC 390[3242], ART H 351[3420], FREN 362[3620]) \# (CA-AS)
Fall. 4 credits. Required F sec. Next offered 2008-2009. W. J. Kennedy.]

## [COM L 363(3630] The European Novel \#

 (LA-AS)Fall. 4 credits. Next offered 2008-2009.
N. Saccamano.]

COM L 364(3640) The European Novel \# (LA-AS)
Spring. 4 credits. A. François. From Lafayette to Proust. Topics will include: the interplay between fiction, desire and forms of identity; the intersection between novelistic form and European social and intellectual history; realism, romance, and the novel's political unconscious; the privileging of plots of adultery, surveillance, and policing; the role of gender in defining the genre and, in particular, the concept of "character"; the representation of first-person experience through third-person narration. Authors may include: Madame de Lafayette, Austen, Balzac,

Stendhal, Flaubert, Tolstoy, Kafka, Woolf, and Proust. All texts in English translation, but may of course be read in the original by students with command of the pertinent language.
COM L 365(3650) Contemporary Fiction © (LA-AS)
Fall. 4 credits. D. Castillo.
The course is designed to give you a snapshot of the rich development of fiction and drama from the second half of the twentieth century. One thematic thread will be the development of literary characterizations under the pressure of world historical events (war, terrorism, revolution); we will be equally interested in exploring structural and technical aspects of the works. Texts will be read in translation and will include works chosen from: Brecht, Mother Courage; Gambaro, Information for Foreigners; Beckent, Endgame; Grass, Tin Drum; Spiegelman, Maus; Azuela, Underdogs; Ha Jin, Waiting; O'Brien, The Tbings Tbey Carried; Danticat, Dew Breaker, Acker, Empire of the Senseless; Farah, Maps; Hemingway, Fareuell to Arms; Valenzuela, Other Weapons; Lessing, Briefing for a Descent into Hell; Pynchon, Gravity's Rainbow.
COM L 373(3730) Literature of the Outlaw (also ENGL $371[37101$ ) \# (LA-AS)
Fall. 4 credits. B. Maxwell.
The course draws on the worid's storehouse of writing, song, and film about bandits, pirates, malingerers, revolutionary appropriators, and other defectors from the sacral order of property. Loyalty and betrayal will concern us, as will the melancholy relationship of outlawry and the passing of historical eras. Aesthetics, ethics, and political economy will guide our enquiries. We'll study several tellings of the legend of Robin Hood, as well as Kleist, Michael Kohlhaas; Kemal, Memed, My Hawk; Genet, The Thief's Journal; Akutagawa, "Rashomon" and "In a Grove"; Kurosawa, Seven Samurai; material by and about Phoolan Devi, India's "Bandit Queen"; the Jamaican film The Harder They Come, excerpts from the immense Chinese novel Outlaws of the Marsh, and Jim Jarmusch's film Gbost Dog: The Way of the Samurai.

COM L 383(3830) Subversive Readings, Intertexts in Feminist Theory (also FGSS 379[3790], S HUM 421[4210])
Spring. 4 credits. D. Reese.
For description, see S HUM 421.
[COM L 386(3860) Literature and Film of South Asia (also ASIAN 387[3387], VISST 387[3870]) © (CA-AS)
Fall. 4 credits. Next offered 2008-2009. A. Banerjee.]

## COM L 393(3930 International Film of the

 1970s lalso FILM 393[3930], AM ST 393[3930], VISST 393[3930]) (LA-AS)Fall. 4 credits. S. Haenni.
For description, see FILM 393.
COM L 398(3980) Theorizing Gender and Race in Asian Historles and Literatures (also COM L 668[6680], ASIAN 388[3880]/688[6880], FGSS 658[6580]) © (CA-AS)
Spring. 4 credits. N. Sakai.
For description, see ASIAN 388.

COM L 399(3990) Canonical States, Canonical Stages (also FREN 389[3890])
Spring. 4 credits. M. Greenberg.
The course will be a comparative reading of several 17th-century tragedies. The authors we will read will be Shakespeare, Lope de Vega, Calderon. Comeille, and Racine. The course will attempt to delimit the origins of the modern state in the exclusionary practices that 17th-century tragedy stages for both contemporary (to the plays) audiences and to 21st-century audience. Our critical apparatus will borrow from different theories of ideology and subjectivity, as they pertain to the theatrical experience

## [COM L 400(4000) Forms of the Novel

 (LA-AS)Fall. 4 credits. Next offered 2008-2009. P. Liu.]
[COM L 401(4010) Open Secrets: Studies in Narrative (also ENGL 401[4010]) (LA-AS)
Fall. 4 credits. Limited to 15 students. Next offered 2008-2009. A. François.]

COM L 404(4040) Troubadours and Heretics (also FREN 404[4040])
Fall. 4 credirs. R. Klein.
For description, see FREN 404.
COM L 406.01(4061) The Task of the Cleric (also S HUM 404[4040], SPAN 404[4040])
Fall. 4 credits. S. Pinet.
For description, see S HUM 404

## COM L 406.02(4061) Poetry and Totality

 (also S HUM 416[4160])Fall. 4 credits. C. Nealon
For description, see S HUM 416.
COM L 406.03(4063) On the Inner Voice (also S HUM 418[418])
Fall. 4 credits. D. Riley.
For description, see S HUM 418.
COM L 408(4080) Martial Arts Film and Literature: Globalization from the East (also ASIAN 452[4452]
Fall. 4 credits. P. Liu.
Mandatory weekly film viewings to be held on Wednesdays.

With recent blockbusters such as Kill Bill, Kung Fu Hustle, Hero, and The Matrix, a cultural practice from the East called "martial arts" has transformed itself from a spiritual and bodily discipline in medieval China into a popular visual spectacle housed in transnational cinema and arcade games. This course studies the Asianization of global postmodern culture by comparing the historical routes, institutional bases, and ideologies of representations of martial arts in film and literature. Our questions will include the historical origins of martial arts and martial arts cinema; differences between "wuxia" and "kung fu"; contemporary Hong Kong, Taiwan, and Hollywood popular culture; Orientalism, race, and masculinity in transnational cinema; kinship, rites, honor, and duty in Chinese societies; kung fu as philosophy; and the relation of martial arts to women, ethics, nation, work and pleasure.
[COM L 410(4100) Science, Technology, and Culture (also S\&TS 412[4101]) (CA-AS)
Fall. 4 credits. Next offered 2008-2009. A. Banerjee.]

CoML $411.01(4111)$ The Mediterranean in the Age of Cervantes (also S HUM 424[4240], SPAN 434[4340])
Spring. 4 credits. A. Garces.
For description, see S HUM 424
COM L $411.02(4112)$ Cerebral Seductions (also S HUM 425[4250])
Spring. 4 credits. W. Jones.
For description, see S HUM 425
COM L 411.03(411.03) Cutting and Film Cutting (also S HUM 421[4210], FGSS 379[3790])
Spring. 4 credits. S. Fathy.
For description, see S HUM 421

## [COM L 415(4150) The Theory and Analysis of Narrative (LA-AS) <br> Spring. 4 credits. Next offered 2008-2009. J. Culler.]

COM L 419-420(4190-4200) Independent Study
419, fall; 420 , spring. Variable credit. COM L 419 and 420 may be taken independently of each other. Applications available in 247 Goldwin Smith Hall.

COM L 422(4220) Literature and Oblivion (LA-AS)
Spring. 4 credits. Core course for COM L majors. Limited to 15 students. N. Melas. The monumental aspirations of literature to immortality date back as far as the earliest epics. This course will attempt a critical study of the powers of art against oblivion. We will start with the paradox whereby all language and especially poetic language necessarily destroys that which it seeks to preserve. just as a monument substitutes and thus overwhelms the very loss it commemorates. Since Arts monumentality sets it against the contingencies of history, a central concern will be the relation of art to history, particularly when art's negations encounter powerful workdly negations, such as those surrounding gender difference and colonial domination. Framed by Homer's Iliad and Derek Walcott's "postcolonial" Caribbean epic Omeros, the readings will also be a comparative exercise in reading across time and space and will include theoretical texts (Plato, Hegel, Nietzsche, Blanchot, Benjamin, Patterson) alongside literature. Particular attention in course time and writing assignments will be directed to improving critical writing skills.

COM L 423(4230) Borders (also SPAN 490[4900], LSP 423[4230])
Fall. 4 credits. Core course for COM L majors. Limited to 15 students. D. Castillo. This course will focus on literary works that thematize geographical, cultural, and linguistic borders berween cultures. languages, and sexual orientations. Topics will include discussion of immigration/exile/diaspora; representations of indigenous cultures and languages; transgender, transborder, transamerican voices. Texts may include films like Transamerica, Todo sobre mi madre. Happy Together, Sbabnam Mousi, Espaldas mojadas, narratives like Carson's Autobiography of Red, Schneebaum's Keep the River on your Right, Coetzee's Waiting for the Barbarians, Garcia's Monkey Hunting, Warner-Vieyra's As the Sorcerer Said. Theorists like Donna Haraway, Rey Chow, Walter Mignolo will provide context and background readings.

COM L 424(4240) The Animal (also ENGL 426[4260], GERST 426[4260]) (CA. AS)
Spring. 4 credits. P. Gilgen.
For description, see GERST 426.
COM L 425(4250) Marx, Nietzsche, Freud (also GERST 415[4150], GOVT 473[4730])
Fall. 4 credits. G. Waite.
For description, see GERST 415.
COM L 426(4260) New Testament Seminar (also RELST 426[4260]) * (HA-AS)
Spring. 4 credits. Limited to 15 students.
C. Carmichael.

Topic: Sex and religion in the Bible.
Identification and discussion of problems in the New Testament. Discussing attitudes to sexuality in the Bible, we will examine in Old and New Testament texts the clash between ancestral behavior and subsequent laws, as well as the contrast between legal and religious ideas. Topics will include: marriage and divorce, incest, intermarriage, gender discrimination, guilt and shame,
homosexuality, women and purity, sexual language and symbols. It should be possible to say something new about the topics and also, because of the perennial nature of the issues, to say something that is relevant to contemporary life.
COM L 428(4280) Biblical Seminar (also RELST 427[4280]) \# © (HA-AS]
Fall. 4 credits. Limited to 15 students.
C. Carmichael.

A study of how biblical ethical and legal rules (in Exodus, Leviticus, and Deuteronomy) comment on incidents in the biblical narratives (Genesis-2 Kings). The link between law and narrative enables us to observe in detail how ancient thinkers evaluate ethical and legal problems of perennial interest
[COM L 432(4320) Time and the Other
Spring. 4 credits. Next offered 2008-2009. N. Melas.]

COM L 438(4380) Arendt, Morisaki, Weil (also COM L 624[6240], ASIAN 468/668[4468/6668]) (KCM-AS)
Fall. 4 credits. Limited to 20 students. B. delary.

For description, see ASIAN 468.
[COM L 443(4430) Partitioned Postmodernity and Anomalous Colonies in East Asia
Spring. 4 credits. Limited to 15 students. Next offered 2008-2009. P. Liu.]
[COM L 450(4500) Renaissance Poetry [also COM L 650[6500]) " (LA-AS)
Spring. 4 credits. Next offered 2008-2009. W. J. Kennedy.]

COM L 452(4520) Renaissance Humanism (also COM L 652[6520]) * (LA-AS)
Spring. 4 credits. Limited to 15 students. W. J. Kennedy.

A reading and discussion of key texts by Renaissance humanists in Italian, French, English, and other European literatures from the 14 th to the 17 th centuries.

## COM L 454(4540) Modernity and Critique (also S HUM 426[4260]) <br> Spring. 4 credits. B. Maxwell. <br> For description, see S HUM 426.

COM L 455(4550) Memory, Past-memory, and the Construction of Victims
Fall. 4 credits. Limited to 15 students. C. Dean.

How have writers, historians, memoirists, and others approached the representation of victims in their work? How has the rhetoric of victimization, suffering, and atrocities in various narratives changed, particularly since the Second World War? This seminar will explore these questions primarily but not exclusively in the context of the genocide of European Jewry.

COML 456(4560) Michel Foucault and His Legacy
Spring. 4 credits. Limited to 15 students. C. Dean.

This course will focus on the concept of "critique" as it unfolds in the work of Michae Foucault, and in relation to the history of philosophy. We will explore the relationship between Foucault and historiography and Foucault and psychoanalysts.
[COM L 458(4580) Narratives of Travel, Migration, and Exile (CA-AS)
Fall. 4 credits. Limited to 15 students. Next offered 2008-2009. A. Banerjee.]
[COM L 470(4700) Translation and Cultural Difference (also ASIAN 481[4481]) © (KCM-AS]
Fall. 4 credits. Limited to 15 students. Next offered 2008-2009. N. Sakai.]

COM L 474(4740) Topics in Modern European Intellectual and Cultural History (also HIST 474[4740], JWST 474/674[4740/6740])
Spring. 4 credits. Prerequisite: permission of instructor. D. LaCapra.
Topic: History and critical theory. For description, see HIST 474.

## COM L 477(4770) Improvising Across the Disciplines (also S HUM 477[4770],

 HIST 477[4771])Fall. 4 credits. Limited to 15 students.
D. LaCapra

For description, see S HUM 477
[COM L 480(4800) Baudelaire in the Lyric Spring. 4 credits. Not offered 2008-2009 J. Culler.]

## [COM L 481(4810) Studies in Gender

 Theory: Kinship and Embodiment (also FGSS 480[4800]) (CA-AS)Spring. 4 credits. Limited to 15 students. Next offered 2008-2009, P. Liu.]

COM L 483(4830) Imagining the Holocaust (also ENGL 458/658[4580/6580], GERST 457[4570]) (LA-AS)
Spring. 4 credits. D. Schwarz.
For description, see ENGL 458
[COM L 486(4860) Contemporary Poetry and Poetics (also ENGL 488[4880], FREN 435[4350], SPAN 474[4740]) (LA-AS)
Fall. 4 credits. Next offered 2008-2009. J. Monroe.]

COM L 492(4920) India: Nation and Narration, History and Literature (also HIST 492[4920], ASIAN 494 [4940])
Spring. 4 credits. Limited to 15 students. D. Ghosh and A. Banerjee.

This course emerges from the history and literature of India in the 20th century. Taught by two scholars, one based in the history department and one based in comparative
literature, the readings and the films critically analyze some of the major cultural currents and political events of India by reading novels, political manifestoes, and viewing documentaries, films, visual images and architectural sites. This seminar begins with the premises of nationalism, how it is constructed, disseminated, challenged, and reassembled in the service of creating the idea of "India"; It then turns to partition, the traumatic division of the Indian nation in 1947, and how this critical event has been represented in fiction, film, and history. The latter half of the course challenges ideas of Indian nationalism by using studies of space and the production of epics and history to imagine how Indian communities might be constituted in the extended postcolonial moment we are in.

## COM L 493(4930) Senior Essay

Fall and spring. 8 credits.
Times TBA individually in consultation with director of Senior Essay Colloquium. Approximately 50 pages to be written over the course of two semesters in the student's senior year under the direction of the student's advisor. An R grade is assigned on the basis of research and a preliminary draft completed in the first semester. A letter grade is awarded on completion of the second semester.

## COM L 496(4960) Imagining the Mediterranean (also NES 438[4738], JWST 438[4738]) © (LA-AS)

Fall. 4 credits. G. Holst-Warhaft.
For description, see NES 438.
[COM L 609(6090) Comparison and Cultural Difference
Fall. 4 credits. Next offered 2008-2009. N. Melas.]

COM L 614(6140) Ut pictura poesis: Keats and the Aesthetic Tradition
Spring. 4 credits. Limited to 15 students. A. Francois.

Offers a close study of Keats's poetry and letters in dialogue with European aesthetic theory and aestheticism as well as with his Victorian and modernist successors. Focus will be on: the analogy of visual to aural experience; poetry's jealousy of its sister-art (painting)'s capacity for silent presentation; the problem of Romantic Hellenism, "modernity" and lyric temporality; the relationship between aestheticism, colonialism, consumerism, and the rise of museum-culture; questions of pleasure, bearing witness to suffering, and asceticism. Writers will include: Lessing, Kant, Hegel, Keats, Tennyson, Swinburne, Rossetti, Pater, Ruskin, Hugo, Baudelaire, Valéry, Rilke. Stevens and Adorno.

COM L 615(6150) Trauma, Time, and History
Fall. 4 credits. Limited to 15 students. C. Caruth.

This course will examine new notions of time and history as they emerge from the confrontation of psychoanalysis with war and other catastrophic events. We will pay particular attention to traumatic temporality as it informs the conceptualization of political history in the 20th and 21st centuries. Psychoanalytic and political texts will be placed in conversation with literature and literary theory to consider problems of repetition, erasure, witness, and event. Theoretical authors will include Freud, Davoine and Gaudilliêre, Felman, Lifton, Arendt, Pandey, De Man and Derrida, among others.

COM L 616[6160) Translation, In Theory (also ASIAN 619[6190], VISST 619[6190])
Spring. 4 credits. B. deBary
For description, see ASIAN 619.
COM L 617(6170) Readings in Cultural Materialism: Theory and Practice (also HIST 614[6140])
Spring. 4 credits. K. Hirano.
For description, see HIST 614.
COM L 618(6180) Hegel's Phenomenology Spirit (also GERST 618[6180])
Fall. 4 credits. P. Gilgen.
For description, see GERST 618.
COM L 619-620(6190-6200) Independent Study
619, fall; 620, spring. Variable credit. COM L 619 and 620 may be taken independently of each other. Applications available in 247 Goldwin Smith Hall.

COM L. 624(6240) Arendt, Morisaki, Weil (also COM L 438[4380], ASIAN 468/668[4468/6668])
Fall. 4 credits. B. deBary.
For description, see ASIAN 468.
[COM L 630(6300) Aesthetics in the 18th Century (also ENGL 630[6300])
Fall. 4 credits. Next offered 2008-2009.
N. Saccamano.l

COM L 634(6340) Deleuze and Lyotard: Aesthetics (also ENGL 629[6290], FREN 672[6720], VISST 634[6340])
Spring. 4 credits. T. Murray.
The course will discuss the aesthetic, political, and cultural implications of the writings of French philosophers, Gilles Deleuze and JeanFrançois Lyotard. Their differing approaches to the excess of aesthetics and artistic practice helped shape influential theories of space, figuration, and time that continue to influence discussions of postmodernism, minority writing, terrorism, social justice, and global memory. Crucial to their work is the value of artistic practice and analysis to the overall project of understanding an aesthetics of engagement. Particularly important to both is the importance of technological and electronic innovations in cinema, painting, video, and new media to the theorization of social subjectivity in a global age, particularly on the edge of abstraction.

## [COM L 636(6360) Comparative

Modernisms/Alternative Modernities
Fall. 4 credits. Limited to 15 students. Next offered 2008-2009. N. Melas.]
[COM L 638(6380) Comparative Literacy: The 18 th C and Literary Modernity (also ASIAN 626[6626])
Spring. 4 credits. Next offered 2009-2010. N. Sakai.]
[COM L 641(6410) Derrida, Writing, and the Institution of Literature (also ENGL 441/642[4410/6420])
Spring. 4 credits. Next offered 2008-2009 J. Culler.]
[COM L 650(6500) Renaissance Poetry (also COM L 450[4500], ENGL 622[6220])
Spring. 4 credits. Next offered 2008-2009. W. J. Kennedy.]

## COM L 652(6520) Renaissance

 Humanism (also COM L 452[4520]) Spring. 4 credits. Limited to 15 students. W. J. Kennedy.A reading and discussion of key texts by Renaissance humanists in Italian, French, English and other European literatures from the fourteenth to seventeenth centuries.

## COM L 663(6630) Nietzsche and

Heldegger (also GERST 663[6630])
Fall. 4 credits. G. Waite
For description, see GERST 663.
COM L 667(6670) Rethinking the Symbolic (also FREN 667[6670])
Spring. 4 credits. Limited to 15 students T. McNulty.

For description, see FREN 667
COM L 668(6680) Theorizing Gender and Race in Asian Histories and Literatures with a Particular Focus on Japanese Cases (also COM L 398[3980], ASIAN 388/688[3388/6688])
Spring. 4 credits. N. Sakai.
For description, see ASIAN 388.

## COM L 671(6710) Transnational

 Imaginaries: Globalization and CultureFall. 4 credits. Limited to 15 students. N. Melas.

This course will provide an introduction to recent writings surrounding globalization in that shifting borderland berween the humanities and the social sciences, focusing on some theoretical implications rather than attempting a comprehensive survey. We will dwell specifically on (1) theoretical articulations of capitalism's global spread (principally in Marx, Wallerstein, Hardt and Negri); (2) theoretical and cultural articulations and responses to commoditization and privatization as the primary material manifestation of globalization in everyday life; and (3) re-articulations of the pairing global/ local in theoretical and cultural texts. Readings will be divided between critical expository texts and fictional texts (including both literature and visual arts). Knowledge of a language other than English recommended but not required.

## COM L 673(6730) Topics in Modern

 European Intellectual and Cultural History (also HIST 673[6730], JWST 674[6674])Fall. 4 credits. D. LaCapra.
For description, see HIST 673.
[COM L 675(6750) Critical Passions (also ENGL 675[6750])
Spring. 4 credits. Next offered 2008-2009. A. Francois.]

## COM L 676(6760) Being Historlical in Literary Studies

Spring. 4 credits. Limited to 15 students C. Dean.

This seminar will inquire into the increased importance of "history" in literary studies: "history" as it is conceived in Derridean terms but also in the works of those who sought to move beyond the perceived limits of deconstruction and post-structuralism more generally. It will explore the vexed relationship between literary theorists' conceptions of history and how historians define the conventions of their discipline.
[COM L 680(6800) Baudelalre In the Lyrlc Spring. 4 credits. Next offered 2008-2009. J. Culler]

## COM L 682(6820) Cultural Materialism

 and GeopoliticsSpring. 4 credits. Limited to 15 students. P. Liu.

This course examines the foundational texts in "cultural materialism" (Marx, Lukacs, Gramsci, Althusser, Spivak, Williams, Hall) and the implications of a dualistic construction of material vs. cultural life for contemporary geopolitical thinking. We will be interested in the different ways in which tropes of "matter" and "world" have been appropriated to delineate new temporal and spatial relations in postcolonial conversations (Said, Lye, Mbembe, Gilroy). By paying special attention to debates about uneven development, the materiality of race and the body, and alternative modernities, we will seek to understand "materialism" itself as a geopolitically shifting and multiply constituted notion.
[COM L. 688(6880) Wordsworth and Rousseau (also ENGL 741[7410])
Spring. 4 credits. Next offered 2008-2009. C. Chase.]

## [COM L 689(6890) Adorno's Aesthetic

 Theory (also GERST 689[6890]) Fall. 4 credits. Next offered 2008-2009. P. Hohendahl.][COM L 692(6920) Digital Bodies, Virtual Identities (also ENGL 696[6960], THETR 633[6330])
Fall. 4 credits. Next offered 2008-2009. T. Murray.]

## [COM L 697(6970] Cosmopolitianism

 (also ENGL 697[6970])Spring. 4 credits. Next offered 2008-2009. N. Saccamano.]

## COMPUTER SCIENCE

E. Tardos, chair; G. Bailey, K. Bala, K. Birman, C. Cardie, R. Caruana, R. L. Constable, D. Fan, P. Francis, J. Gehrke, D. Greenberg,
D. Gries, J. Halpern, J. E. Hopcroft,
D. Huttenlocher, D. James, T. Joachims,
U. Keich, J. Kleinberg, R. Kleinberg, D. Kozen,
L. Lee, S. Marschner, A. Myers, R. Pass,
R. Rugina, F. B. Schneider, D. Schwartz,
B. Selman, D. Shmoys, E. G. Sirer, E. Tardos, R. Teitelbaum, C. Van Loan, R. Zabih

The Department of Computer Science is affiliated with both the College of Arts and Sciences and the College of Engineering. Students in either college may major in Computer Science. For details, visit our web site at www.cs.cornell.edu/ugrad.

## The Major

CS majors take courses in algorithms, data structures, logic, programming languages, scientific computing, systems, and theory. Electives in artificial intelligence, computer graphics, computer vision, databases, multimedia, and networks are also possible. Requirements include:

- three semesters of calculus (MATH 111122 (or 112)-221 or 191-192-294)
- two semesters of introductory computer programming (CS 100 and 211)
- a 1-credit project (CS 212)
- a seven-course Computer Science core (CS 280, 312, 314 or 316 ; one of 321,322 , 421,422 , or $428 ; 381,414$, and 482)
- two $400+$ Computer Science electives, $3+$ credits each, totaling at least 6 credits (CS 490 not allowed)
- a Computer Science project course (CS 413, 415, 419, 433, 466, 473, 501, 514, or 664)
- a mathematical elective course (eg., ENGRD 270, MATH 222 or 293, MATH 300+, T\&AM 310)
- two $300+$ courses that are technical in nature and total at least 6 credits
- a three-course specialization in a topic area other than Computer Science. These courses must be numbered 300 level or greater.
Note: All of the field electives described above must be courses of 3 or more credit hours with the exception of the CS project course, which is 2 credits or more.
The program is broad and rigorous, but it is structured in a way that supports in-depth study of outside areas. Intelligent course selection can set the stage for graduate study and employment in any technical area and any professional area such as business, law, or medicine. With the advisor, the Computer Science major is expected to put together a coherent program of study that supports career objectives and is true to the aims of liberal education.


## Admission

All potential affiliates are reviewed on a case-by-case basis relative to the following criteria:

- a grade of C or better in all CS courses and MATH courses
- a GPA of 2.5 or better in CS 211, 212, and 280.
- a GPA of 2.5 or better in MATH 112, 122, or 192 and CS 280.
Courses used in the affiliation GPA computations may be repeated if the original course grade was below a C . The most recent grade will be used for all repeated courses. Qualifying courses must be taken at Cornell.
Departmental honors in Computer Science is granted to students who have maintained a cumulative GPA greater than or equal to 3.5 and completed a set of coherent courses and research activities that satisfy the following requirements:
- at least one CS course (at least 3 credit hours) at or above the 500 level with a grade of A- or better; no seminars.
- at least two 3-credit semesters of CS 490 (Independent Research) with a CS faculty member, with grades of A- or better each semester.
Latin Designations (appended to the degree), awarded by the field of Computer Science for all who qualify as stated above, are based on the final cumulative GPA, as follows:
- cum laude, 3.50 or above
- magna cum laude, 3.75 or above
- summa cum laude, 4.00 or above

Note: Honors courses may not be used to satisfy the CS $400+$ elective requirement, the CS project requirement, the math elective, the technical electives, or the specialization. See the CS undergraduate web site for more information on eligibility: www.cs.cornell.edu/ ugrad.

## Computing in the Arts Undergraduate Concentration

A concentration in Computing in the Arts with an emphasis on computer science is available both to Computer Science majors and to students majoring in other subjects. For more information, see p. 513

## Courses

For complete course descriptions, see "Computer Science" under "Computing and Information Science (CIS)."

## C5 099(1109) Fundamental Programming Concept:

Summer. 2 credits. Freshmen only. Prerequisites: none. S-U grades only

CS 100(1110, 1112) Introduction to Computer Programming (MOR)
Fall, spring, summer. 4 credits. Students
may not receive credit for botb CS 100 and BEE 151.
Four versions of CS 100 are offered. CS 100 H , CS $100 \mathrm{~J}, \mathrm{CS} 100 \mathrm{M}$, and CS 100 R . All versions are described in the "Computing and Information Science (CIS)" section.
cs 101J(1130) Transition to Objectorlented Programming
Fall, spring, summer. 1 credit. Prerequisite: one course in programming. S-U grades only.

Cs 101M(1132) Transition to Matlab Fall, spring, summer. 1 credit.
Prerequisites: One course in programming.
S-U grades only.
Cs $113(2000)$ Introduction to C Fall, spring, usually weeks $1-4,1$ credit Prerequisite: CS 100 or equivalent programming experience. Credit granted for both CS 113 and 213 only if 113 taken first. S-U grades only

## C8 114(2006) Unix Tools

Fall, usually weeks 5-8. 1 credit. Prerequisite: CS 100 or equivalen programming experience. Recommended: knowledge of at least one programming language. S-U grades only.

C8 130(1300) Introductory Design and Programming for the Web (also INFO 130[1300])
Fall. 3 credits. Prerequisites: none. No computer background necessary.

C8 165(1610) Computing In the Arts (also ART 175, GIS 185[1610], ENGR 185[1610], MUSIC 165[1465], PSYCH 165[1650])
Spring. 3 credits. Recommended: good comfort level with computers and some of the arts.

Cs 167(1820) Visual Imaging In the Electronic Age (also ARCH 459[4509], ART 170[1700], cIS 167[1620], ENGRI 167[1670])
Fall. 3 credits.
For description, see ART 170.
Cs 170(1710) Introduction to Cognitive Science (also COGST 101[1101], LINQ 170[1170], PHIL 191[1910], PSYCH 102[1200]) (KCM-As) (formerly Cs 101)
Fall, summer. 3 credits.
For description, see COGST 101.
[CS 172(1700) Computation, Information, and Intelligence (also COGST 172, ENGRI 172(1700], INFO 172[1700]) (MQR)
Fall or spring. 3 credits. Prerequisite: some knowledge of differentiation; freshman standing or permission of instructor. Next offered 2008-2009.]

Cs 211(2110) Object-Oriented Programming and Data Structures (also ENGRD $211[2110$ ]) (MOR)
Fall, spring, summer. 3 credits. Prerequisite CS 100J, CS 101J, or CS 100 H or CS 100 M if completed before fall 2007 or equivalent course in Java or C++

CS 212(2111) Programming Practicum Fall, spring. 1 credit. Pre- or corequisite CS/ENGRD 211. Letter grades only

CS 213(2002) C+4 Programming
Fall. 2 credits. Prerequisite: CS 100 or equivalent programming experience. Students who plan to take CS 113 and 213 must take 113 first. S-U grades only.

## CS 214(2008) Advanced UNIX

 Programming and ToolsSpring, usually weeks 5-8. 1 credit. Prerequisite: CS 114 or equivalent. S-U grades only.
Cs 215(2004) Introduction to C
Spring, usually weeks 5-8. 1 credit.
Prerequisite: CS/ENGRD 211 or equivalent experience. S-U grades only

Cs 230(2300) Intermediate Design and Programming for the Web (also INFO 230[2300])
Spring. 3 credits. Prerequisite: CS 130 or equivalent knowledge.
Cs 280(2800) Discrete Structures (MOR)
Fall, spring. 3 credits. Pre- or corequisite:
CS 100 or permission of instructor.
Cs 285(2850) Networks (also ECON 204[2040], INFO 204[2040], SOC 209[2090]) (SBA-AS)
Spring. 4 credits. Prerequisites: none.
CS 312(3110) Data Structures and Functional Programming (MQR)
Fall, spring. 4 credits. Prerequisite: CS 211 and 212 or equivalent programming experience. Should not be taken concurrently with CS 314 or 316.

Cs 314(3420) Computer Organization (also ECE 314[3140])
Spring. 4 credits. Prerequisite: CS 211 or ENGRD 230. Should not be taken concurrently with CS 312.

CS 316(3410) Systems Programming
Fall. 4 credits. Prerequisites: CS 211 or equivalent programming experience. Should not be taken concurrently with CS 312.
[CS 321(3510) Numerical Methods in Computational Molecular Biology (also BIOBM 321[3210], ENGRD 321[3510]) (MOR)
Fall. 3 credits. Prerequisites: at least one course in calculus (e.g., MATH 106, 111, or 191) and course in linear algebra (e.g., MATH 221 or 294 or BTRY 417); CS 100 or equivalent and some familiarity with iteration, arrays, and procedures; knowledge of discrete probability and random variables at the level of CS 280.]

CS 322(3220) Introduction to Sclentific Computation lalso ENGRD 322[3220]
Spring, summer. 3 credits. Prerequisites: CS 100 and MATH 221 or 294; knowledge of discrete probability and random variables at the level of CS 280.

Cs 324(3470) Computatlonal Linguistics (also coast 424[4240], LING 424[4424]) (MQR-AS)
Fall or spring. 4 credits. Prerequisites: LING 203. Labs involve work in UNIX environment; CS 114 recommended.
For description, see LING 424.
Cs 330(3300) Data-Driven Web Appllcatlons (also INFO 330[3300]) Fall. 3 credits. Prerequisite: CS/ENGRD 211 CS majors may use only one of the following toward their degree: CS/INFO 330 or CS 433

CS 372(3700) Explorations in Artificial Intelligence (also INFO 3723720]) Spring. 3 credits. Prerequisites: MATH 111 or equivalent, a statistics course, and CS/ ENGRD 211 or permission of instructor.

CS 381(3810) Introduction to Theory of Computing
Fall, summer. 3 credits. Prerequisite: CS 280 or permission of instructor.
[CS 400(4150) The Sclence of Programming
Fall. 3 credits. Prerequisite: CS 211.]

## (CS 411(4110) Programming Languages

 and LogicsFall. 4 credits. Prerequisite: CS 312 or permission of instructor.]

Cs 412(4120) Introduction to Compilers Spring. 3 credits. Prerequisites: CS 312 (or permission of instructor) and CS 314 or 316. Corequisite: CS 413.

CS 413(4121) Practicum In Compllers Spring. 2 credits. Corequisite: CS 412.

CS 414(4410) Operating Systems Fall, spring, summer. 3 credits. Prerequisite CS 314 or 316. Corequisite: CS 415 in spring only.
CS 415(4411) Practicum in Operating Systems
Fall, spring. 2 credits. Corequisite: CS 414.
CS 416[4420) Computer Architecture (also ECE 475)
Fall. 4 credits. Prerequisites: ENGRD 230 and CS/ECE 314.
For description, see ECE 475.
CS $419(4450)$ Computer Metworks Spring. 4 credits. Pre- or corequisites: CS 414 or permission of instructor.

CS 421(4210) Numerical Analysis and Differential Equations (also MATH 425[4250]) (MQR)
Fall. 4 credits. Prerequisites: MATH 221 or 294 or equivalent, one additional mathematics course numbered 300 or above, and knowledge of programming

Cs 422(4220) Numerical Analysis: Linear and Nonlinear Problems (also MATH 426[4260]
Spring. 4 credits. Prerequisites: MATH 221 or 294 or equivalent, one additional mathematics course numbered 300 or above, and knowledge of programming.

Cs 426(4520) Introduction to Bioinformatles
Spring. 4 credits. Prerequisites: CS/ENGRD 211, CS 280.
[CS 428(4510) Introduction to Computatlonal Blophysics
Fall. 3 credits. Prerequisites: CS 100, CHEM 211 or equivalent, MATH 221, 293, or 294, PHYS 112 or 213 , or permission of instructor. Recommended: BIOBM 330.]

Cs 430(4300) Information Retrieval (also INFO 430[4300]]
Fall. 3 credits. Prerequisite: CS 211 or equivalent.
Cs $431(4302)$ Web Information Systems (also INFO 431[4302])
Spring. 3 credits. Prerequisites: CS 211 and some familiarity with web site technology.
[Cs 432(4320) Introduction to Database Systems
Fall. 3 credits. Prerequisites: CS 312 (or 211, 212, and permission of instructor). Next offered 2008-2009.]

## [C8 433(4321) Practicum in Database

 SystemsFall. 2 credits. Pre- or corequisite: CS 432. CS majors may use only one of the following toward their degree: CS/INFO 330 or CS 433. Next offered 2008-2009.]
Cs 465(4620) Introduction to Computer Graphics (also ARCH 374[3740])
Fall. 3 credits. Prerequisite: CS/ENGRD 211.

## Cs 466(4621) Computer Graphics

 PracticumSpring. 2 credits. Pre- or corequisite: CS 465.

CS 472(4700) Foundations of Artificlal Intelligence
Fall. 3 credits. Prerequisites: CS 211 and 280 (or equivalent).

C8 473(4701) Practicum in Artificial Intelligence: Robotics and Embodied AI (also M\&AE 473[4730])
Fall. 2 credits. Pre- or corequisite: CS 472.
[C5 474(4740) Introduction to Natural Language Processing (also COOST 474[4740], LING 474[4474])
Fall or spring. 4 credits. Prerequisite: CS 211.]

## [C8 475[4702] Artificial Intelligence:

 Uncertainty and Multi-Agent SyatemsSpring. 4 credits. Prerequisites: CS/ENGRD 211 and CS 280 or equivalent.]
C8 478(4780) Machine Learning
Spring. 4 credits. Prerequisites: CS 280,312 , and basic knowledge of linear algebra and probability theory.

Cs 482(4820) Introduction to Analysis of Algorithms
Spring, summer. 4 credits. Prerequisites: CS 280 and 312.
[CS 483(4812] Quantum Computation (also PHYS 481/881[4481/7681])
Spring. 2 credits. Prerequisite: familiarity with theory of vector spaces over complex numbers. Not offered every year; next offered 2008-2009.
For description, see PHYS 481.]
[C8 485(4850) Mathematical Foundations for the Information Age
Spring. 4 credits. Prerequisite: CS 381.]

C5 486(4860) Applied Logic (also MATM 486[4860]) (MQR)
Fall or spring. 4 credits. Prerequisites: MATH 222 or 294, CS 280 or equivalent (e. g., MATH 332, 432, 434, 481), and some additional course in mathematics or theoretical computer science.
For description, see MATH 486.
Cs 487(4830) Introduction to Cryptography
Fall. 4 credits. Prerequisites: CS 280 (or equivalent), CS 381 (or mathematical maturity), or permission of instructor.
CS 490|4999) Independent Reading and Research
Fall, spring. $1-4$ credits.
C8 501(5150) Software Engineering Spring. 4 credits. Prerequisite: CS 211 or equivalent experience programming in Java or C++

CS 513(5430) System Security Fall. 4 credits. Prerequisites: CS 414 or 419 and familiarity with JAVA, C, or C* programming languages.

CS 514(5410) Intermediate Computer Systems
Spring. 4 credits. Prerequisite: CS 414 or permission of instructor.
CS 516(5420) Parallel Computer Architecture (also ECE 572[5720])
Fall. 4 credits. Prerequisite: ECE 475.
For description, see ECE 572.
[CS 519/5450) Advanced Computer Networks (also Cs 619[6450]) Fall or spring. 4 credits. Prerequisites: CS 419 or permission of instructor. Next offered 2008-2009.]

Cs 530(5300) The Architecture of LargeScale Information Systems (also INFO 530[5300]]
Spring. 4 credits. Prerequisite: CS/INFO 330 or CS 432.

Cs 565(5640) Computer Anlmation (also ART 273, CIS 565[5640])
Fall. 4 credits. Prerequisite: none.
For description, see ART 273.
CS 566(5642) Advanced Animation (also ART 372/CIS 566[5642])
Spring. 4 credits. Prerequisite: none For description, see ART 372.
[CS 567(5643) Physically Based Animation for Computer Graphics Spring. 4 credits. Prerequisites: CS/ENGRD 322 and/or CS 465 or permission of instructor. Offered alternate years; next offered 2008-2009.]

Cs 569(5620) Interactive Computer Graphics
Spring. 4 credits. Prerequisite: CS 465 .
Cs $\mathbf{5 7 2 ( 5 7 2 2 )}$ Meuristic Methods for Optimization (also CEE 509[5090], OR\&IE 533[5340])
Fall. 3 or 4 credits. Prerequisites: CS/ ENGRD 211 or 322 or CEE/ENGRD 241, or graduate standing, or permission of instructor.
For description, see CEE 509.
Cs 578(5780) Empirical Methods in Machine Learning and Data Mining Fall. 4 credits. Prerequisites: CS 280 and 312 or equivalent.

CS 6if(6110) Advanced Programming Languages
Fall. 4 credits. Prerequisite: graduate
standing or permission of instructor.
Cs $612(6120)$ Advanced Compilers and Program Analyzers
Spring. 4 credits. Prerequisites: CS 412 or permission of instructor.

CS 614(6410) Advanced Syatems
Fall or spring. 4 credits. Prerequisite: CS
414 or permission of instructor.
[C8 615(6460) Peer-to-Peer Systems
Spring. 4 credits. Recommended: CS 614.]
[CS 619(6450) Research in Computer Networks
Fall or spring. 4 credits. Prerequisites: CS 419 or permission of instructor. Next offered 2008-2009.]

C8 621(8210) Matrix Computations Fall. 4 credits. Prerequisites: MATH 411 and 431 or permission of instructor
[C8 622|6220) Numerical Optimization and Nonlinear Algebralc Equations
Spring. 4 credits. Prerequisite: CS 621.]
[CS 624/6240) Numerical Solution of Differential Equations
Spring. 4 credits. Prerequisites: exposure to numerical analysis (e.g., CS 421 or 621), differential equations, and knowledge of MATLAB.]
[CS 626(6510) Computational Molecular Biology
Spring. 4 credits. Prerequisites: familiarity with linear programming, numerical solutions of ordinary differential equations, and nonlinear optimization methods.]

Cs 628(6522) Blologlcal Sequence Analysia
Fall. 4 credits. Prerequisites: none.
[C5 632(6320) Database Systems Spring. 4 credits. Prerequisite: CS 432/433 or permission of instructor. Next offered 2008-2009.]
[CS 633(6322) Advanced Database System:
Spring. 4 credits.]
Cs 664(6670) Machine Vision
Fall or spring. 4 credits. Prerequisites: undergraduate-level understanding of algorithms and MATH 221 or equivalent. Offered spring 2008.

Cs 665(6620) Advanced Interactive Graphics
Fall or spring. 4 credits. Prerequisites: CS 465 or equivalent and undergraduate-level understanding of algorithms, probability and statistics, vector calculus, and programming.

## Cs 667(6630) Physically Based

 RenderingFall or spring. 4 credits. Prerequisites: CS 465 and 467 or equivalent and undergraduate-level understanding of algorithms, programming, and vector calculus.
[CS 671(6762) Introduction to Automated Reasoning
Fall or spring. 4 credits. Prerequisite: CS 611 and graduate standing or permission of instructor.]

C8 672(6700) Advanced Artificial Intelligence
Spring. 4 credits. Prerequisite: CS 472 or permission of instructor.
[CS 673(6724) Integration of Artificial Intelligence and Operations Research
Spring. 3 credits.]
CS 674(6740) Advanced Language Technologies (also INFO 630[6300] Fall or spring. 3 credits. Prerequisite: permission of instructor. Neither CS 430 nor CS 474 are prerequisites. Offered fall 2007.

## CS 676(6764) Reasoning about

 KnowledgeFall. 4 credits. Prerequisites: mathematical maturity and acquaintance with propositional logic.

## [C8 677(6766) Reasoning about

 UncertalntyFall. 4 credits. Prerequisites: mathematical maturity and acquaintance with propositional logic. Next offered 20082009.]

Cs 878(6780) Advanced Topics in Machine Learning
Fall or spring. 4 credits. Prerequisites: CS 478 or equivalent, or CS 578 or equivalent, or permission of instructor.

Cs 681|6820) Analysis of Algorithms Fall. 4 credits. Prerequisite: CS 482 or graduate standing.

Cs 682|6810) Theory of Computing Spring. 4 credits. Prerequisite: CS 381 or 481 and CS 482 or 681 or permission of instructor.
C8 683(6822) Advanced Design and Analysis of Algorithms
Spring. 4 credits. Prerequisite: CS 681 or permission of instructor.
cs 684(6840) Algorlthmic Game Theory Fall or spring. 4 credits. Prerequisite: background in algorithms and graphs at level of CS 482. No prior knowledge of game theory or economics assumed.
Cs 885(6850) The Structure of Information Networks (also INFO 685[6850]
Fall or spring. 4 credits. Prerequisite: CS 482.
[Cs 686(6860) Logics of Programs Fall or spring. 4 credits. Prerequisites: CS 481, 682, and MATH 481 or MATH/CS 486. Next offered 2008-2009.]

## Cs 887(e830) Cryptography

Fall. 4 credits. Prerequisites: General ease with algorithms and elementary probability theory, maturity with mathematical proofs (ability to read and write mathematical proofs).

## Cs 709(7090) Computer Sclence

 ColloquiumFall, spring. 1 credit. For staff, visitors, and graduate students interested in computer science. S-U grades only.
Cs 714(7410) Topics in Systoms Fall or spring. 3 credits. Prerequisite: permission of instructor.

Cs 715(7192) Seminar in Programming Refinement Logics
Fall, spring. 4 credits. Prerequisite: permission of instructor.
[CS 717(7430) Topics in Parallel Architectures
Fall. 4 credits. Prerequisite: CS 612 or permission of instructor.]
Cs 718(7690) Computer Graphics Seminar
Fall, spring. 3 credits.
Cs 719(7190) Seminar in Programming Languages
Fall, spring. 4 credits. Prerequisite: CS 611 or permission of instructor. S-U grades only.

C8 726(7590) Problems and Porspectives In Computational Molecular Biology
Fall or spring. 1 credit. Open to all from life sciences, computational sciences, and physical sciences. S-U grades only,

## cs 732(7320) Topics In Database

 SystemsFall, spring. 4 credits. S-U grades only.
Cs 733(7390) Database Seminar
Spring. 1 credit. Prerequisite: CS 633 or permission of instructor. S-U grades only.
[CS 750(7726) Evolutionary Computation and Design Automation (also M\&AE 650[6500])
Fall. 4 credits. Prerequisite: programming experience or permission of instructor. Next offered 2008-2009.]
Cs 754(7490) Systems Research Seminar Fall, spring. 1 credit. S-U grades only.
[Cs 764(7670) Visual Object Recognition Spring. 3 credits. Prerequisite: none.]

## C5 772(7790) Seminar in Artificial

 IntelligenceFall, spring. 4 credits. Prerequisite: permission of instructor. S-U grades only.

## cs 775(7794) Seminar in Natural

 Language UnderstandingFall, spring. 2 credits.

## [CS 785(7850) Seminar on Informatlon Networks (also INFO 785[7850])

Fall. 4 credits. Prerequisites: CS 485 or 685 or permission of instructor.]
[C8 786(7860) Introduction to Kleene Algebra
Spring. 4 credits. Prerequisites: CS 381. Recommended: CS 482 or $681, \operatorname{CS} 682$, elementary logic (MATH 481 or 681 ), algebra (MATH 432).]
Cs 789(7890) Seminar in Theory of Algorithms and Computing Fall, spring. 4 credits. Prerequisite: permission of instructor. S-U grades only.
Cs 790(7998) Independent Research Fall, spring. Prerequisite: permission of a Computer Science advisor.
Independent research for master of engineering project.

## C5 990(9999) Thesis Research

Fall, spring. Prerequisite: permission of a
Computer Science advisor. S-U grades only. Doctoral research.

## COMPUTING IN THE ARTS UNDERGRADUATE CONCENTRATION

The computer plays a role in almost every aspect of human life, and its influence and potential now extend routinely not only to technical and commercial pursuits but also into the realms of the imaginative and the aesthetic. The Computing in the Arts concentration offers students opportunities to use computers to realize works of art, to study the perception of artistic phenomena, and to think about new, computer-influenced paradigms and metaphors for the experiences of making and appreciating art. Faculty from several departments in the college offer courses toward the concentration, drawing on disciplines in the arts, the social sciences, the humanities, and the physical sciences. Currently, the concentration is offered in five tracks: computer science, dance, film, music, and psychology, each described in more detail below. Students may concentrate in the same area as their major, or in a different area.
It is likely that additional tracks in other disciplines will be added to the concentration, indeed possible that this will have occurred after the publication deadline for this year's Courses of Study but in time to take effect in the 2007-2008 academic year. The director and area representatives listed below will always have the latest information.

## Director

Graeme Bailey

## Applying for the Concentration and <br> Choosing Courses

Students should meet with the track representative in their chosen discipline for initial advising about the concentration. For 2007-2008, these representatives are Graeme Bailey (computer science track), Kevin Ernste (music track), Allen Fogelsanger (dance track), Marilyn Rivchin (film track), and Carol Krumhansl (psychology track).
Regardless of which track they choose, all students in the concentration are required to take the core course, Computing in the Arts (CS 165, cross-listed as ART 175, CIS 165 , DANCE 165, ENGRI 165, FILM 165, MUSIC 165, and PSYCH 165). This course combines fundamental background in cognitive modeling, statistics, programming, and algorithmic thinking, as preparation for more specialized work; hence, though it is not a formal prerequisite to other courses, it should be taken as early as possible in the student's program. For students who have already gained an equivalent background through other courses, however, it may be waived by permission of the director.
In addition to the core course, each student chooses another five courses satisfying the following requirements:

1. At least one must entail a significant computing component, regardless of its home department (marked** in the lists below).
2. At least two must entail a significant artistic component (marked $\dagger$ in the lists below).
3. For students majoring in a field offering a track, none of the courses from that track may be double-counted as also satisfying major requirements.

The goal is to encourage the development of reasonable depth within one area, without neglecting the interdisciplinary nature of the field. Hence, rather than choosing courses at random from the lists below or focusing too narrowly on one particular corner of the field, each student should work actively with an advisor from his or her concentration in building an appropriate program.

## Course Lists

Computer Science track. In addition to the core course, CS 165, any five of the following. Note that some of these courses have CS prerequisites.
$\dagger$ AR'T 170, Visual Imaging in the Electronic Age (also CIS 167, CS 167, ENGRI 167)

* CIS 300, Introduction to Computer Game Design
CIS 372, Studio in Space and Time
*CS 211, Object-Oriented Programming and Data Structures +212 , Programming Practicum (together these count as one course)
*CS 465, Introduction to Computer Graphics
*CS 472, Foundations of Artificial Intelligence
*CS 474, Introduction to Natural Language Processing
*CS 478, Machine Learning
*CS 565, Computer Animation
*CS 566, Advanced Computer Animation
*CS 578, Empirical Methods in Machine Learning and Data Mining
*INFO 345, Human-Computer Interaction Design
*INFO 440, Advanced Human-Computer Interaction Design
INFO 450, Language and Technology
Up to two courses from another track.
Dance track. In addition to the core course, DANCE 165 (for description, see CS 165), any five of the following. Note that some of these courses have DANCE pre- and/or corequisites. Note also that for this track, two courses marked * should be taken, and they should not be I and II of any one series for the purposes of satisfying the * requirement.
+DANCE 210/VISST 211 Beginning Dance Composition
†1)ANCE 235/VISST 235 Hip-Hop, Hollywood, and Home Movies
t*DANCE 258/VISST 258 Techno Soma Kinesics I
†DANCE 310 Intermediate Dance Composition I
$\dagger$ DANCE 311 Intermediate Dance Composition II
+*DANCE 358/VISST 358 Techno Soma Kinesics II
†DANCE 362/THETR 362/VISST 362 Lighting Design Studio I
*DANCE 368/MUSIC 355/THETR 368 Sound Design and Digital Audio
*DANCE 369/MUSIC 356/THETR 369 Digital Performance
$\dagger$ DANCE 391/MUSIC 391 Media Arts Studio +DANCE 410 Advanced Dance Composition I
+DANCE 411 Advanced Dance Composition II
+DANCE 462/THETR 462/VISST 462 Lighting Design Studio II
*MUSIC 320 Scoring the Moving Image
†PSYCH 305/VISST 305 Visual Perception
*THETR 365 Automated Lighting and Control Systems
Up to two courses from another track
Film track. In addition to the core course, CIS 165, any five of the following. Note that some of these courses have FILM pre- and/or co-requisites.
[†ART 170 Visual Imaging in the Electronic Agel
[†ART 272 Digital Video and Sound]
$\ddagger$ FILM 377 Introduction to 16 mm and Digital Filmmaking
FILM 325 Animation: History and Practice $\dagger$ FILM 391 Media Arts Studio
*THETR 368 Sound Design and Digital Audio *THETR 369 Digital Performance
*ART 273/CS 565 Computer Animation
*CS 566 Advanced Computer Animation $\dagger$ FILM 422 Cinematography
†FILM 477 Intermediate Film and Video Projects: Documentary and Experimental Workshop
$\dagger$ FILM 493 Advanced Film and Video Projects Up to two courses from another track
Music track. In addition to the core course, MUSIC 165, any five of the following. Note that some of these courses have MUSIC prerequisites.
* CIS 300 Introduction to Computer Game Design
†*MUSIC 120 Introduction to Digital Music +*MUSIC 220 Computers in Music Performance ${ }^{+}$MUSIC 320 Scoring the Moving Image *MUSIC 355/THETR 368 Sound Design and Digital Audio
*+MUSIC 356/THETR 369 Digital Performance †MUSIC 361/362/363 Jazz Improvisation (any two of these 2 -credit courses)
$\ddagger$ MUSIC 451 Counterpoint
$\dagger$ MUSIC 453 Composition in Recent Styles $\dagger$ MUSIC 454 Composition
†MUSIC 457 20th-Century Musical Languages PHYS/MUSIC 204 Physics of Musical Sound
Up to two courses from another track.
Psychology track. In addition to the core course, PSYCH 165, any five of the following. Note that some of these courses have PSYCH prerequisites.
$\dagger$ ART 170, Visual Imaging in the Electronic Age (also CIS/CS/ENGRI 167)
*CS 465 Computer Graphics I
*CS 467 Computer Graphics II + 468, Computer Graphics Practicum (together these count as one course)
*INFO 214/PSYCH 214 Cognitive Psychology ${ }^{*}$ MUSIC 120 Introduction to Digital Music PSYCH 205 Perception
+PSYCH 305 Visual Perception
PSYCH 316 Auditory Perception
*PSYCH 342 Human Perception: Applications to Computer Graphics, Art, and Visual Display
+PSYCH 418/MUSIC 418 Psychology of Music Up to two courses from another track.


## CZECH

See "Department of Russian."

## DANCE

See "Department of Theatre, Film, and Dance."

## DUTCH

See "Department of German Studies."

## EARTH AND ATMOSPHERIC SCIENCES

T. E. Jordan, chair; S. J. Colucci, co-chair
(CALS); director of undergraduate studies, B. L. Isacks; R. W. Allmendinger, W. D. Allmon, C. Andronicos, M. Barazangi, L. D. Brown, L. M. Cathles, J. L. Cisne, K. H. Cook, A. T. DeGaetano, L. A. Derry, P. J. Gierasch, M. Goman, C. H. Greene, D. L. Hysell, R. W. Kay, S. Mahlburg Kay, M. C. Kelley, R. Lohman, N. Mahowald, B. Monger, A. Moore, J. Phipps Morgan, M. Pritchard, S. J. Riha, W. M. White, D. S. Wilks, M. W. Wysocki

The Department of Earth and Atmospheric Sciences covers the breadth of modern earth sciences. We live on a planet with finite resources and a finite capacity to recover quickly from human-induced environmental stresses. It is a naturally powerful planet, with geologic hazards such as earthquakes and volcanic eruptions that alter the course of history with little prior warning. As the human population grows, understanding the earth and its resources becomes progressively more important to both future policymakers and ordinary citizens, who must find new energy sources and sustain the quality of our environment.
During the past several decades, with the increasing concern about air and water pollution, nuclear waste disposal, the destruction of the ozone layer, and global climate change, the scientific community has gained considerable insight into how the biosphere, hydrosphere, atmosphere, and lithosphere systems interact. It has become evident that we cannot understand and solve environmental problems by studying these individual systems in isolation. The interconnectedness of these systems is a fundamental attribute of the Earth system, and understanding their various interactions is crucial for understanding our environment.
The department has been the home of two majors in the College of Arts and Sciences: geological sciences and science of earth systems (SES). The geological sciences major emphasized the solid earth and its history, while the science of earth systems major emphasized study of the interactions among rock, water, air, and life in our planet's operation. The SES major grew out of recognition of the fundamental interconnectedness of the components of the earth system, and the importance of understanding both the system's operation at present and in the geological past. The SES major reflects the new strategy of modern earth science. Thus, starting in Fall 2006, the geological sciences major became a specialization within the SES major. The geology specialization within SES provides an equivalent
to the geological sciences major, but with an increased breadth. Other concentrations include atmospheric sciences, ocean sciences, and biogeochemistry.

The SES maior prepares students for a number of career paths in basic or applied sciences of our planet. The major can lead to graduate study and research in geology, geophysics, geochemistry, biogeochemistry, atmospheric sciences, ocean sciences, hydrology, or environmental engineering. Career opportunities in university research groups, governmental agencies, or the private sector deal with energy, mineral and water resources natural hazards; weather and climate forecasting; ocean resources; and a host of environmental issues. The major can also prepare students for careers in environmental management and policy, law or medicine, science journalism, and $\mathrm{K}-12$ science teaching.

## Requirements for the Science of Earth

 Systems major1. The science of earth systems curriculum includes strong preparation in
mathematics, physics, chemistry and biology, including the following:
MATH 111-112 (or MATH 191-192);
Two semesters of chemistry: CHEM 207208 or CHEM 207-257;

PHYS 207-208 or 112-213;
BIO G 109-110, 101/103-102/104 or 105106 (a second semester of biology can be replaced by CHEM 257 if CHEM 207-208 is selected; or replaced by a third semester of mathematics).
2. The required introductory course in earth science, EAS 220, The Earth System.
3. The core courses emphasize the interconnectedness of the earth system, and are founded on the most modern views of the planet as an interactive and ever-changing system. Each crosses the traditional boundaries of disciplinary science. Three courses selected from the following four core courses are required for the major.
EAS 301 Evolution of the Earth System
EAS 303 Biogeochemistry
EAS 304 Interior of the Earth
EAS 305 Climate Dynamics
4. The specialization requirement is achieved by four intermediate to advanced-level courses ( 300 level and up) that build on the core courses and have prerequisites in the required basic sciences and/or mathematics courses. Note that additional basic math and science course may be required to complete the specialization courses, depending upon the student's choice of specialization. The specialization courses build depth and provide the student with a specific expertise in some facet of Earth system science. Four specializations are defined for the major: geology, biogeochemistry, atmospheric sciences, and ocean sciences. Other specializations can be tailored to a student's interests in concert with the student's advisor and approval of the curriculum committee. The specialization should be chosen during the junior year or before in consultation with the student's advisor and the approval of the Director of Undergraduate Studies
5. Exposure to the basic observations of earth science, whether directly in the field, or indirectly by various techniques of remote sensing or in the laboratory, is necessary to understand fully the chosen area of specialization. Means of satisfying this requirement generally include 3 credits of course work. Possibilities for fulfilling the field/observation requirement include the following:
Courses in the Hawaii Environmental Semester program;
Courses given by the Shoals Marine Laboratory;
EAS 250 Meteorological Observations and Instruments;
EAS 352 Synoptic Meteorology I;
EAS 417 Field Mapping in Argentina;
EAS 491 and/or 492 Undergraduate Research, with appropriate choice of project;
Field courses taught by another college or university ( 3 -credit minimum).
For more information contact Bryan Isacks, Department of Earth and Atmospheric Sciences, bli1@comell.edu, and visit the web site: www.eas cornell.edu.
Honors. An honors program is offered by the Department of Earth and Atmospheric Sciences for superior students. Candidates for honors must maintain an overall 3.0 GPA, a cumulative average of 3.5 in the major, and complete an honors thesis (usually through EAS 491 and/or 492). Students interested in applying should contact the director of undergraduate studies during the second semester of the junior year or early in the first semester of the senior year.

## Courses

EAS 101(1101) Introductory Geological Sciences (To Know Earth) (PBS)
Fall. 3 credits. C. Andronicos.
Designed to enhance an appreciation of the physical world. Emphasizes natural environments, surface temperatures, and dynamic processes such as mountain belts, volcanoes, earthquakes, glaciers, and river systems. Interactions of the atmosphere, hydrosphere, biosphere, and lithosphere (earth system science). Water, mineral, and fuel resources; environmental concerns. Field trips in the Ithaca region.

## EAS 108(1108) Earth in the News (PBS)

Summer. 3 credits. S. L. Losh.
Provides an introduction to physical geology and earth systems science and explores the scientific basis for informed decision making regarding many timely environmental issues, including global warming; water pollution and use; geologic hazards such as floods, earthquakes, and volcanoes; fossil fuel distribution and use; and land use. A field trip is taken in the Ithaca area.

## EAS 109(1109) Dinosaurs

Fall. 1 credit. J. L. Cisne.
An introductory survey course for anyone interested in dinosaurs. Lectures examine the fossil evidence and illustrate how various geological and biological disciplines contribute to understanding dinosaurs and their world.

## EAS 119(1190) Fossil Preparation

Fall. 1 credit. Prerequisite: EAS 109 or related EAS course. W. Allmon and J. Cisne.

Hands on experience in the preparation and curation of fossils in laboratories at the Paleontological Research Institution (PRI). Students provide own transportation to the Museum of the Earth via public transit or other means. Activities include preparation and study of vertebrate, invertebrate, and plant specimens; sorting of bulk material such as field collections and mastodon dung, and curation of prepared specimens.

## EAS 121(1121) Introduction to MATLAB

 (also CIS 121[1121])Fall, spring, 8 -week course. 2 credits Prerequisites: MATH 111, 191, or equivalent. D. Fan.
For description, see CIS 121

## EAS 122(1220) Earthquake! (also ENGRI 122[1120]) (PBS)

Spring. 3 credits. L. Brown.
Explores the science of natural hazards and strategic resources. Techniques for locating and characterizing earthquakes and assessing the damage they cause; methods of using sound waves to image the earth's interior to search for strategic minerals; the historical importance of such resources. Seismic experiments on campus to probe for groundwater, the new critical environmental resource.

## EAS 131(1310) Basic Principles of Meteorology (PBS) <br> Fall. 3 credits. M. W. Wysocki.

Simplified treatment of the structure of the atmosphere: heat balance of the Earth; general and secondary circulations; air masses, fronts, and cyclones; and hurricanes, thunderstorms, tornadoes, and atmospheric condensation. The optional 1-credit laboratory for this course is offered as EAS 133.

EAS 133(1330) Basic Meteorology Lab
Fall. 1 credit. Corequisite: EAS 131.
M. W. Wysocki.

This course is required for atmospheric science majors, but is optional for other students taking EAS 131

## EAS 150(1500) Fortran Applications in

 Earth Science (also Cis 122[1122])Spring, seven-week course. 2 credits.
Prerequisite: CIS/EAS 121 or equivalent. Letter grades only. M. Wysocki.
Emphasizes the application of scientific computing in the Earth sciences, including data processing and modeling of the Earth, its atmosphere, and oceans. Extends the procedural programming concepts developed in CIS/EAS 121 and considers their implementation in high-performance, compiled languages. Topics include the structure and syntax of a FORTRAN program, data input/output, compilation, and debugging

## EAS 154(1540) Introductory

 Oceanography, Lecture (also BIOEE 154[1540]) (PBS)Fall, summer. 3 credits. Fall: B. C. Monger and C. H. Greene; summer: B. C. Monger. Intended for both science and nonscience majors. Covers the basic workings of the ocean including its physics, chemistry, and biology. Following this basic description, the course examines threats to the health of the ocean and the important role the ocean plays in global climate change. Non-science majors
should pay particular attention to this course to fulfill a science requirement, because they learn broadly how the earth works (physically, chemically and biologically) in just a single class.

## EAS 155(1550) Introductory Oceanography, Laboratory (also BIOEE 155[1550]) <br> Fall. 1 credit. Corequisite: EAS 154

B. C. Monger and C. H. Greene.

Laboratory course covering topics presented in EAS/BIOEE 154.

## EAS 170(1700) Evolution of the Earth and Life (also BIO G 170[1700]) (PBS)

Spring. 3 credits. J. L. Cisne.
Earth systems and their evolution; Earth history's astronomical context; plate tectonics, continental drift, and their implications for climate and life; co-evolution of life and the atmosphere; precedents for ongoing global change; dinosaurs, mass extinctions, and human ancestry. Includes laboratories on reconstructing geological history and mapping ancient geography. Fossil collecting on field trips.

## EAS 213(2130) Marine and Coastal Geology (PBS)

Summer. 4 credits. Prerequisite:
introductory geology or ecology or
permission of instructor. Staff.
A special two-week course offered at Cornell's Shoals Marine Laboratory (SML), located on an island near Portsmouth, N.H. For more details and an application, contact SML office, G14 Stimson Hall. Estimated cost for 2005 (including tuition, room, board, and ferry transportation): \$2,120.
EAS 22012200) The Earth System (PBS)
Fall, spring. 4 credits. Letter grades only. Staff.
Integrated introduction to the earth system stressing the biological, chemical, geological, and physical interactions among the atmosphere, ocean, and solid earth. Topics include biogeochemical cycles, climate dynamics, and the evolution of the atmosphere, biosphere, cryosphere (ice), hydrosphere (oceans and inland waters), and lithosphere (solid earth).

## EAS 222(2220) Seminar-Mawall's

 EnvironmentFall. 1 credit. S-U grades only. A. Moore. For students interested in the unique environmental systems of the Hawaiian Islands. Designed to bring together students returning from field studies in Hawaii with students interested in going there to study. Through reading and discussion students explore the geology, biology, ocean, atmosphere, and culture of the Hawaiian environment.

## EAS 240(2400) Field Study of the Earth

 System (PBS)Spring. 5 credits. Prerequisites: enrollment in Earth and Environmental Sciences Semester in Hawaii; one semester of calculus (MATH 191/192/193 or 111/112), and two semesters of any of the following: PHYS 207/208 or 112/213; CHEM 207/208; BIO 101/103-102/104 or 105/106 or $109 / 110$; or equivalent course work. A. Moore.

Interdisciplinary field course covering
fundamental roncepts of the Earth system.
Topics include global circulation patterns in
the solid Earth, atmosphere, and ocean: energy and mass transfer; change and variability of Earth, atmosphere, and ocean systems; the temporal record of change preserved in the geologic record; and Earth, oceanic, and atmospheric controls on ecosystem processes. The course is projectbased with students engaged in hands-on, active learning that takes advantage of local resources.

## EAS 250(2500) Meteorological

 Observations and InstrumentsFall, 4 credits. Prerequisite: EAS 131.
M. W. Wysocki and B. Monger. Covers methods and principles of meteorological measurements and observations including surface, free-air, and remote systems. Also covers instrument siting, mounting, and protection; instrument response characteristics, calibration, and standarclization; and recorders and data logging systems. Laboratory exercises are in observation and data analysis. The course is intended to serve as preparation for Observers Examination.

## EAS 268(2680) Climate and Global Warming (PBS)

Spring. 3 credits. Prerequisite: basic college
math. S-U or letter grades. A. T. DeGaetano. Familiarizes students from a range of disciplines with such contemporary issues in climatology as global warming and El Niño. Introduces the natural greenhouse effect, past climates, observed and projected climate changes and impacts. Also covers natural climate variations (e.g., El Niño) and their consequences and predictability. Readings focus on recent scientific findings to climate change.

## EAS 296(2960) Forecast Competition

Fall and spring. 1 credit; students enroll for two consecutive semesters; credit awarded after second semester; may be repeated for credit. Prerequisite: sophomore standing in atmospheric science or permission of instructor. S-U grades only. D. S. Wilks. Two-semester course providing daily exercise in probabilistic weather forecasting, in which students compete to forecast local weather most skillfully.

## EAS 301(3010) Evolution of the Earth System (PBS)

Fall. 4 credits. Prerequisites: MATH 112 or
192 and CHEM 207 or equivalent.
T. Jordan, S. Riha, and W. Allmon.

Life activities alter the physical and chemical environment, and are altered by that environment. This interaction over very long times constitutes a co-evolution of earth and life. Course uses modern systems, tens of thousand year old systems, and hundreds of million year old systems to illustrate principles, methods of reconstructing deep history, and the context of natural change inherent to life and earth.

## EAS 303(3030) Introduction to Biogeochomistry (also NTRES 303[3030]) (PBS)

Fall. 4 credits. Prerequisites: CHEM 207,
MATH 112, plus a course in biology and/ or geology. L. A. Derry and J. Yavitt. Control and function of the Earth's global biogeochemical cycles. Begins with a review of the basic inorganic and organic chemistry of biologically significant elements, and then considers the biogeochemical cycling of carbon, nutrients, and metals that take place in soil, sediments, rivers, and the oceans:

Topics include weathering, acid-base chemistry, biological redox processes, nutrient cycling, trace gas fluxes, bio-active metals, the use of isotopic tracers, controls on atmospheric carbon dioxide, and mathematical models. Interactions between global biogeochemical cycles and other components of the Earth system are discussed.
EAS 304(3040) Interlor of the Earth (PBS)
Spring. 3 credits. Prerequisite: EAS 220 or
permission of instructor. C. Andronicos.
This class will investigate the geology of the solid earth with emphasis on igneous and metamorphic petrology, structure of the continents and octan basins, and large scale tectonics. Interaction between deformation, melt generation and metamorphism will be examined as mechanisms by which the crust is differentiated from the underlying mantle. Geophysical and geochemical techniques for probing the deep interior of the earth will be investigated. Plate rectonics will be used as a unifying theme to understand processes operating in the solid earth.
EAS 305(3050) Climate Dynamics (PBS)
Fall. 3 credits. Prerequisites: two semesters
of calculus and one of physics. K. H. Cook. Processes that determine climate and contribute to its change are discussed, including atmospheric radiation, ocean circulation, and atmospheric dynamics. Contemporary climate change issues are investigated and discussed in the context of natural variability of the system.

## EAS 322(3220) Biogeochemistry of the Hawailan Islands (PBS)

Spring. 4 credits. Prerequisites: enrollment in Earth and Environmental Sciences Semester in Hawaii; EAS 220, EAS 303, or permission of instructor. L. Derry. Field-oriented study of biogeochemical processes and ecosystem interactions across the Hawaiian islands. Field, class, and laboratory work focus on how landscape age and climate strongly control biogeochemical cycling and ecosystem development in Hawaii. Other topics include succession of ecosystems, evolution of nutrient cycles, and impacts of invasive species. The class is structured around field projects, carried out both in groups and individually.

## EAS 334(3340) Microclimatology (PBS)

Spring. 3 credits. Prerequisite: a course in physics. D. S. Wilks.
The relationship of radiant energy, temperature, wind, and moisture in the atmosphere near the ground. The interplay between physical processes of the atmosphere, plant canopies, and soil is examined with emphasis on the energy balance.

EAS 341(3410) Atmospheric Thermodynamics and Hydrostatics (PBS)
Fall. 3 credits. Prerequisites: one year of calculus and one semester of physics. M. W. Wysocki.

Introduction to the thermodynamics and hydrostatics of the atmosphere and to the methods of description and quantitative analysis used in meteorology. Topics include thermodynamic processes of dry air, water vapor, and moist air and concepts of hydrostatics and stability.

EAS 342(3420) Atmospheric Dynamics (PBS)
Spring. 3 credits. Prerequisites: MATH 192 213, or equivalent; one year of physics. K. H. Cook.

## Introduction to the basic equations and

 techniques used to understand motion in the atmosphere, with an emphasis on the space and time scales typical of storm systems (the synoptic scale). The governing equations of atmospheric flow are derived from first principles and applied to middle latitude and tropical meteorology. Topics include balanced flow, atmospheric waves, circulation, and vorticity. Text used is An Introduction to Dynamic Meteorology by Holton.
## EAS 350(3500) Dynamics of Marine Ecosystems (also BIOEE 350[3500]) (PBS)

Fall. 3 credits. Prerequisites: one year of calculus and a semester of oceanography (i.e., EAS 154), or permission of instructor. Offered alternate years. C. H. Greene and R. W. Howarth.

Lecture course covering the interactions of physical and biological processes in marine ecosystems. Begins by looking at these processes on a global scale and works down to the scales relevant to individual organisms. Topics include glohal patterns of ocean circulation; global patterns of ocean production; climate variability and the role of the ocean in global climate change; the El Nino/Southern Oscillation; ecosystem dynamics of the open ocean and coastal environments.

## EAS 351(3510) Marine Ecosystems Field

 Course (also BIOEE 351[3510]) (PBS)Spring. 4 credits. Prerequisites: EAS 240; enrollment in Earth and Environmental Sciences Semester in Hawaii.
Recommendecd: oceanography course C. H. Greene, 13. Monger, and C. I). Harvell. Covers the interactions of physical and biological processes in marine ecosystems Starts by looking at these processes on oceanbasin to regional scales and works down to the smaller scales relevant to inclividual organisms. Students are introduced to modern techniques of marine-ecosystems research, including remote sensing, oceanographicsurvey methods, and experimental marine ecology. This course is field and laboratory intensive with students engaged in hands-on, active learning that takes advantage of local resources.

## EAS 352(3520) Synoptic Meteorology (PBS)

Spring. 3 credits. Prerequisite: EAS 341
Corequisite: EAS 342. M. W. Wysocki.
Study of weather map analysis and forecasting techniques by applying the principles of fluid and heat flow. Strengthens previously introduced meteorological concepts which are applied to forecasting midlatitude synoptic scale weather systems, such as cyclones, anticyclones, jet streams, fronts, and waves.

## [EAS 353(3530) Physical Oceanography (PBS)

Fall. 3 credits. Prerequisites: MATH 112 or 192, or one year of physics, or permission of instructor. Offered alternate years; next offered 2008-2009. B. C. Monger.]

## EAS 401(4010) Fundamentals of Energy and Mineral Resources (PBS)

Fall. 3 credits. L. Cathles.
The earth's energy and mineral resources reflect some of the most important changes and dramatic events that have punctuated
earth history. Course provides an overview of resource types in the context of the earth's atmospheric evolution, rifting, mantle convection, and hydrologic cycle. The processes of resource accumulation are described in terms of simple, fundamental chemical and physical principles.
[EAS 404(4040) Geodynamics (PBS)
Spring. 3 credits. Prerequisite: calculus and calculus-based physics or permission of instructor. Offered alternate years; next offered 2008-2009. J. Phipps Morgan.]
EAS 405(4050) Active Tectonics (PBS) Spring. 3 credits. Recommended: mechanical hackground equivalent to EAS 426/488. S-U or letter grades. Offered alternate years. R. Lohman.
The class develops the ideas and methods necessary to understand how the Earth deforms-from individual earthquakes to the construction of mountain ranges. We discuss the driving forces of deformation, and how these forces interact with different geologic materials to cause deformation

## EAS 415(4150) Geomorphology (PBS)

 Fall. 3 credits. B. L. Isacks. A study of terrestrial landscapes as constructed by Earth's internal tectonic processes and modified by climate. Laboratory exercises include computer analyses of satellite images and digital elevation models and student reviews of papers from the rapidly growing literature on a key focus of modern geomorphology, the interactions of tectonics and climate.
## EAS 417(4170) Field Mapping in

 Argentina (PBS)Summer. 3 credits. Prerequisite: introductory EAS course and EAS 326. S. Mahlburg Kay.

Field mapping course in Argentina that fulfills field requirement for majors with interests in Geological Sciences and provides a field geological experience for others. Course consists of lectures in Buenos Aires followed by field exercises in the Sierras Pampeanas, Precordillera, and Main Cordillera Ranges of the Argentine Andes in the provinces of San Juan and Mendoza. A variety of exercises use modern techniques in the field mapping of a broad range of variably deformed sedimentary metamorphic and igneous rocks. The course further provides an introduction to the tectonics and magmatic processes of the central Andes with emphasis on comparable processes in the U.S. Exercises are done in combination with students and faculty of the University of Buenos Aires.

## [EAS 425(4250) European Discovery of Impacts and Explosive Volcanism

 Spring. 2 credits. Prerequisite: junior, senior, or graduate students with background in geology and permission of instructor. Letter grades only. Meets one day per week plus field trip during spring break. Fee probably charged for required weeklong field trip. Offered alternate years; next offered 20082009. J. Phipps Morgan.]EAS 426(4260) Structural Geology (PBS) Spring. 4 credits. Prerequisite: one semester of calculus, plus introductory geology course or permission of instructor. One weekend field trip. Offered alternate years. R. W. Allmendinger.

The nature and origin of deformed rocks at submicroscopic to global scales. The course begins with review of elementary principles of continuum mechanics and continues with a
discussion of deformation mechanisms
commonly observed in earth materials. The geometry, kinematics, and mechanics of faults, folds, are then addressed and the class ends with a description of the tectonic setting of structural families such as thrust belts, rift provinces, and zones of strike slip deformation. A weekend field trip to a region of spectacular folding and thrusting provides and opportunity to apply the concepts learned in lecture

## [EAS 434(4340) Exploration Geophysics (PBS)

Fall. 3 credits. Prerequisites: MATH 192 and PHYS 208, 213, or equivalent. Offered alternate years; next offered 2008-2009. L. D. Brown.]

## EAS 435(4350) Statistical Methods in

 Meteorology and Climatology (MQR)Fall. 3 credits. Prerequisites; introductory statistics course (e.g., AEM 210) and calculus. D. S. Wilks.
Scatistical methods used in climatology, operational weather forecasting, and selected meteorological research applications. Includes statistical characteristics of meteorological data, including probalbility distributions and correlation structures. Covers operational forecasts derived from multiple regression models, including the MOS system; and forecast evaluation techniques.

## EAS 437(4370) Geophysical Field

 Methods (also ARKEO 437[4370]) (PBS)Fall. 3 credits. Prerequisite: PHYS 213 or 208, or permission of instructor. Offered alternate years. L. D. Brown Introduction to field methods of geophysical exploration, especially as applied to environmental issues. Emphasizes seismic, ground penetrating radar, gravity, and magnetic techniques. Analyzes and interprets field surveys carried out at the beginning of the semester.

## EAS 440(4400) Seminar on the

 Intergovernmental Panel on Climate Change ReportFall. 2 credits. Prerequisites: senior or higher standing. Offered alternate years N. Mahowald.

The IPCC report has already received substantial public attention, and it will impact environmental and economic decisions for years to come. The course will focus on reading, understanding, and evaluating the IPCC report ( 2007 version). Students will lead a discussion, write a term paper on one or more chapters of the report, and participate in discussions led by other students.

## EAS 447(4470) Physical Meteorology (PBS)

Fall. 3 crectits. Prerequisites: one year each of calculus and physics. Offered alternate years. A. T. DeGaetano.
Primarily a survey of natural phenomena of the atmosphere, with emphasis on their underlying physical principles. Topics include an introduction to atmospheric radiation processes; atmospheric optics and electricity; microphysical cloud processes; and principles of radar probing of the atmosphere.

## EAS 451(4510) Synoptic Meteorology II (PBS)

Fall. 3 credits. Prerequisites: EAS 341 and 342. E. K. Vizy.

Structure and dynamics of large-scale, midlatitude weather systems, such as cyclones, anticyclones, and waves, with consideration of
processes that contribute to temperature changes and precipitation. Lab sessions involve real-time weather forecasting and the computer application of a numerical model of the atmosphere to study selected large-scale, mid-latitude weather events.

## EAS 453(4530) Mineralogy (PBS)

Fall. 4 credits. Prerequisites: EAS 101, 220
and CHEM 207 or 211 or permission of instructor. S. Mahlburg Kay.
Covers chemical and physical properties and identification of minerals with emphasis on the rock-forming minerals that are the principal constituents of the Earth and nearby planets. Topics include internal and external crystallography, crystal chemistry, introductions to $x$-ray crystallography and optical mineralogy, and a systematic examination of the structures, chemistry, and occurrence of the rock-forming minerals.
Independent project includes use of electron microprobe (EPMA) and x-ray facilities.

## [EAS 454(4540) Petrology and Geochemistry (PBS)

Spring. 4 credits. Prerequisite: EAS 453. Offered alternate years; next offered 20082009. R. W. Kay.]

## EAS 455(4550) Geochemistry (PBS)

Fall. 4 credits. Prerequisites: CHEM 207
and MATH 192 or equivalent.
Recommended: EAS 304. Offered alternate years. W. M. White.
The Earth from a chemical perspective. Covers the formation of the elements;
cosmochemistry; chemical evidence regarding the formation of the Earth and solar system; trace-element geochemistry; isotope geochemistry; geochemical thermodynamics and kinetics; chemical evolution of the crust, mantle, and core; weathering and the chemistry of natural waters; chemistry of rivers and the oceans; hydrothermal systems; and ore deposition.
EAS 456(4560) Mesoscale Meteorology (PBS)
Spring. 3 credits. Prerequisites: EAS 341 and 342 or permission of instructor. S. J. Colucci.

Structure and dynamics of mid-latitude mesoscale weather systems such as fronts, jets, squall lines, convective complexes, precipitation bands, downslope windstorms, mountain breezes, seas breeze circulations, and lake effect snowstorms. The course also considers tropical weather systems and mesoscale modeling.

## [EAS 457(4570) Atmospheric Air Pollution (PBS)

Fall. 3 credits. Prerequisites: EAS 341 or thermodynamics course, and one semester of chemistry, or permission of instructor. Next offered 2008-2009. M. W. Wysocki.]
[EAS 458(4580) Volcanology (PBS) Fall. 3 credits. Prerequisite: EAS 304 or equivalent. Offered alternate years; next offered 2008-2009. R. W. Kay and W. White.]

## [EAS 460(4600) Late Quaternary Paleoecology (PBS)

Fall. 4 credits. Offered alternate years; next offered 2008-2009. M. Goman.]

## EAS 461(4610) Paleocilmate: Since the

 Last Ice AgeFall. 3 credits. Prerequisites: EAS 220 or permission of instructor. Offered alternate years. M. Goman.

Climate change is becoming increasingly important in the 21 st century. In order to understand modern climate change it is helpful to understand past climate changes and variability. This course examines changes and variability in climate for the last 21,000 years. It will focus on the causes, extent, and evidence for climate change. Material covered will include evidence for orbital scale climate change, millennial and decadal scale changes, as well as extreme climate events and historic scale changes recorded in the terrestrial, ice, and oceanic records.

## [EAS 462(4620) Marine Ecology (also

 BIOEE 462[4620]) (PBS)Fall. 3 credits. Limited to 75 students. Prerequisite: BIOEE 261. Offered alternate years; next offered 2008-2009.
C. D. Harvell and C. H. Greene.]

EAS 470(4700) Weather Forecasting and Analysis (PBS)
Spring. 3 credits. Prerequisites: EAS 352 and 451. TBA. M. W, Wysocki.
Applied course with an opportunity to focus on weather forecasting and analysis techniques for various regions around the world. Lectures emphasize the application of student's knowledge of atmospheric dynamics, thermodynamics, and computer-data analysis to forecast the development and movement of multiscale weather systems. Students participate in weekly forecast discussions, write daily forecasts that include a synoptic discussion, quantitative precipitation forecasts, and severe-weather outlook for the forecast region, and lead class discussion on assigned readings.

## EAS $471(4710)$ Intro Ground Water Hydrology (also BEE 471[4710]) (PBS)

Spring. 3 credits. Prerequisite: MATH 294 and ENGRD 202. Offered alternate years. L. Cathles and T. Steenhuis.

Intermediate-level study of aquifer geology, groundwater flow, and contamination of aquifers and clean-up methods. Includes description of transport of pesticides, nutrients and toxics through the unsaturated zone and aquifers. Discusses theoretical and practical applications. Includes short field trips.

## EAS 475(4750) Special Topics in Oceanography

Fall, spring, summer. 2-6 credits, variable. Prerequisites: one semester of
oceanography and permission of instructor. Fall, spring: C. H. Greene; summer:
B. C. Monger.

Undergraduate instruction and participation in advanced areas of oceanographic research. Topics change from semester to semester. Contact instructor for further information.

EAS 476(4760) Sedimentary Basins (PBS) Spring. 3 credits. Prerequisite: EAS 301 or permission of instructor. Offered alternate years. T. E. Jordan.
The focus is on the physical characteristics of sedimentary basins, which host fossil fuels and groundwater, and can potentially store $\mathrm{CO}_{2}$. Topics include lithosphere mechanics and plate tectonic activity that cause subsidence, environments of deposition, and the textures, composition, and architecture of sedimentary rocks. Course objective is to learn to predict properties of rock where they cannot be directly sampled.

## [EAS 478(4780) Advanced Stratigraphy (PBS)

Fall. 3 credits. Prerequisite: EAS 301 or permission of instructor. Offered alternate years; next offered 2008-2009.

## T. E. Jordan.]

## EAS 479(4790) Paleobiology (also BIOEE 479[4790]) (PBS)

Spring. 4 credits. Prerequisites: one year of introductory biology and either BIOEE 274, 373, EAS 301, or permission of instructor. Offered alternate years. W. Allmon.
Surveys the major groups of organisms and their evolutionary histories. Intended to fill out the biological backgrounds of Earth and atmospheric science students concerning the nature and significance of the fossil record for their respective studies.

## EAS 481(4810) Senior Survey of Earth Systems

Fall, spring. 2 credits each semester. Fall,
J. Cisne; spring, R. Kay.

Weekly seminar for seniors in the Science of Earth Systems major on current topics in Earth System Science. Readings, presentations and discussions will focus results from the recent literature, including how to analyze a scientific paper, and exploration of connections across the sub-disciplines in the field. The course will serve as both a review of key concepts, and a vehicle to explore developing concepts in the field.

## EAS 483(4830) Environmental Biophysics

 (also CSS 483[4830]) (PBS)Spring. 3 credits. Prerequisite: CSS 260 or
equivalent or permission of instructor.
Offered alternate years. S. J. Riha.
Introduction to basic principles of energy and mass transfer and storage in soil-plant systems. Covers energy budgets; solid heat flow; water movement in saturated and unsaturated soils; evapotranspiration; and water, gas, and nutrient dynamics in the soil-plant-atmosphere continuum. Considers applications to agronomic and environmental problems and instrument design and use through discussion and problem sets.
EAS 484(4840) Inverse Methods in the Natural Sciences (PBS)
Spring. 3 credits. Prerequisite: MATH 294. D. Hysell.

An exploration of solution methods for inverse problems with examples taken from geophysics and related fields, with particular attention to making inferences from inaccurate, incomplete, or inconsistent physical data. Applications include medical and seismic tomography, earthquake location, image processing, and radio/radar imaging. Linear algebra (including condition numbers) and probability and statistics (including error analysis, Bayes theorem, Gibbs distributioh, and Markov chains) will be reviewed. Methods to be covered include nonlinear least-squares, maximum likelihood methods, and local and global optimization methods, including simulated annealing and genetic algorithms.
EAS 487(4870) Introduction to Radar Remote Sensing (also ECE 487[4870]) (PBS)
Fall. 3 credits. Prerequisite: PHYS 208 or
213 or equivalent. D. L. Hysell.
Covers the fundamentals of radar, antennas, and remote sensing. Students are exposed to the principles underlying the analysis and design of antennas used for communication and for radar-related applications. They also encounter both a mathematical and a practical
description of how radars function, how their performance can be optimized for different applications, and how signals acquired by them can be processed. The objective is to familiarize students with a wide variety of radars rather than turn them into practicing radar engineers. Each topic is developed from basic principles so students with a wide variety of backgrounds are able to take the course. Emphasis is placed on radar applications in geophysics, meteorology and atmospheric sciences, astronomy and space sciences. Radar remote sensing of the Earth from spacecraft receives special attention.

## EAS 488(4880) Geophysics and

 Geotectonics (PBS)Spring. 3 credits. Prerequisites: MATH 192 (or 112) and PHYS 208 or 213 . Offered alternate years. M. Pritchard.
Covers global tectonics and the deep structure of the solid Earth as revealed by investigations of earthquakes, earthquake waves, the Earth's gravitational and magnetic fields, and heat flow.

## EAS 491-492(4910-4920) Undergraduate

 ResearchFall, spring. 1-4 credits. Students should fill out form at 2124 Snee Hall. Staff
(B. L. Isacks, coordinator).

Introduction to the techniques and philosophy of research in the earth sciences and an opportunity for undergraduates to participate in current staff research projects. Topics chosen in consultation with, and guided by, a staff member. A short written report is required, and outstanding projects are prepared for publication.

## EAS 494(4940) Special Topics in Atmospheric Science

Fall, spring. 8 credits max. Undergraduate level. S-U or letter grades. Staff.
The department teaches "trial" courses under this number. Offerings vary by semester and are advertised by the department before the beginning of the semester. The same course is not offered more than twice

## EAS 496(4960) Internship Experience

Fall, spring. 2 credits. Prerequisites: EAS
240; enrollment in Earth and
Environmental Sciences Semester in
Hawaii. S-U grades only. A. Moore.
During the last three and a half weeks of the semester students carry out a service learning project with a local NGO, environmental business, government agency, research lab, or educational facility. Projects are carefully designed with the student, sponsoring agency and faculty member. A final report is required

## EAS 497(4790) Individual Study in

 Atmospheric ScienceFall or spring. 1-6 credits. S-U grades only Students must register using independent study form. Staff.
Topics are arranged at the beginning of the semester for individual study or for group discussions.

## EAS 498(4980) Teaching Experience in

 Earth and Atmospheric SciencesFall, spring. 1-4 credits. S-U grades only. Staff.
The student assists in teaching an EAS course appropriate to his or her previous training The student meets with a discussion or laboratory section, prepares course materials, grades assignments, and regularly discusses course objectives and teaching techniques with the faculty member in charge of the course.

EAS 499(4990) Undergraduate Research in Atmospheric Science
Fall or spring. Credit TBA. S-U grades only. Students must register using independent study form. Staff.
Independent research on current problems in atmospheric science.

## [EAS 500(5000) Design Project in Geohydrology

Fall, spring; may continue over two or more semesters. 3-12 credits. Alternative to industrial project for M.Eng. students choosing geohydrology option. Next offered 2008-2009. L. M. Cathles.]
[EAS 502(5020) Case Mistories in Groundwater Analysis
Spring. 4 credits. Next offered 2008-2009. L. M. Cathles.]

## EAS 505(5050) Fluid Dynamics in the

 Earth SciencesSpring. 3 credits. Prerequisites: MATH through 294, PHYS through 208/214 or permission of instructor. L. Cathles and M. Wysocki.

The Earth System provides fascinating examples of fluid dynamic phenomena such as turbulent convection in the outer core; convection in the viscous mantle, which drives crustal plates and causes volcanism and earthquakes; rapid flows in the atmosphere and oceans, which impact climate; and electromagnetic effects in the solar wind and magnetosphere. This course investigates the Earth using fluid dynamics. Students in Earth Sciences will gain insights provided by fluid dynamics. Students from other fields will see spectacular applications and learn about the Earth System in a different and fundamental way.

## [EAS 522(5220) Advanced Structural

 Geology 1Fall. 3 credits. Prerequisites: EAS 426 and permission of instructor. Offered alternate years; next offered 2008-2009.
R. W. Allmendinger and C. Andronicos.]

## EAS 524(5240) Advanced Structural

 Geology IIFall. 3 credits. Prerequisites: EAS 426 and permission of instructor. Offered alternate years. R. W. Allmendinger.
Geometry, kinematics, and mechanics of structural provinces. Concentrates on thrust belts, rift provinces, or strike-slip provinces. Covers techniques of balanced cross sections.

## EAS 542(5420) Numerical Methods in

 Atmospheric ModelingSpring. 3 credits. Prerequisite: PDEs and introductory numerical methods or permission of instructor. N. Mahowald. Climate and numerical weather prediction models are important tools for policy and science. This course describes the basic principals of the numerics in these models, including finite difference, spectral methods, and subgrid parameterizations. Included will be a discussion of numerical stability and verification of models.
EAS 553(5530) Advanced Petrology
Fall. 3 credits. Prerequisite: EAS 454. Offered alternate years. R. W. Kay. Topics include magmas and metamorphism in the context of plate tectonics; major and trace element chemistry and phase petrology as monitors of the creation and modification of igneous rocks; and temperature and stress in the crust and mantle and their influence on reaction rates and textures of metamorphic
rocks. Application of experimental studies to natural systems.

## [EAS 575(5750) Planetary Atmospheres (also ASTRO 575[6575])

Fall. 4 credits. Offered alternate years; next offered 2008-2009. P. Gierasch.
For description, see ASTRO 575.]

## [EAS 577(5770) Planetary Surface

 Processes (also ASTRO 577[6577])Spring. 3 or 4 credits. Offered alternate
years; next offered 2008-2009. J. Bell.
For description, see ASTRO 577.]

## [EAS 578|5780) Planet Formation and

 Evolution (also ASTRO 578[6578])Fall. 4 credits. Offered alternate years; next offered 2008-2009. J. L. Margot and M. Pritchard.

For description, see ASTRO 578.]

## EAS 584(5840) Inverse Methods in the Natural Sclences

Spring. 3 credits. Prerequisite: MATH 294. D. Hysell.

An exploration of solution methods for inverse problems with examples taken from geophysics and related fields, with particular attention to making inferences from inaccurate, incomplete, or inconsistent physical data. Applications include medical and seismic tomography, earthquake location, image processing, and radio/radar imaging. Linear algebra (including condition numbers) and probability and statistics (including error analysis, Bayes theorem, Gibbs distribution, and Markov chains) will be reviewed. Methods to be covered include nonlinear least-squares, maximum likelihood methods, and local and global optimization methods, including simulated annealing and genetic algorithms. Students taking the course for advanced (500level) credit will be expected to complete and present a substantial class project to be negotiated with the instructor.

## [EAS 628(6280) Geology of Orogenic

 BeltsSpring. 3 credits. Prerequisite: permission of instructor. Next offered 2008-2009. Staff.J

## [EAS 641(6410) Analysis of

 Biogeochemical SystemsSpring. 3 credits. Prerequisite: MATH 293 or permission of instructor. Offered alternate years; next offered 2008-2009 L. A. Derry.]

## EAS 648(6480) Air Quality and

 Atmospheric Chemistry (also M\&AE 648[6480])Fall. 3 credits. Prerequisites: first-year chemistry and thermodynamics (or equivalent) and fluid mechanics (or equivalent); graduate standing or permission of instructor.
Factors determining air quality and effects of air pollutants on public health, ecological systems, and global climate change. Students will examine the source-to-receptor relationship of major air pollutants with an emphasis on the physical and chemical fundamentals of atmospheric transport and transformation. Topics include photochemical smog, atmospheric aerosols, atmospheric transport and deposition, emissions from energy systems, introduction to air quality monitoring and modeling, and air quality management.
[EAS 652(6520) Advanced Atmospheric Dynamics (also AsTRO 652[7652l) Spring. 3 credits. Prerequisites: EAS 341 and 342 or equivalent. Next offered 2008 2009. S. J. Colucci.]
[EAS 656(6560) Isotope Geochemistry Spring 3 credits. Open to undergraduates. Offered alternate years; next offered 20082009. W. M. White.]

## [EAS 666(G660) Applied Multivarlate

 StatisticsSpring. 3 credits. Prerequisites: multivariate calculus, matrix algebra, and two statistics courses. Offered alternate years; next offered 2008-2009. D. S. Wilks.]
[EAS 675(6750) Modeling the Soll-PlantAtmosphere System (also Css 675[6750])
Spring. 3 credits. Prerequisite: EAS/CSS 483 or equivalent. Next offered 2008-2009. S. J. Riha.]

EAS 692(6920) Special Topics in Atmospheric Science
Fall or spring. 1-6 credits. S-U or letter grades. Staff.
Study of topics in atmospheric science that are more specialized or different from other courses. Special topics covered depend on staff and student interests.

## EAS 693(6930) Special Topics in Ceological Sciences

Fall or spring. 1-3 credits, variable. S-U or letter grades. Staff.
Study of specialized advanced topics in the Earth sciences through readings from the scientific literature, seminars, and discussions.

EAS 700-799(7000-7990) Seminars and Special Work
Fall, spring, 1-3 credits. Prerequisite: permission of instructor. Staff.
Advanced work on original investigations in earth and atmospheric sciences. Topics change from semester to semester. Students should contact appropriate professor for more information.

## EAS 701-702(7010-7020) Thesis Research

701, fall; 702, spring. 1-15 credits, variable. Staff.
EAS $711(7110)$ Upper Atmospheric and
Space Physics
Fall or spring. 1-6 credits. Seminar course. TBA. D. L. Hysell.

## EAS 722(7220) Advanced Topics In Structural Geology <br> R. W. Allmendinger.

EAS 731(7310) Advanced Toplcs in Remote Sensing and Geophysics M. Pritchard.

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EAS 733(7330) Advanced Topics In Ceodynamics
Spring. J. Phipps Morgan.
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EAS 750(7500) Satellite Remote Sensing in Biological Oceanography
Summer. 3 credits. B. C. Monger.
The intensive summer course meets from 9 a. m . to $5: 00 \mathrm{p} . \mathrm{m}$. for a two-week period. The goal of the course is to teach participants the skills needed to work independently to acquire data sets derived from a variety of satellite sensors (SeaWiFS, MODIS, AVHRR, SeaWinds and Topex-Poseidon) and to merge these data sets to examine biological response to changes in the physical environment.

Course time is split equally between lectures and computer lab work. Lectures cover the fundamentals of bio-optics, pigment algorithms, primary production algorithms and the underlying physical principals leading to the measurement of sea surface temperature, ocean wind speed and ocean topography. Computer labs focus on developing the IDL (Research Systems, Inc.) programming skills needed to process, analyze and visualize satellite image data. See the course syllabus for more details on the topics covered in this course.

## EAS 751(7510) Petrology and Geochemistry <br> R. W. Kay.

EAS 755(7550) Advanced Topics In Geodynamics
Fall. 3 credits. J. Phipps Morgan.
EAS 757(7570) Current Research In Petrology and Geochemistry S. Mahiburg Kay.

EAS 762(7620) Advanced Topics in Paleoblology
W. D. Allmon.

EAS 771(7710) Advanced Toplcs in Sedimentology and Stratigraphy T. E. Jordan.

EAS 773(7730) Paleobiology
J. L. Cisne.

EAS 775(7750) Advanced Topics In Oceanography
C. H. Greene.

EAS 780(7800) Earthquake Record Reading
Fall. M. Barazangi.

## EAS 781(7810) Exploration Geophysics

L. D. Brown.

EAS 793(7930) Andes-Himalayas Seminar
S. Mahlhurg Kay, R. W. Allmendinger,
B. L. Isacks, and T. E. Jordan.

EAS 795(7950) Low Temperature Qeochemistry
1-3 credits. S-U letter grades. L. A. Derry.
EAS 798(7960) Geochemistry of the solid Earth
W. M. White.

EAS 797(7970) Fiuld-Rock Interactions L. M. Cathles.

EAS 799(7990) Soil, Water, and Geology Seminar
Spring. L. M. Cathles and T. S. Steenhuis.

## EAS 850(8500) Master's-Level Thesis

 Research in Atmospheric Sclence Fall or spring. Credit by arrangement. S-U grades only. Hours by arrangement. Graduate faculty.Limited to students specifically in the master's program in atmospheric science.
EAS 950(9500) Graduate-Level Dissertation Research in Atmospheric Science
Fall or spring. Credit by arrangement. S-U or letter grades. Hours by arrangement. Graduate faculty.
Limited to students in the atmospheric science Ph.D. program only before " A " exam has been passed.

## EAS 951(9510) Doctoral-Level

 Dlssertation Research in Atmospherlc SclenceFall or spring. Credit by arrangement. S-U or letter grades. Hours by arrangement. Graduate faculty.
Limited to students admitted to candidacy in the atmospheric science Ph.D. program after " A " exam has been passed.

## EAST ASIA PROGRAM

## 140 Uris Hall

E. Gunn, director; H. Miyazaki, associate director; D. Boucher, J. Chen, Z. Chen,
A. Carlson, S. G. Cochran, B. de Bary, S. Divo, G. Fields, M. Fiskejo, S. W. George, M. Gallagher, J. Hagen, T. Hinrichs, K. Hirano, H. Hong, S. Ichikawa, N. Howson, H. Jeong, Y. Katagiri, P. J. Katzenstein, G. Katzenstein, J. V. Koschmann, F. Kotas, N. Larson,
J. M. Law, P. Liu, T. P. Lyons, S. Martin,
R. McNeal, F. L. Mehta, V. Nee, A. Pan, L. Paterson, A. Riles, B. Rusk, N. Sakai, P. S. Sangren, K. Selden, W. Shao, M. Shin, M. Song, J. J. Suh, R. J. Sukle, M. Suzuki, K. Taylor, Q. Teng, H. Wan, Q. Wang, D. X. Warner, R. Weiner, J. Whitman, L. Zheng. Emeritus: R. Barker, K. W. Brazell, T. C. Campbell, E. H. Jorden, J. McCoy, T. L. Mei, C. Peterson, V. Shue, R. J. Smith, M. W. Young
The East Asia Program draws together faculty from departments and fields throughout the university who participate in a program of research and teaching on the civilizations and cultures of East Asia. Courses are offered through departments in the humanities and social sciences, as well as in the fields of business, city and regional planning, international and comparative labor relations, and developmental sociology. The Department of Asian Studies offers language courses in Mandarin, Cantonese, Korean, and Japanese, in addition to the Full-year Asian Language Concentration (FALCON) in Japanese and Mandarin. Undergraduates major in the Department of Asian Studies and concentrate on the language and culture of one East Asian country, while graduate students may work toward an M.A. in East Asian Studies, a dual M.B.A./M.A., or an M.A./Ph.D. in a discipline such as agricultural economics, anthropology, city and regional planning, government, history, history of art, linguistics, literature, rural sociology, or sociology. Graduate students concentrating on East Asia may apply for a variety of fellowships and travel grants offered by the East Asia Program. The formal program of study is enriched by numerous events and extracurricular activities, including films, workshops, art exhibits, lectures, symposia, and cultural and artistic performances on East Asia. With over 600,000 holdings in Chinese, Japanese, Korean, and western languages, the Wason Collection in Kroch Library is a major national resource for research on East Asia. A 5,000-piece collection representing the full range of Chinese, Japanese, and Korean art may be seen at the George and Mary Rockwell Galleries in the Herbert F. Johnson Museum of Art.

## ECONOMICS

U. Possen, chair; T. Mitra, director of graduate studies; T. Lyons, director of undergraduate studies; T. Bar, L. Barseghyan, K. Basu, D. Benjamin, L. Blume, R. Burkhauser, S. Coate, D. Easley, R. Ehrenberg, G. Fields, A. Guerdjikova, G. Hay, Y. Hong, R. Kanbur, N. Kiefer, S. Klonner, T. Lyons, M. Majumdar, K. Mertens, T. Mitra, F. Molinari, M. Nielsen, T. O'Donoghue, A. Razin, D. Sahn, R. E. Schuler, K. Shell, H. Y. Wan, Jr., J. Wissink, T. Zhu, A. Zussman. Emeritus: T. E. Davis, W. Isard, A. Kahn, P. D. McClelland, G. Staller, E. Thorbecke, V. Tsyrennikov, J. Vanek

The study of economics provides an understanding of the way economies operate and an insight into public issues. The department offers a broad range of undergraduate courses in such fields as money and banking; international and comparative economics; econometrics; theory; history; growth and development; and the organization, performance, and control of industry.

## The Major

## Prerequlsites

ECON 101 and 102 and MATH 111 (or equivalents) are required, all with grades of $C$ or better; MATH 112 (or equivalent) is recommended. For further information, see "Math for Economics 313-314" at the department's web site: www.arts.cornell.edu/ econ/major.html.
ECON 301 with a grade of C or better substitutes for 101; ECON 302 with a grade of C or better substitutes for 102 .

## Requirements

Eight courses listed by the Department of Economics at the 300 level or above, or approved by the student's major advisor, all with grades of C - or better. ( $\mathrm{S}-\mathrm{U}$ grade option is not allowed.)
These eight courses must include:

1. ECON 313 and 314
2. ECON 321, or ECON 319 and 320 (ECON $313,314,321$ or 319,320 should be completed before senior year.)
3. at least three courses from the following: ECON 318, 320, 322-399
ECON 301 with a grade of B or better substitutes for both 101 and 313; ECON 302 with a grade of $\mathbf{B}$ or better substitutes for both 102 and 314.
If ECON 321 is applied toward the major, neither 319 nor 320 can be applied.
ECON 498 and 499 cannot be counted toward the eight-course requirement.
If ECON 313 is applied to the major, ECON 301 cannot be.
If ECON 314 is applied to the major, ECON 302 cannot be.
If both ECON 367 and ECON 368 are taken, only one can be applied to the major.

## Honors Program

An honors program is currently being offered. Students should consult the director of undergraduate studies before May of their junior year for more information.

## Recammended Courses

Students planning graduate work in economics should select ECON 319-320 rather than 321 and should consider including some of the following courses in their majors:
ECON 325 (Cross Section and Panel Econometrics) or ECON 327 (Time Series Econometrics)
ECON 337 (Equilibrium and Welfare Economics)
ECON 405 (Auction Seminar)
ECON 367 (Game Theoretic Methods) or ECON 368 (Game Theory)
ECON 416 (Intertemporal Economics)
ECON 419 (Economic Decisions under Uncertainty)
ECON 446 (Topics in Macroeconomic Analysis)
Students planing careers in business management should consider including some of the following courses in their majors:
ECON 333 (Financial Economics)
ECON 351 or 352 (Industrial Organization) ECON 358 (Behavioral Economics)
ECON 361-362 (International Trade and Finance)
ECON 440-441 (Analysis of Agricultural Markets and Commodity Futures Markets)
ECON 443 (Compensation, Incentives, and Productivity)
In addition to completing the economics major, such students should also consider courses in accounting and subjects such as finance, marketing, entrepreneurship, business administration, and business law. Courses in these subjects are offered by the Department of Applied Economics and Management, the School of Hotel Administration, and the Johnson Graduate School of Management.
Students planning to attend law school should consider including some of the following courses in their majors:
ECON 351 or 352 (Industrial Organization)
ECON 354 (Economics of Regulation)
ECON 361-362 (International Trade and Finance)
ECON 404 (Economics and the Law)
In addition to completing the economics major, such students should inquire at Career Services, College of Arts and Sciences, concerning recommended courses offered by other departments.

## Courses

ECON 101(1110) Introductory Microeconomics (SBA-AS)
Fall, spring, winter, and summer. 3 credits. ECON 101 is not a prerequisite for 102. Students may not receive credit for both ECON 101 and H ADM 141. Students who take ECON 101 and ECON 313 may not receive credit for ECON 301 or PAM 200. Explanation and evaluation of how the price system operates in determining what goods are produced, how goods are produced, who receives income, and how the price system is modified and influenced by private organizations and government policy.

## ECON 102(1420) Introductory

 Macroeconomics (SBA-AS)Fall, spring, winter, and summer. 3 credits. ECON 101 is not a prerequisite for 102. Students who take ECON 102 and 314 may not receive credit for ECON 302.
Analysis of aggregate economic activity in relation to the level, stability, and growth of national income. Topics may include the determination and effects of unemployment, inflation, balance of payments, deficits, and economic development, and how these may be influenced by monetary, fiscal, and other policies.

## ECON 204(2040) Networks (also SOC

 209[2090]) (8BA-A8)Spring. 4 credits. Cannot be applied to ECON major.
This interdisciplinary course examines network structures and how they matter in everyday life. The course examines how each of the computing, economic, sociological and natural worlds are connected and how the structure of these connections affects each of these worlds. Tools of graph theory and game theory are taught and then used to analyze networks. Topics covered include the web, the small world phenomenon, markets, neural networks, contagion, search and the evolution of networks.

## ECON 230(2300) International Trade and

 Finance (SBA-AS)Cannot be applied to ECON major.
For description, see AEM 230.

## ECON 301(3010) Microeconomics (SBA.

 A8)Fall. 4 credits. Prerequisite: calculus.
Students who take ECON 101 and ECON
313 may not receive credit for Econ 301 or PAM 200.
Intended for students with strong analytical skills who have not taken ECON 101, 102. May be used to replace both ECON 101 and 313 (may replace 313 only with grade of B or better). Covers the topics taught in ECON 101 and 313. An introduction to the theory of consumer and producer behavior and to the functioning of the price system.

## ECON 302(3020) Macroeconomics (SBA-

 AS)Spring. 4 credits. May be used to replace both ECON 102 and 314 (may replace 314 only with grade of B or better). Students
who take ECON 102 and 314 may not
receive credit for ECON 302. Prerequisite: calculus.
Intended for students with strong analytical skills who have not taken ECON 101, 102. Covers the topics taught in ECON 102 and 314. An introduction to the theory of national income determination, unemployment, growth, and inflation.

## ECON 307(3070) Introductlon to Peace Science (also CRP 495.18[3850]) (SBA-AS) <br> Winter session. 3 credits. Prerequisites:

ECON 101-102 or permission of instructor. Introduction to the theories of and research on conflict resolution. Topics include conflict, its role and impact on society; theories of aggression and altruism; causes of war; game theory; conflict management procedures and other analytical tools and methods of peace science; and alternatives to war.

## ECON 313(3130) Intermediate

Microeconomic Theory (SBA-AS)
Fall, spring, and summer. 4 credits. Students who take ECON 101 and ECON 313 may not receive credit for ECON 301 or PAM 200. Prerequisites: ECON 101-102 and calculus.
The pricing processes in a private enterprise economy are analyzed under varying competitive conditions, and their role in the allocation of resources and the functional distribution of national income is considered.

## ECON 314(3140) Intermediate

 Macroeconomic Theory (SBA-AS)Fall, spring, and summer. 4 credits.
Students who take ECON 102 and 314
may not receive credit for ECON 302.
Prerequisites: ECON 101-102 and calculus Introduces the theory of national income and determination and economic growth in alternative models of the national economy. Examines the interaction and relation of these models to empirical aggregate economic data.
ECON 319(3190) Introduction to Statistics and Probability (MQR) Fall and spring. 4 credits. Students who take ECON 319 may not receive credit for MATH 471 or BTRY 408. Students who
take ECON 319 may not receive credit for
MATH 472 or BTRY 409. Prerequisites:
ECON 101-102 and MATH 111-112.
Provides an introduction to statistical inference and to principles of probability. It includes descriptive statistics, principles of probability, discrete and continuous distributions, and hypothesis testing (of sample means, proportions, variance). Regression analysis and correlation are introduced.

## ECON 320(3200) Introduction to

 Econometrics (MOR)Fall and spring. 4 credits. Students may not receive credit for both ECON 320 and ECON 321. Prerequisites: ECON 101-102, 319 , or equivalent.
Introduction to the theory and application of econometric techniques. How econometric models are formulated, estimated, used to test hypotheses, and used to forecast; understanding economists' results in studies using regression model, multiple regression model, and introduction to simultaneous equation models.

## ECON 321(3210) Applled Econometrics

 (MOR)Fall and spring. 4 credits. Students may not receive credit for both ECON 320 and ECON 321. Prerequisites: ECON 101-102 and calculus.
Provides an introduction to statistical methods and principles of probability. Topics include analysis of data, probability concepts and distributions, estimation and hypothesis testing, regression, correlation and time series analysis. Applications from economics are used to illustrate the methods covered in the course.

## ECON 322(3220) World Economic History * (HA-AS)

Spring. 4 credits. Prerequisites: ECON 101 and 102 or equivalent.
An economist's perspective on the comparative evolution of selected economic and social institutions, with emphasis on trade, finance, population growth and technological change.

## ECON 323(3230) American Economic

 History (SBA-AS)Fall. 4 credits. Prerequisite: ECON 101-102 or equivalent.

Surveys problems in American economic history from the first settlements to early industrialization.

## ECON 324(3240) American Economic History \# (SBA-AS)

Spring. 4 credits. Prerequisites: ECON 101102 or equivalent.
Surveys problems in American economic history from the Civil War to World War 1.

## ECON 325(3250) Cross Section and Panel Econometrics (MQR)

Spring. 4 credits. Prerequisite: ECON 320. Introduction to cross-section and panel econometrics. Topics include multipleregression analysis with qualitative information to models, simple and advanced panel data methods, informal variable, estimation, simultaneous equation models.

## ECON 327(3270) Time Series

 Econametrics (MQR)Spring. 4 credits. Prerequisite: ECON 320. Introduction to time-series econometrics. Topics include stationary time series, ARMA models, multivariate models, non-stationary models and unit roots, and co-integration.
ECON 331(3310) Money and Credit (SBA. AS)
Spring. 4 credits. Prerequisites: ECON 101102 and 314.
A systematic treatment of the determinants of the money supply and the volume of credit. Economic analysis of credit markets and financial institutions in the United States.

## ECON 333(3330) Financial Economics

 (SBA-AS)Fall. 4 credits. Prerequisites: ECON 313 and 314.

Examines the theory and decision making in the presence of uncertainty and the practical aspects of particular asset markets.
ECON 335(3350) Public Finance: The Microeconomics of Government (SBA-AS)
Fall. 4 credits. Prerequisites: ECON 101-102 and 313 , or equivalent, and one semester of calculus.
Analyzes the role of government in a free market economy. Topics include public goods, market failures, allocation mechanisms, optimal taxation, effects of taxation, and benefit-cost analysis. Current topics of an applied nature vary from semester to semester.

## ECON 336(3360) Public Finance: Resource Allocation and Fiscal

 Policy (SBA-AS)Spring. 4 credits. Prerequisites: ECON 101102,313 or equivalent and one semester of calculus.
Covers the revenue side of public finance and special topics. Subjects include the federal debt, the budget, and government regulation and transfers, as well as problems like local public goods, health care, education, the hierarchy of governmental structure, plus a variety of applied problems.

## ECON 337(3370) Equilibrium and Welfare Economics (SBA-AS)

Fall. 4 credits. Prerequisites: ECON 313, 314, 319.
Introduction to the theory of competitive equilibrium and economic efficiency. Begins with a review of the Walrasian model and identify conditions under which a priceguided decentralized competitive economy achieves an optimal allocation of resources.

Presents a number of celebrated examples and applications: the standard $2 \times 2 \times 2$ model of international trade, Leontief's input-output model, Morishima's interpretation of labor theory of value, Arrow's analysis of uncertainty and Amartya Sen's analysis of famines. Finally, problems of market failure are reviewed.

## [ECON 339(3390) State and Local Public Finance (SBA-AS)

Spring. 4 credits. Prerequisite: ECON 313. Next offered 2009-2010.
Examines the role of subnational governments and jurisdictions in the economy. Among the broad questions addressed are: what tasks are optimally assigned to local governments? What impact can such assignment have on efficiency and equity? How do intergovernment financial relations affect these outcomes? The theory and evidence on these issues are analyzed, with frequent application to current issues, like debates surrounding local, school district-based provision of education.]

## ECON 341(3410) Economics of Wages and Employment II (SBA-AS)

For description, see ILRLE 440.

## ECON 342(3420) Economic Analysis of the University <br> For description, see ILRLE 648.

ECON 344(3440) Development of Economic Thought and Institutions
For description, see ILRLE 344.
ECON 347(3470) Economics of Education For description, see ILRLE 647.

## ECON 351(3510) Industrial Organization I

 (SBA-AS)Fall. 4 credits. Students may not receive credit for both ECON 351 and AEM 432.
Prerequisite: ECON 313 or equivalent.
Examines markets with only a few firms (i.e., oligopolies), and the primary focus is the strategic interactions between firms. Topics include static competition in oligopolies, cartels and other forms of collusive behavior, competition between firms producing differentiated products, entry behavior, RD behavior, and government interventions in oligopoly industries (e.g., antitrust laws).

## ECON 352(3520) Industrial Organization

 II (SBA-AS)Spring. 4 credits. Prerequisite: ECON 313 or equivalent.
Focuses primarily on the pricing decisions of firms. The course does not consider the strategic response of other firms to these pricing decisions. The pricing decisions include price discrimination, commodity bundling, pricing a product line and pricing a durable good. In addition to pricing decisions, the course considers topics associated with private information such as adverse selection, signaling, and moral hazard. Numerous theoretical models are presented and empirical results are discussed.

## ECON 354(3540) The Economics of

 Regulation (SBA-AS)Fall. 4 credits. Prerequisite: ECON 313 or equivalent.
Regulation constrains individual and institutional behavior. These interfaces between the private and public sectors are explored in terms of their rationale, efficacy, and economic consequences. Regulation is examined as a system of incentives that guides the
development and efficient functioning of markets, that moulds the behavior of regulated industries like utilities and that elicits socially desirable levels of pollution, congestion, risk and benefits from externality-generating activities. How the various professions (law, accounting and engineering) view and address these challenges are examined in light of their economic effects

## ECON 358(3580) Behavioral Economics (SBA-AS)

Spring. 4 credits. Prerequisite: ECON 313. Introduces students to behavioral economics, an emerging subfield of economics that incorporates insights from psychology and other social sciences into economics. Examines evidence on how human behavior systematically departs from the standard assumptions of economics, and also investigates attempts by behavioral economists to improve economic analyses.

## ECON 361(3610) International Trade

 Theory and Policy (SBA-AS)Fall. 4 credits. Prerequisites: ECON 101-102 and 313.
Surveys the sources of comparative advantage Studies commercial policy and analyzes the welfare economics of trade between countries Some attention is paid to the institutional aspects of the world trading system.

## ECON 362(3620) Internatlonal Monetary Theory and Policy (SBA-AS)

Spring and summer. 4 credits.
Prerequisites: ECON 101-102 and 314.
Surveys the determination of exchange rates and theories of balance of payments adjustments. Also explores open economy macroeconomics and analyzes some of the institutional details of foreign exchange markets, balance of payments accounting, and the international monetary system

## ECON 367(3670) Game Theoretle Methods (SBA-AS)

Fall. 4 credits. Prerequisites: ECON 101 or equivalent. ECON 367 is not a prerequisite for ECON 368
Introduces students to the use of game-
theoretic methods for the social sciences. This leads to an analysis of the social and political foundations of economics that prepares students to think strategically on social and economic matters and thus serves as a background for more advanced courses in economics, game theory, and related social sciences.

ECON 368(3680) Game Theory (MOR)
Spring. 4 credits. Prerequisites: ECON 313
and 319. ECON 367 is not a prerequisite for ECON 368
Studies mathematical models of conflict and cooperation in situations of uncertainty (about nature and about decision makers).

## ECON 371(3710) Economic Development

 (SBA-AS)Fall. 4 credits. Prerequisite: ECON 313 or equivalent.
Studies the problem of sustaining accelerated economic growth in less-developed countries Emphasizes trade-offs between growth, welfare, and equity; the legacy of colonialism relevance of history and economic theory problems of capital formation, economic planning and international specialization; and the interaction of industrialization, agricultural development, and population change.

## ECON 372(3720) Applied Economic

 Development (SBA-AS)Spring. 4 credits. Prerequisite: ECON 101102.

Examines several special topics in the economics of developing countries. Recent topics are the concepts of development and underdevelopment, the debate over development economics, the peasant household and its place in the world economy, the debt crisis, the state vs. market debate and the role of the state in economic development, and the question of sustainable development.

## ECON 404(4040) Economics and the Law (SBA-AS)

Fall. 4 credits. Prerequisite: ECON 101. Examines, through the lens of economic analysis, of legal principles drawn from various branches of law, including contracts, torts, and property. Cases are assigned for class discussion; in addition, there are several writing assignments.

ECON 405(4050) Auction Seminar (MQR) Spring. 4 credits. Prerequisites: ECON 314, 319,320 , and 368.
Uses theoretical and empirical methods to analyze bidding behavior in auctions. The first part of the course studies theoretical models of auctions. The role of private information is discussed in the context of two empirically important auction formats: the first-price-sealed-bid and the open-ascending-bid auction. Bid-shading and the winner's curse are explained in these models. Optimal selling strategies as well as the issue of bidder collusion are analyzed. In the second part, empirical evidence on these topics is discussed in the context of outer continentalshelf oil auctions, Internet auctions, and rreasury bill and spectrum auctions. One session is devoted to an auction experiment in class. In the final part of the course, students present and debate the issues of their semester papers. Readings are assigned weekly from the reading packet.

## ECON 408(4080) Production Economics and Policy (SBA-AS)

For description, see AEM 608

## ECON 409(4090) Environmental Economics (SBA-AS)

For description, see AEM 451

## [ECON 416(4160) Intertemporal Economics (SBA-AS)

Fall. 4 credits. Prerequisite: ECON 313
Next offered 2009-2010.
Intended for advanced economics majors who are especially interested in economic theory. Topics include (1) review of the one good Ramsey model of optimal savings and accumulation; conditions for intertemporal efficiency in production; comparative dynamics and sensitivity analysis; (2) some earlier models of capital accumulation; the roles of present value and internal rate of return in guiding investment decisions; (3) growth, exhaustible resources; pollution and conservation: discussion of the trade-offs facing a society.]

## ECON 417(4170) History of Economic Analysis " (HA-AS)

Spring. 4 credits. Prerequisites: ECON 101102 or permission of instructor.
Covers early writings in economics and their relationship to current economic analysis and policy issues. Examples include: ancient and medieval philosophers on justice in exchange;
mercantilist arguments for trade protection; early theories about the effect of monetary expansion (D. Hume); the role of the entrepreneur (Cantillon); and general competitive equilibrium (the Physiocrats). The most recent reading assignment in this course is Adam Smith's Wealth of Nations but the emphasis is on the relationship between the precursors of Adam Smith and his Wealth of Nations to modern economics analysis and current efforts to answer some of the questions raised in the early writing on economics.
[ECON 419(4190) Economic Decisions under Uncertainty
Fall. 4 credits. Prerequisites: ECON 313 and 319. Next offered 2009-2010.

Provides an introduction to the theory of decision making under uncertainty with emphasis on economic applications of the theory.]

## ECON 430(4300) Policy Analysis: Welfare Theory, Agriculture, and Trade (SBAAS)

For description, see AEM 630.

## [ECON 431(4310) Monetary Economics

 (MQR)Spring. 4 credits. Prerequisites: ECON 313 and 314. Next offered 2008-2010.
Covers monetary theory, history, and policy. Topics include transaction costs, centralized and bilateral trading, media of exchange, international exchange and monetary arrangements, and central bank and its policy.]

## ECON 434(4340) Financial Economics, Derivatives, and Risk Management (SBA-AS)

Summer only. 4 credits. Prerequisite: ECON 313.

Helps students understand, design, and price derivative contracts. Topics include pricing of forwards, options, and swaps; developing trading strategies with derivatives; using derivatives for financial risk management; and the importance of flexibility in various economic settings.

## ECON 443(4430) Compensation,

 Incentives, and Productivity For description, see ILRLE 443.
## ECON 444(4440) Evolution of Socia Policy in Britain and America For description, see ILRLE 444.

## ECON 445(4450) Industrial Policy (SBA-

 AS]Spring. 4 credits. Prerequisite: ECON 313. Highlights of the course include (1) the role of the state in an industrial society; the drive for industrialization; the prevention of deindustrialization; the views of the Nobelists-Friedman, the Libertarian vs. North, the institutionist; the original intent of laissezfaire; (2) the major debates-the pros and cons of the Washington Consensus
("liberalization"); IMF and "conditionality"; market failure vs. government failure as roots for crises; (3) the East Asian episodes; Komiya on the Japanese MITI-early successes/recent problems; Linsu Kim about Korean policyare subsequent difficulties the necessary price for the early triumphs?; industrial policy without protectionism (the cases of Singapore and Pennan, Malaysia)-viable approaches under the WTO rules; (4) present
developments and implications; trade frictions (the export expansion of the PRC); environmental concerns

## ECON 447(4470) Economics of Social Security (SBA-AS)

For description, see PAM 346.

## ECON 450(4500) Resource Economics (SBA-AS)

For description, see AEM 450.

## ECON 451(4510) Economic Security

 (SBA-AS)For description, see ILRLE 340.

## ECON 455(4550) Income Distribution

 (SBA-AS)For description, see ILRLE 441.

## ECON 456(4560) The Economics of Employee Benefits (SBA-AS)

For description, see ILRLE 442.
ECON 457(4570) Women in the Economy (also FGSS 446[4460]) (SBA-AS)
For description, see ILRLE 445.
ECON 458(4580) Topics in 20th-Century Economic History (SBA-AS)
For description, see ILRLE 448.
ECON 459(4590) Economic History of British Labor 1750 to 1940 (SBA-AS)
For description, see ILRLE 446.
ECON 460(4600) Economic Analysis of the Welfare State (SBA-AS)
For description, see ILRLE 642.
ECON 461(4610) The Economics of Occupational Safety and Health (SBA-AS)
For description, see ILRLE 644.
ECON 469(4690) China's Economy under Mao and Deng (also CAPS 469[4690]) © (SBA-AS)
Spring. 4 credits. Prerequisite: ECON 101
102 or permission of instructor.
Examines the development of the Chinese economy and the evolution of China's
economic system between the early 1990s and late 1990s.

## ECON 473(4730) Economics of ExportLed Development © (SBA-AS)

Fall. 4 credits. Prerequisites: ECON 313, 314, or equivalent.
Examines the phenomenon of export-led development from both the theoretical and empirical points of view. Concentration is on experiences within the West Pacific Rim.

## ECON 474(4740) Economics of Hunger and Malnutrition

For description, see NS 457.
[ECON 475(4750) The Economy of India © (SBA-AS)
Fall. 4 credits. Prerequisite: ECON 101-102 or equivalent background. Next offered 2009-2010.
Presents the major economics and
development problems of contemporary India and examines the country's future economic prospects. The aim is, however, to discuss these problems in their proper historical perspectives. Hence, the course starts with a brief outline of the social and political history of India. It then turns to a more detailed account of the economic history of India in two stages.]

## ECON 476(4760) Decision Theory I (also ECON 676[6760], CIS 576[5846]) (MQR)

Fall. 4 credits
Research on decision theory resides in a variety of disciplines including computer
science, economics, game theory, philosophy, and psychology. This course attempts to integrate these various approaches. The course is taught jointly by faculty from Game Theory and Computer Science. The course covers several areas: (1) basic decision theory. This theory, sometimes known as "rational choice theory," is part of the foundation for the disciplines listed above. It applies to decisions made by individuals or by machines; (2) the limitations of and problems with this theory. Issues discussed here include decision theory paradoxes revealed by experiments, cognitive and knowledge limitations, and computational issues; (3) new research designed in response to these difficulties. Issues covered include alternative approaches to the foundations of decision theory, adaptive behavior and shaping the individual decisions by aggregate/evolutionary forces and more computationally based approaches.
ECON 477(4770) Decision Theory II (also ECON 677[6770], CIS 577[5847]) (MQR)
Spring. 4 credits. Prerequisite: ECON 476 or 676 or CIS 576 .
A continuation of ECON 476.
ECON 480(4800) The Family in Asia For description, see D SOC 480.

## ECON 494(4940) Economic Methods for

 Engineering and ManagementFor description, see CEE 594.

## ECON 498(4980) Independent Study in

 EconomicsFall or spring, Variable credit.
Independent study.
ECON 499(4990) Honors Program
Fall and spring. 8 credits. Prerequisites:
ECON 313, 314, 321 (or 319-320).
Students should consult the director of undergraduate studies for details. Admission is competitive. Interested students should apply to the program in the spring semester of their junior year.

## Graduate Courses and Seminars <br> ECON 609(6090) Microeconomic. Theory I Fall. 4 credits.

Topics in consumer and producer theory.

## ECON 610(6100) Microeconomic Theory II

Spring. 4 credits.
Topics in consumer and producer theory, equilibrium models and their application, externalities and public goods, intertemporal choice, simple dynamic models and resource depletion, choice under uncertainty.

## ECON 611(6110) Microeconomic Theory III

Fall. 4 credits. Prerequisites: ECON 609 and 610.

This class is part of a three-semester sequence in microeconomic theory. It provides a rigorous underpinning of partial equilibrium competitive analysis and reviews theories of non-competitive markets, including Bertrand, Cournot, and monopolistic competition. It covers the classical sources of market failure (public goods, externalities, and natural monopoly) and discusses market failures stemming from informational asymmetries. It also provides an introduction to contract theory, bargaining theory, social choice theory, and theory of mechanism design.

## ECON 613(6130) Macroeconomic Theory I

## Fall. 4 credits.

Covers the following topics: static general equilibrium; intertemporal general equilibrium: infinitely lived agents models and overlapping generations models; welfare theorems; equivalence between sequential markets and Arrow-Debreu Markets; Ricardian proposition; Modigliani-Miller theorem; asset pricing; recursive competitive equilibrium; the Neoclassical Growth Model; calibration; and introduction to dynamic programming.

## ECON 614(6140) Macroeconomic Theory II

Spring. 4 credits.
Covers the following topics: dynamic programming: stochastic growth; search models; cash-in-advance models; real business-cycle models; labor indivisibilities and lotteries; heterogeneous agents models; optimal fiscal and monetary policy; sustainable plans; and endogenous growth.

## ECON 617(6170) Intermediate

 Mathematical Economics IFall. 4 credits. Prerequisites: calculus II and intermediate linear algebra.
Covers selected topics in Matrix algebra (vector spaces, matrices, simultaneous linear equations, characteristic value problem), calculus of several variables (elementary real analysis, partial differentiation, convex analysis), classical optimization theory (unconstrained maximization, constrained maximization).

## [ECON 618(6180) Intermediate Mathematical Economics II

Spring. 4 credits. Next offered 2009-2010. Continuation of ECON 617. Develops additional mathematical techniques for applications in economics. Topics may include study of dynamic systems (linear and nonlinear difference equations, differential equation, chaotic behavior), dynamic optimization methods (optimal control theory, nonstochastic and stochastic dynamic programming), and game theory (repeated dynamic and evolutionary games).]

## ECON 619(6190) Econometrics I

Fall. 4 credits. Prerequisite: ECON 319-320
or permission of instructor.
Gives the probabilistic and statistical background for meaningful application of econometric techniques. Topics include probability theory probability spaces, random variables, distributions, moments, transformations, conditional distributions, distribution theory and the multivariate normal distribution, convergence concepts, laws of large numbers, central limit theorems, Monte Carlo simulation; statistics: sample statistics, sufficiency, exponential families of distributions. Further topics in statistics are considered in FCON 620.

## ECON 620(6200) Econometrics II

Spring. 4 credits. Prerequisite: ECON 619. A continuation of ECON 619 (Econometrics I) covering statistics: estimation theory, least squares methods, method of maximum likelihood, generalized method of moments, theory of hypothesis testing, asymptotic test theory, and nonnested hypothesis testing; and econometrics: the general linear model, generalized least squares, specification tests, instrumental variables, dynamic regression models, linear simultaneous equation models, nonlinear models, and applications.

## ECON 676(6760) Decision Theory I (also ECON 476[4760], CIS 576[5846]) <br> For description, see ECON 476.

## ECON 677(6770) Decision Theory II (also ECON 477[4770], CIS 577[5847]) For description, see ECON 477

ECON 691(6910) Health Economics I
For description, see PAM 691
ECON 692(6920) Health Economics II
For description, see PAM 692.

## ECON 699(6990) Readings in Economics

Fall or spring. Variable credit.
Independent study.

## ECON 703(7030) Seminar in Peace

 ScienceFall. 4 credits.
Topics covered at an advanced level are: game theory, coalition theory, bargaining and negotiation processes, cooperative procedures, microbehavior models, macrosocial processes, and general systems analysis.

## ECON 710(7100) Stochastic Economics:

 Concepts and TechniquesSpring. 4 credits. Prerequisites: ECON 609. $610,613,614,619$, and 620.
Reviews a number of techniques that have been useful in developing stochastic models of economic hehavior. These include discretetime Markov processes, dynamic programming under uncertainty, and continuous-time diffusion processes. Examples of economic models are drawn from recent literature on optimal capital accumulation and optimal savings and portfolio selection problems; permanent income hypothesis; and dynamic models of price adjustment. Advanced graduate students contemplating work in economic theory and econometric theory gain exposure to current research.

## ECON 712(7120) Advanced Macroeconomics

4 credits. Prerequisites: ECON 613, 614. Introduces students to some of the topics and analytic techniques of current macroeconomic research. The course has three parts: dynamic programming, new Keynesian economics, and recent theories of economic growth. The dynamic programming section includes models of consumption, investment, and real business cycles. The new Keynesian section covers models of wage and price rigidity, coordination failure, and credit markets. The section on endogenous growth looks at recent efforts to add nonconvexities to models of optimal growth. These topics are intended to complement the material on overlapping generations covered elsewhere.

## ECON 713(7130) Advanced

 Macroeconomics IISpring. 4 credits. Prerequisites: ECON 613, 614.

Reviews the most recent research in endogenous growth theory. This theory is little more than a decade old, but it has produced a large number of both empirical and theoretical results that have substantially reshaped the general field of macroeconomics. It is perhaps no exaggeration to say that most of the work at the frontier of today's macroeconomics belongs to this field. An increasing number of papers have been touching important issues such as learning by doing, RD investment, market structure, private and public organization of RD, education financing. human capital accumulation, technological unemployment, growth and business cycles,
inequality and growth, political equilibrium, democracy and growth, instability, social conflict, capital accumulation, intergenerational and vested interests and barriers to technology adoption, international transfers of technologies, and sustainable development. This course aims to orient the student in this large and variegated literature consisting of recently published articles and working papers. Understanding this literature is a sound training in the analytical methods used at the frontier of theoretical research, but it also provides a number of empirical results at the center of the economic debate.

## ECON 714(7140) Empirical

 MacroeconomicsSpring. 4 credits. Prerequisites: ECON 613 and 614.
Advanced graduate-level course emphasizing empirical applications. Students learn how to deal with data and how to estimate and test macroeconomic theories, and can develop research topics in applied macroeconomics for their dissertations

## ECON 717(7170) Mathematical

## Economics

4 credits. Prerequisites: ECON 609-610 (or equivalent training in micro theory) and MATH 413-414 (or equivalent training in analysis).
The primary theme of this course is to explore the role of prices in achieving an efficient allocation of resources in dynamic economies. Some of the classical results on static equilibrium theory and welfare economics on attaining optimal allocation through decentralized organizations are examined through an axiomatic approach. Some basic issues on capital theory are also analyzed.

## [ECON 718(7180) Topics in Mathematical

 EconomicsSpring. 4 credits. Next offered 2009-2010.]

## ECON 719(7190) Advanced Topics in

 Econometrics IFall. 4 credits. Prerequisite: ECON 619-620 or permission of instructor.
Covers advanced topics in econometrics, such as asymptotic estimation and test theory, robust estimation, Bayesian inference, advanced topics in time-series analysis, errors in variable and latent variable models, qualitative and limited dependent variables, aggregation, panel data, and duration models.

## ECON 720(7200) Advanced Topics in

 Econometrics IISpring. 4 credits. Prerequisite: ECON 619
620 or permission of instructor.
For description see ECON 719.

## ECON 721(7210) Time Series

 EconometricsFall. Á credits. Prerequisite: ECON 619-620 or permission of instructor.
Covers traditional and current time series techniques that are widely used in econometrics. Topics include the theory of stationary stochastic processes including univariate ARMA $(p, q)$ models, spectral density analysis, and vector autoregressive models: parametric and semi-parametric estimation; current developments in distributional theory; and estimation and testing in models with integrated regressors including, unit root tests, cointegration, and permanent vs. transitory components.

## ECON 722(7210) Topics in Time Series

 EconometricsSpring, 4 credits. Prerequisite: ECON 721 Covers topics not treated by ECON 721. These include co-integration, fractional integration, long memory, and ARCH/GARCH models. Other topics may also be considered based on the interests of the students.

## ECON 723(7230) Semi/Non Parametric

 EconometricsFall. 4 credits. Prerequisite: ECON 619-620 or permission of instructor.
Analyzes the ways identification problems limit the conclusions that may be drawn in empirical economic research and studies how identified and partially identified parameters can be estimated. In the first part of the course, the focus is on nonparametric models. Ways data can be combined with weak assumptions to yield partial identification of population parameters are discussed.

## ECON 731(7310) Monetary Economics

Spring. 4 credits. Prerequisites: ECON 614 or permission of instructor.
Covers advanced topics in monetary economics, macroeconomics, and economic growth-such as overlapping-generations, taxes and transfers denominated in money, transactions demand for money, multi-asset accumulation, exchange rates, and financial intermediation.

## ECON 732(7320) Monetary Economics

Fall. 4 credits. Prerequisites: ECON 731 or permission of instructor
Covers advanced topics in monetary economics, macroeconomics, and economic growth-such as economic volatility, the "burden" of government delt, restrictions on government borrowing, dynamic optimization, endogenous growth theory, technological evolution, financial market frictions, and cyclical fluctuations.

## ECON 735(7350) Public Finance:

 Resource Allocation and Fiscal Policy (also AEM 735[7350])
## Fall. 4 credits.

Develops a mathematical and highly analytical understanding of the role of government in market economies and the fundamentals of public economics and related issues. Topics include generalizations and extensions of the fundamental theorems of welfare economics, in-depth analysis of social choice theory and the theory on implementation in economic environments, public goods and externalities and other forms of market failure associated with asymmetric information. The theoretical foundation for optimal direct and indirect taxation is also introduced along with the development of various consumer surplus measures and an application to benefit cost analysis. Topics of an applied nature vary from semester to semester depending on faculty research interests.

ECON 736(7360) Public Finance: Resource Allocation and Fiscal Policy
Spring. 4 credits.
Spends a large part of the semester covering the revenue side of public finance. Topics include the impact of various types of taxes as well as the determination of optimal taxation. The impact of taxation on labor supply, savings, company finance and investment behavior, risk bearing, and portfolio choice are explored. Other topics include the interaction of taxation and inflation, tax evasion, tax incidence, social security,
unemployment insurance, deficits, and interactions between different levels of government.

## [ECON 737(7370) Location Theory and

 Regional AnalysisFall. 4 credits. Prerequisites: ECON 609, 617, and econometrics course. Next offered 2009-2010.
Covers economic principles influencing the location of economic activity, its spatial equilibrium structure, and dynamic forces. Topics include spatial pricing policies, price competition, and relocation by firms; residential location patterns; patterns of regional growth and decline; and patterns of urbanization.]

## ECON 738(7380) Public Choice

Spring. 4 credits. Prerequisites: ECON 609, 610.

This course has two parts. It begins with an introduction to economic theories of political decision making. Reviews the theory of voting, theories of political parties and party competition, theories of legislative decision making and interest group influence. Also discusses empirical evidence concerning the validity of these theories. The second part uses these theories to address a number of issues in public economics. Develops the theory of political failure, analyzes the performance of alternative political systems and discusses the problem of doing policy analysis, which takes into account political constraints.

## ECON 739(7390) Advanced Topics in State and Local Public Finance

Spring. 4 credits. Prerequisites: ECON 609, 620.

Provides an in-depth examination of microeconomic theory surrounding the role of subnational governments and jurisdictions in the economy, Among the broad questions addressed are: What tasks are optimally assigned to local governments? What impact can such assignment have on efficiency and equity? In addition to the theoretical foundations on these issues, the course explores recent empirical evidence in this area, with particular attention to the research designs and data used in relevant papers.

## ECON 740(7400) Social and Economic Data <br> Spring. 4 credits. <br> For description, see ILRLE 740.

## ECON 741(7410) Seminar in Labor Economics

For description, see ILRLE 744.

## ECON 742(7420) Seminar in Labor

 EconomicsFor description, see ILRLE 745.

## ECON 743(7430) Seminar in Labor Economics

For description, see ILRLE 746.

## ECON 746(7460) Economics of Higher Education

For description, see ILRLE 746.

## ECON 747(7470) Economics of Higher Education

For description, see ILRLE 747.
ECON 748(7480) Applied Econometrics I For description, see ILRLE 741.
ECON 749(7490) Applied Econometrics II For description, see ILRLE 742.

ECON 751(7510) Industrial Organization and Regulation
Fall. 4 credits. Prerequisites: ECON 609, 610.

Focuses primarily on recent theoretical advances in the study of industrial organization. Topics include market structure, nonlinear pricing, quality, durability, location selection, repeated games, collusion, entry deterrence, managerial incentives, switching costs, government intervention, and R\&D/ patents. These topics are discussed in a gametheoretic context.

## ECON 752(7520) Industrial Organization

 and RegulationSpring. 4 credits. Prerequisites: ECON 609, 610, 751.
Rounds out some topics in the theory of industrial organization with the specific intent of addressing the empirical implications of the theory. Reviews empirical literature in the SCP paradigm and in the NEIO paradigm.

## ECON 756(7560) Noncooperative Game Theory

Fall. 4 credits. Prerequisites: ECON 609-610 and 619.
Surveys equilibrium concepts for noncooperative games. Covers Nash equilibrium and a variety of equilibrium, refinements, including perfect equilibrium, proper equilibrium, sequential equilibrium and more. Pays attention to important special classes of games, including bargaining games, signalling games, and games of incomplete information. Most of the analysis is from the strict decision-theoretic point of view, but also surveys some models of bounded rationality in games, including games played by automata.

## ECON 757(7570) Economics of Imperfect Information

Spring. 4 credits. Prerequisites: ECON 609610 and 619.
Considers some major topics in the economics of uncertain information. Although the precise topics considered vary from year to year, subjects such as markets with asymmetric information, signalling theory, sequential choice theory, and record theory are discussed.

## ECON 758(7580) Psychology and

 Economic TheoryFall, spring. 4 credits. Prerequisites: economics graduate core or permission of instructor.
Explores the ways in which insights from psychology can be integrated into economic theory. Presents evidence on how human behavior systematically departs from the standard assumptions of Economics and how this can be incorporated into modeling techniques.

## ECON 760(7600) Toplcs in Political Economy

Fall. 4 credits. Prerequisite: economics graduate core or permission of instructor. Develops critiques and extensions of economic theory, taking into account the political and social moorings of economic activity and equilibria. The formation and persistence of social norms; the meaning and emergence of property rights; the role of policy advice in influencing economic outcomes; and the effect of political power and ideology on economic variables are studied. While these topics were popular in the classic works of political economy, recent advances in game theory and, more generally,
game-theoretic thinking allows a new approach to these topics. Hence, the course begins by devoting some lectures to elementary ideas in game-theory and strategic analysis.

## ECON 761(7610) International

Economics: Trade Theory and Policy
Fall. 4 credits. Prerequisites: ECON 609,
610.

Surveys the sources of comparative advantage Analyzes simple general equilibrium models to illustrate the direction, volume, and welfare effects of trade. Topics in game theory and econometrics as applied to international economics may be covered.

## ECON 762(7620) International

## Economics: International Finance

 and Open Economy MacroeconomicsSpring. 4 credits. Prerequisite: ECON 761. Surveys the determination of exchange rates and theories of balance of payment adjustments. Explores open economy macroeconomics by analyzing models of monetary economies. Topics in monetary economics and econometrics as applied to international economics are covered.

## ECON 763(7630) Topics in International Economic Mistory

Spring. 4 credits. Prerequisite: solid understanding of international trade and finance.
Covers selected topics in modern economic history. Focuses on the process of international economic integration, or globalization. Traces the roots of globalization and its evolution in the last several centuries. Special attention is paid to the relationship between international market integration and economic growth.
ECON 770(7700) Topics in Economic Development
For description, see AEM 667.
ECON 771(7711) Empirical Methods for the Analysis of Household Survey Data: Applications to Nutrition, Health, and Poverty
Spring. 4 credits. Prerequisites: economics graduate core.
Focuses on empirical methods for the analysis of household survey data. Explores the handson use of such data to address policies issues related to welfare outcomes, particularly nutrition, health, education, and poverty. Covers empirical methods as they apply to a series of measurement and modeling issues, as well as the valuation of interventions. While underlying theory is reviewed briefly, the course attempts to bridge the gap between theory and practice, addressing issues such as model identification, functional form, estimation techniques to control for endogeneity and heterogeneity, and so forth. The course grade is based primarily on two empirical exercises, and related write-up, as well as class participation. Students are given actual household data sets and software with which to conduct exercises. These data enable students to apply analytical techniques discussed. Data sets are provided from African, Asian, and Latin American countries.

## ECON 77247720) Economics of

 Development (also ILRLE 749[7490])Spring. 4 credits. Prerequisites: first-year graduate economic theory and econometrics.
Analytical approaches to the economic problems of developing nations. Topics include old and new directions in development economics thinking, the welfare economics of poverty and inequality, empirical evidence on who benefits from economic development, labor market models, project analysis with application to the economics of education, and development policy.

## ECON 773(7730) Economic Development

Fall. 4 credits. Prerequisites: ECON 609, 610 , and 611.
Concerned with theoretical and applied works that seek to explain economic development, or lack thereof, in countries at low-income levels. Specific topics vary each semester.

## ECON 774(7740) Economic Systems

Spring. 4 credits.
Deals with economic systems, formerly centrally planned economies, and economies in transition.

## ECON 775(7750) Development <br> Microeconomics

Spring. 4 credits. Prerequisites: economics graduate core.
Explores the application of microeconomic analysis to economic issues in developing countries. Focuses on household behavior and the analysis or rural institutions. Covers the neoclassical agricultural household model and recent developments in the theory of the household, topics in rural economies, financial arrangements, program evaluation and the interaction of social norms and economic organization. Designed to prepare students for applied research in micro development economics by giving an overview over the current state of research in that discipline.

## ECON 784(7840) Seminars In Advanced

 EconomicsFall and spring. 4 credits.

## ECON 785(7850) Third-Year Research

 SeminarFall. 4 credits.

## ENGLISH

M. Hite, chair; L. Donaldson, director of undergraduate studies (255-3492); J. Adams, director of graduate studies (255-7989);
B . Correll, director of honors program;
K. Attell, K. Biers, F. Bogel, L. Bogel,
J. Braddock, M. P. Brady, L. Brown, J. Carlacio,
C. Chase, E. Cheyfitz, J. Culler, S. Davis,
E. DeLoughrey, L. Fakundiny, A.-L. François,
D. Fried, A. Fulton, A. Galloway, R. Gilbert, K. Gottschalk, E. Hanson, T. Hill, M. Hite, P. Janowitz, B. Jeyifo, W. Jones, R. Kalas, M. Koch, J. Lennon, P. Lorenz, J. Mann, B. Maxwell, K. McClane, M. McCoy, M. K. McCullough, S. Mohanty, R. Morgan, T. Murray, R. Parker, E. Quinonez,
M. Raskolnikov, C. Ruff, N. Saccamano, S. Samuels, P. Sawyer, D. Schwartz, H. Shaw, S. Siegel, L. VanClief-Stefanon, S. Vaughn, H. Viramontes, N. Waligora-Davis, S. Wong, D. Woubshet, S. Zacher. Emeriti: M. H. Abrams, B. Adams, J. Bishop, J. Blackall, A. Caputi, D. Eddy, R. Elias, L. Herrin, M. Jacobus, C. Kaske, A. Lurie, P. Marcus, D. McCall, J. McConkey, D. Mermin, S. Parrish,
M. Radzinowicz, E. Rosenberg, S. C. Strout, W. Wetherbee.

The Department of English offers a wide range of courses in English, American, and Anglophone literature as well as in creative writing, expository writing, and film analysis Literature courses focus variously on close reading of texts, study of particular authors and genres, questions of critical theory and method, and the relationship of literary works to their historical contexts and to other disciplines. Writing courses typically employ the workshop method in which students develop their skills by responding to criticism of their work by their classmates as well as their instructors. Many students supplement their formal course work in English by attending public lectures and poetry readings sponsored by the department or by writing for campus literary magazines. The department seeks not only to foster critical analysis and lucid writing but also to teach students to think about the nature of language and to be alert to both the rigors and the pleasures of reading texts of diverse inspiration.

## First-Year Writing Seminars

As part of the university-wide First-Year Writing Seminars program administered by the John S. Knight Institute for Writing in the Disciplines, the department offers many onesemester courses dealing with various forms of writing (e.g., narrative, autobiographical, and expository), with the study of specific areas in English and American literature, and with the relation of literature to culture. Students may apply any of these courses to their first-year writing seminar requirement. Detailed course descriptions may be found in the first-year writing seminars program listings available from college registrars in August for the fall semester and in November for the spring semester.
Freshmen interested in majoring in English are encouraged to take at least one of the department's 200-level first-year writing seminars: ENGL 270 The Reading of Fiction, ENGL 271 The Reading of Poetry, and ENGL 272 Introduction to Drama. These courses are open to all second-semester freshmen. They are also open, as space permits, to firstsemester freshmen with scores of 700 or above on the CEEB College Placement Tests
in English composition or literature, or 4 or 5 on the CEEB Advanced Placement Examination in English, as well as to students who have completed another first-year writing seminar.

## Courses for Nonmajors

For students majoring in fields other than English, the department provides a variety of courses at all levels. A number of courses at the 200 level are open to qualified freshmen, and all are open to sophomores. Courses at the 300 level are open to all sophomores, juniors, and seniors; they are also open to freshmen who have received the instructor's prior permission. The suitability of courses at the 400 level for nonmajors depends in part on the course topics, which are subject to change from year to year. Permission of the instructor is sometimes required; prior consultation is always strongly advised.

## The Major in English

Students who major in English develop their own programs of study in consultation with their major advisors. Some choose to focus on a particular historical period or literary genre or to combine sustained work in creative writing with the study of literature. Others pursue interests in such areas as women's literature, African-American literature, literature and the visual arts, or critical theory.

The department recommends that students prepare themselves for the English major by taking one or more of its preparatory courses, such as ENGL 270 The Reading of Fiction, ENGL 271 The Reading of Poetry, or ENGL 272 Introduction to Drama. (The "ENGL" prefix identifies courses sponsored by the Department of English, all of which appear in the English section of Courses of Study or the department's supplementary lists of courses; it also identifies courses sponsored and taught by other academic units and cross-listed with English.) These courses concentrate on the skills basic to the English major and to much other academic work-responsive, sensitive reading and lucid, strong writing. As first-year writing seminars, any one of them will satisfy one half of the College of Arts and Science's first-year writing requirement. ENGL 280, 281, 288 , and 289 are also suitable preparations for the major and are open to students who have completed their first-year writing seminar requirement. ENGL 201 and 202, which together constitute a two-semester survey of major British writers, though not required, are strongly recommended for majors and prospective majors. ENGL 201 and 202 (unlike ENGL 280, 281, 288, and 289) are also "approved for the major" in the special sense of that phrase explained below.

To graduate with a major in English, a student must complete with passing letter grades 10 courses ( 40 credit hours) approved for the English major. All ENGL courses numbered 300 and above are approved for the major. In addition, with the exception of first-year writing seminars (ENGL 270, 271, and 272), 200 -level courses in creative and expository writing (ENGL 280, 281, 288, and 289), and courses designated for nonmajors, all 200-level ENGL courses are also approved for the major. Courses used to meet requirements for the English major may also be used to meet the distribution requirements in the College of Arts and Sciences. Many of these courses may be used to meet the college's "historical breadth" requirement as well.

Of the 40 credits required to complete the major, 8 credits (two courses) must be at the 400 level or above; 12 credits (three courses) must be from courses in which 50 percent or more of the material consists of literature originally written in English before 1800; and another 12 credits (three courses) must form an intellectually coherent "concentration." The 400 -level and pre- 1800 requirements may be satisfied only with ENGL courses, and ENGL 493-494, the Honors Essay Tutorial, may not be used to satisfy either one. Courses that satisfy the pre- 1800 requirement are so designated in Courses of Study. Many English majors use ENGL 201 to begin meeting this requirement since it provides an overview of earlier periods of British literature and so enables them to make more informed choices of additional pre- 1800 courses. ENGL 202 does not qualify as a pre- 1800 course. Neither do courses offered by other departments unless they are cross-listed with English. Advanced courses in foreign literature may not be used to fulfill the pre- 1800 requirement, but they may be used for English major credit provided they are included within the 12 -credit limit described below. The three-course concentration requirement may be satisfied with any courses approved for the major. The department's "Guide to the English Major" suggests areas of concentration and offers examples of courses that fall within those areas, but majors define their own concentrations in consultation with their advisors.

As many as 12 credits in appropriate courses offered by departments and programs other than English may be used to satisfy English major requirements. Courses in literature and creative writing offered by academic units representing neighboring or allied disciplines (German Studies, Romance Studies, Russian, Asian Studies, Classics, Comparative Literature, Africana Studies, the Society for the Humanities, American Studies, Feminist, Gender and Sexuality Studies, Religious Studies, Asian American Studies, American Indian Studies, Latino Studies, and Theatre, Film, and Dance) are routinely counted toward the 40 hours of major credit provided they are appropriate for juniors or seniors, as are most courses at the 300 level and above. English majors who are double majors may exercise this option even if all 12 credits are applied to their second major. All English majors are urged to take courses in which they read foreign works of literature in the original language, and for that reason 200level literature courses for which qualification is a prerequisite (as well as more advanced foreign literature courses) may be counted toward the English major. Credit from other non-ENGL courses may be included within the 12 credits of nondepartmental courses approved for the major only when the student is able to demonstrate to the advisor's satisfaction their relevance to his or her individual program of study.

## Planning a Program of Study

Few students know from the moment they decide to pursue a major in English exactly what they wish to study. Moreover, it is natural for interests to change in the course of time. The effort of creating or discovering a coherent pattern in the courses selected is itself a valuable part of a literary (as well as a liberal) education, and English majors are expected to discuss their overall program of
study when seeking their advisors' approval of courses each semester. While the Department leaves a great deal to the discretion of its individual majors and their academic advisers, it expects them to choose courses with an eye to breadth and variety on the one hand and focus and coherence on the other.
Students with a special interest in developing their skills as writers of verse or prose will find a variety of workshop courses in expository and creative writing. As a rule a student may not enroll in more than one such course in any given semester, although exceptions are sometimes allowed where one of these is ENGL 288 or 289.
A number of English majors do part of their course work at a foreign institution, usually during their junior year; some spend a single semester away from campus, others an entire year. The Cornell Abroad office has information on a variety of programs at universities around the world. Many English majors study abroad in the United Kingdom and other English speaking countries, but some choose other locations. As long as they continue to meet all College and Department requirements or can complete them upon returning to Cornell, studying abroad poses no serious problems. Students spending their entire junior year abroad will be challenged to complete the Department's Honors program since they will be unable to take the required Honors seminar in the junior year and will have to take it when they return as seniors. They must make arrangements with the chair of the Honors Committee before leaving campus.
Credit for literature courses taken abroad can in most instances be applied to the 40 -hour minimum for the English major, and to requirements like the concentration and pre1800 requirements. Approval of requests to apply credit for study abroad to the English major is granted by the DUS rather than the academic advisor, however, and students must confer with the DUS in advance of going abroad as well as on their return. The first conference includes a review of catalogue descriptions of courses the student expects to take while abroad (along with a few alternatives), the second a presentation of transcripts or equivalent documentation of successful completion of the work proposed, together with papers and exams.
No more than 16 credits per year, or 8 credits per semester, of non-Cornell credit may be applied to the English major. This restriction applies to study abroad even when that study is conducted under Cornell auspices.

## The Major in English with Honors

Second-semester sophomores who have done superior work in English and related subjects are encouraged to seek admission to the departmental program leading to the degree of bachelor of arts with honors in English. Following an interview with the chair of the Honors Committee, qualified students will be admitted provisionally to the program. During their junior year these students complete at least one honors seminar (ENGL 491 or 492) and are encouraged to take an additional 400 level English course in the area of their thesis topic. On the basis of work in these and other English courses, a provisional honors candidate must select a thesis topic and secure a thesis advisor by the end of the junior year. A student who has been accepted
by a thesis advisor becomes a candidate for honors rather than a provisional candidate.
During the senior year, each candidate for honors in English enrolls in a yearlong tutorial (ENGL 493-494) with the faculty member chosen as thesis advisor. The year's work culminates in the submission of a substantial scholarly or critical essay to be judged by at least two members of the faculty. More information about the Honors Program may be found in a leaflet available in the English offices.

## First-Year Writing Seminars Recommended for Prospective Majors

ENGL 270(2700) The Reading of Fiction Fall, spring, summer. 3 credits. Each section limited to 17 students. Recommended for prospective majors in English. This course does not satisfy requirements for the English major. This course examines modern fiction, with an emphasis on the short story and novella. Students write critical essays on authors who flourished between 1870 and the present, such as James, Joyce, Woolf, Hurston, Lawrence, Fitzgerald, Hemingway, Faulkner, Rhys, Welty, Salinger, and Morrison. Reading lists vary from section to section, and some may include a novel, but close, attentive, and imaginative reading and writing are central to all.

## ENGL 271(2710) The Reading of Poetry

Fall, spring. 3 credits. Each section limited to 17 students. Recommended for prospective English majors. This course does not satisfy requirements for the English major.
How can we become more appreciative, alert readers of poetry, and at the same time better writers of prose? This course attends to the rich variety of poems written in English, drawing on the works of poets from William Shakespeare to Sylvia Plath, John Keats to LiYoung Lee, Emily Dickinson to A. R. Ammons. We may read songs, sonnets, odes, villanelles, even limericks. By engaging in thorough discussions and varied writing assignments, we explore some of the major periods, modes, and genres of English poetry, and in the process expand the possibilities of our own writing.

## ENGL 272(2720) The Reading of Drama

Fall, spring. 3 credits. Each sec limited to 17 students. Recommended for prospective English majors. This course does not satisfy requirements for the English major.
In this course, we will study and write critically about plays, older and newer, in a variety of dramatic idioms and cultural traditions. We will practice close, interpretive reading of texts and pay attention to their possibilities for live and filmed performance. Readings will include works by such playwrights as Sophocles and Shakespeare, Arthur Miller and Caryl Churchill, Ntosake Shange and Tony Kushner, and some drama criticism and performance theory. Attendance at screenings and at live productions by the Theatre Department may be required.

## Expository Writing

## ENOL 288-289(2880-2890) Expository

 Writing (LA-A8)Fall, spring, summer, and winter. 4 credits. Each section limited to 16 students. Students must have completed their colleges' first-year writing requirements or have the permission of the instructor. S. Davis and staff. Web site: http:// instruct1.cit.cornell.edu/Courses/engl288289/ This course does not satisfy requirements for the English major.
ENGL 288-89 offers guidance and an audience for students who wish to gain skill in expository writing. Each section provides a context for writing defined by a form of exposition, a disciplinary area, a practice, or a topic intimately related to the written medium Course members will read in relevant published material and write and revise their own work regularly, while reviewing and responding to one another's essays. Since these seminar-sized courses depend on members' full participation, regular attendance and submission of written work are required. Students and instructors will confer individually throughout the semester. ENGL 288-89 does not satisfy requirements for the English major.
Fall 2007 listing: Section 1. Choosing Sides: Horror and Drama in Cinema, M. Garrett; Section 2. Endsight: Apocalyptic Fictions, T. Kearns; Section 3. The University, Society and the Law, A. Miller; Section 4. Controversies in Criminal Justice,
W. Schurmann; Section 5. Issues, Audiences, and Ourselves, B. LeGendre; Section 6. Global Romances: Crossing Boundaries, K. Shandilya; Section 7. The Reflective Essay, K. Gottschalk.

See English department course offerings for full fall and spring section descriptions.

## ENGL 381(3810) Reading as Writing, Writing as Reading (LA-AS)

Fall. 4 credits. Limited to 15 students. Prerequisite: permission of instructor based on a writing sample. S. Davis.
Every reading is a rewriting; every original imaginative work reads and rewrites itself and its predecessors as it goes along. We'll read 19th- and 20th-century works that illustrate this process while attending to one another's critical writing as collaborators and commentators. This is a course for English majors and non-majors who wish to extend their mastery of critical and interpretive prose and their understanding of what they do when they write it. Tentatively for 2008: fiction by Vladimir Nabokov, Emily Bronte, Jean Rhys, Doris Lessing, J. M. Coetzee, and Virginia Woolf. See http://instruct1.cit.cornell. edu/~sad4/rw/.

## ENGL 386(3860) Phllosophic Fictlons (LA-AS)

Spring. 4 credits. Limited to 15 students. Prerequisite: permission of instructor based on a writing sample. S. Davis.
"Fictions" of thought and language abound in works that deliberately test and play with ideas: dialogues, satires, parables, philosophic tales, and "thought-experiments." Students will write critically about such works and will experiment with writing in similar forms in order to argue flexibly, ridicule vice and folly, or involve readers in pleasingly or disturbingly insoluble problems. Readings may include Plato's Pbaedras or Gorgias, Swift's Gulliver's Travels, parables by Jesus and Kafka,
dystopias by Ursula Le Guin and Caryl
Churchill, science fiction by Philip K. Dick
and Octavia Butler, short stories by Jorge Luis Borges and Flannery O'Connor, and essays by Richard Rorty and Jacques Derrida. See http:// instruct1 .cit.cornell.edu/ $\sim \operatorname{sad} 4 / \mathrm{fpf} /$.

## [ENGL 387(3870) Autoblography: Theory

 and Practice (LA-AS)Fall. 4 credits. Limited to 15 students. By permission of instructor on the basis of writing samples. Next offered 2008-2009. K. Gottschalk.]

## ENGL 388(3880) The Art of the Essay (LA-AS)

Spring. 4 credits, Limited to 15 students. By permission of instructor on the basis of writing samples. Interested students should submit one or more pieces of recent writing (prose) to the instructor before the beginning of the semester, preferably at pre-enrollment. J. Carlacio.
The term "essay" means "an attempt." Thus, essays are short "attempts" to explore features of one's own experience, to pass onto the reader a very personal and often digressive reflection on some aspect of one's own personality or reflections about people that arise from that exercise, and whose subject matter provides a springboard for more selfreflection. For both English majors and non-majors who have done distinguished work in first-year writing seminars and in 200level courses, and who desire intensive practice in creative nonfiction, the course assumes a high degree of self-motivation and a critical interest in the work of other writers. Students will submit a final portfolio of conceptually rich and stylistically polished writing. Writing sample required before the first day of class.

## Creative Writing

Students usually begin their work in Creative Writing with ENGL 280 or 281, and only after completion of the First-Year Writing Seminar requirement. Please note that either ENGL 280 or ENGL 281 is the recommended prerequisite for 300 -level creative writing courses. ENGL 280 and 281 may satisfy a distribution requirement in your college (please check with your college advisor). ENGL 382-383, 384-385, and 480-481 are approved for the English major,

## ENGL 280-281(2800-2810) Creative Writing (LA-AS)

Fall, spring, summer, winter. 3 credits. Limited to 18 students. Prerequisite: completion of the First-Year Writing Seminar requirement. Majors and prospective majors, please note: Although recommended for prospective English majors, ENGL 280-281 cannot be counted toward the 40 credits required for completion of the English major. It is a prerequisite for 300 -level courses in creative writing, which count toward the major. ENGL 280 is not a prerequisite for ENGL 281.)
An introductory course in the theory, practice, and reading of prose, poetry, and allied forms. Students are given the opportunity to try both prose and verse writing and may specialize in one or the other. Many of the class meetings are conducted as workshops.

## ENGL 382-383(3820-3830) Narrative Writing (LA-As)

Fall, 382; spring, 383. 4 credits each semester. Each section limited to 15 students. Prerequisite: ENGL 280 or 281 and permission of instructor based on submission of a manuscript (bring manuscript to first day of class). Fall: sec 1 , M. McCoy; sec 2, H. Viramontes; sec 3. J. Lennon; Spring: sec 1, S. Vaughn; sec 2, E. Quinonez; sec 3, M. McCoy; sec 4, M. Koch.

The writing of fiction; study of models; analysis of students' work.

## ENGL 384-385(3840-3850) Verse Writing

 (LA-AS)Fall or summer, 384 ; spring, 385. 4 credits. Each section limited to 15 students. Prerequisite: ENGL 280 or 281 and permission of instructor based on submission of manuscript (bring manuscript on first day of class). Fall: sec 1, P. Janowitz; sec 2, L. Van Clief-Stefanon. Spring: sec 1, P. Janowitz; sec 2, M. Doty.
The writing of poetry; study of models; analysis of students' poems; personal conferences.

## ENGL 480-481(4800-4810) Seminar in

 Writing (LA-AS)Fall, 480; spring, 481. 4 credits each semester. Each section limited to 15 students. Prerequisite: permission of instructor, normally on the basis of a manuscript. The manuscript should be submitted to the instructor no later than the first day of class. Previous enrollment in ENGL 280 or 281 and at least one 300level writing course recommended. Successful completion of one half of the $480-481$ sequence does not guarantee enrollment in the other half; students must receive permission of the instructor to enroll in the second course. Fall: sec 1, H. Viramontes; sec 2, M. McCoy; spring: D. Johnson and P. Janowitz.

Intended for those writers who have already gained a basic mastery of technique. Although ENGL 480 is not a prerequisite for ENGL 481, students normally enroll for both semesters and should be capable of a major project-a collection of stories or poems, a group of personal essays, or perhaps a novel-to be completed by the end of the second semester. Seminars are used for discussion of the students' manuscripts and published works that individual members have found of exceptional value.

## Courses for Freshmen and Sophomores

These courses have no prerequisites and are open to freshmen and nonmajors as well as majors and prospective majors.

## Introductions to Literary Studies

ENGL 200(2000) Introduction to Criticism and Theory (LA-AS)
Spring. 4 credits. S. Mohanty.
This is an introductory course that explores some of the key concepts and methods used in literary studies. Focusing on a few literary texts and some drawn from popular culture, we will try to answer such basic questions as: what does it mean to read and analyze texts well? What roles do history and social ideology play in our readings? What, after all, is "art"?

We will also focus on literary and cultural theory, examining both contemporary questions and historical ones. Readings on aesthetics and critical theory from a variety of cultural traditions will be analyzed-from classical writings on beauty and the nature of art to contemporary works that focus on such issues as gender, race, and sexuality.
ENGL 201-202(2010-2020) The English Llierary Tradition \# (LA-AS)
201, fall; 202 spring. 4 credits each semester. ENGL 201, not a prerequisite for 202, may be used as one of the three pre1800 courses required of English majors. 201 (fall). M. Raskolnikov. An introduction to the study of English literature, examining its historical development and achievements from its "beginnings" to the middle of the 17 th century. Focus will be on the close reading of major works from a range of genres and modes, including heroic poem, romance, drama, fabliau, sonnet sequence, love lyric, court masque, pastoral, and epic. Readings will include Beowulf, Sir Gawain and the Green Knight, selections from Chaucer's Canterbury Tales, Elizabethan sonnets, a Shakespeare play, poems by Donne, Marvell, and Herbert, and a selection from Milton's Paradise Lost. Students will do some short creative exercises designed to highlight features of language and style, as well as write two 4- to 6-page papers in critical analysis. 202 (spring). P. Sawyer: A survey of major genres, movements, and authors of British literature from the Restoration to international modernism. By focusing on the language, meaning, and structure of individual works read in historical sequence, the course will be both a guide to close reading and a study of intertextual connections. Students will respond in discussion sections with a variety of writing, including short response essays and parodies. Readings will include the poetry of Dryden, Pope, the major Romantics, Browning, Tennyson, Cristina Rossetti, Hardy, Yeats, and Walcott; two plays, The Way of the World and The Importance of Being Earnest; and such prose works as Pilgrim's Progress, Gulliver's Travels, and A Room of One's Own.

## ENGL 203(2030) Introduction to American Literatures (also AM ST 206[2030]) " (LA-AS)

Fall. 4 credits. This course may be used as one of the three pre- 1800 courses required of English majors. E. Cheyfitz. Through readings of early modern travel journals, slave and captivity narratives, imaginative literature, and polemical prose, this course will encourage critical thinking about some of the central issues that have generated and continue to generate the national ethos of the United States, including Indian resistance to European invasion, the African American struggle against slavery and for civil rights, the development of global capital, and the struggle for women's rights. Readings will be taken from a list that includes American Indian oral narratives, Spanish and English accounts of the invasion of the Americas, Shakespeare's The Tempest, the Federalist, Emerson's anti-slavery speeches, the frontier novels of Lydia Maria Child and James Fenimore Cooper, and the anti-slavery narratives of Frederick Douglass and Harriet Jacobs.

ENGL 204(2040) Introduction to American Literatures: The Making of America: Reconstruction to the Present (also AM ST 207[2040]) (LA-AS)
Spring. 4 credits. D. Woubshet.
This course will introduce students to
American literature from the end of the Civil War to the present Iraq War. We will consider a great range of authors and literary movements while paying close attention to radical shifts in American life and culture in the past century and a half. We will ask: What traditions do American authors inherit and what new ones do they issue? What literary conventions do they expedite, revise, and recreate in order to articulate individual, national and global selves? We will explore these questions through a variety of genres, including poems, novels, manifestos, autobiographies, legal tracts, and homiletics. We will also give particular emphasis to the politics of (racial, gender, sexual, and class) difference in the making of modern America.
[ENOL 205(2050) Introduction to Worid Literatures in English (LA-AS)
Spring. 4 credits. Next offered 2008-2009. E. DeLoughrey.]

ENGL 206(2060) The Great American Cornell Novel (also AM ST 219[2060]) (LA-AS)
Spring. 4 credits. J. Carlacio.
Some of the best novels of the last 50 years were written by people who were students or professors at Cornell. In this class we will read and discuss some of these novels-along with some shorter fiction-by some, but regrettably not all, of the following: Manette Ansay, Paul Cody, Susan Choi, Richard Farina, Lamar Herrin, Alison Lurie, Dan McCall, Maureen McCoy, Lorrie Moore, Robert Morgan, J. Robert Lennon, Toni Morrison, Vladimir Nabokov, Stewart O'Nan, Thomas Pynchon, Stephanie Vaughn, Helena Maria Viramontes, and Kurt Vonnegut. Lecture-discussion format with sections, some guest appearances. Students will also be required to attend some readings outside of class periods.
[ENOL 207(2070) Introduction to Modern Pootry (LA-AS)
Spring. 4 credits. Next offered 2008-2009. R. Gilbert.]

ENGL 208[2080) Shakespeare and the 20th Century (LA-AS)
Spring. 4 credits. May be used as one of the three pre- 1800 courses required of English majors. S. Davis.
What can we learn about Shakespeare's plays from their reception in the 20 th and 21 st centuries? What can we learn about modern cultures from their appropriations of these texts and of the Shakespeare mystique? We will study four or five plays and their adaptations in film and theater and explore the uses made of Shakespeare in education, advertising, and public culture and by the "Shakespeare industry" itself. For spring 2008, tentatively: Romeo and Juliet, Richard III, As You Like It, Othello, and King Lear, together with plays by Wendy Wasserstein and Bertold Brecht, a live performance of As You Like It, and films or filmed performances directed by Baz Luhrmann, Richard Loncraine, Trevor Nunn, Janet Suzman, Akira Kurosawa, and Peter Brook. See http://instruct1.cit.cornell. edu/~sad4/208/.
[ENRL 209(2090] Introduction to Cultural Studies (CA-AS)
4 credits. Next offered 2008-2009.]

## ENQL 227(2270) Shakespeare (also

 THETR 277[2770]) " (LA-AS) Fall. 4 credits. May be used as one of the three pre-1800 courses required of English majors. B. Correll.A lecture and discussion course that offers students a survey of representative Shakespearean comedies, tragedies, and history plays. Our study will include attention to forms, themes, and historical contexts, including history of the early modern English theater. We read 10 plays, including The Merchant of Venice, Twelfth Night, The Tempest, Othello, King Lear, Richard II, Henry IV Part One, and Henry V.

## Major Genres and Areas

[ENGL 251(2510) 20th-Century Women Writers (also AM ST 252[2510], FCSs 251[2510]) (LA-AS)
Fall. 4 credits. Next offered 2008-2009.

## E. DeLoughrey.]

[ENGL 252(2520) Late 20th-Century Women Writers and Visual Culture (also AM ST 253[2520]) (LA-AS)
Spring. 4 credits. Limited to 15 students.
Next offered 2008-2009. S. Samuels.]

## [ENGL 255(2550) Airican Literature e

 (LA-AS)Fall. 4 credits. Next offered 2008-2009. B. Jeyifo.]
[ENGL 260(2800) Introduction to American Indan Literatures in the United States (also AM ST 260[2600]) (LA-AS)
Spring. 4 credits. Next offered 2008-2009. E. Cheyfitz.]

ENGL 262(2620) Asian American Literature (also Aas 2622620], AM ST 262[2620]) (LA-AS)
Spring. 4 credits. S. Wong.
This course will introduce both a variety of writings by Asian North American authors and some critical issues concerning the production and reception of Asian American texts. Working primarily with novels, we will be asking questions about the relation between literary forms and the sociohistorical context within which they take on their meanings, and about the historical formation of Asian American identities.

## [ENGL 273(2730) Children's Lherature

 (LA-AS)Spring. 4 credits. Next offered 2008-2009. J. Adams.]

ENGL 274(2740) Scottish LHerature * (LA-AS)
Fall. 4 credits; may be taken for 3 or 4 credits; those choosing 4 credits will complete an additional writing project. May be used as one of the three pre- 1800 courses required of English majors. H. Shaw and T. Hill.

Although Scotland, which was long a separate nation, is now politically united with England, it preserves its distinctiveness. This course provides an introduction to Scottish literature, with special emphasis on the medieval period and the 18 th through the 20 th centuries. The course should appeal to those who wish to learn about their Scottish heritage, and also those who simply wish to encounter a remarkable national culture and the literature
it has produced. Some of the texts will be read in Scots, but no familiarity with Scots or earlier English is presumed. We welcome readers of literature who are not English majors.

## ENGL 276(2760) Desire (also COM L 276[2760], FGSS 276[2760], THETR 278[2780]) (LA-AS)

Spring. 4 credits. Letter grades only. E. Hanson.
"Language is a skin," the critic Roland Barthes once wrote: "I rub my language against the other. It is as if I had words instead of fingers, or fingers at the tip of my words. My language trembles with desire." Sexual desire has a history, even a literary history, which we will examine through an introductory survey of European dramatic literature from Plato and Aristophanes to Jean Genet and Caryl Churchill, as well as a survey of classic readings in Western sexual theory from the Ancient Greeks through Freud and Foucault to contemporary feminism and queer theory Topics for discussion will include Greek pederasty, Christian mysticism, hysteria, sadomasochism, pornography, cybersex, and other performative pleasures.
[ENGL 277(2770) Literatures of the Black Atlantic: Reading the Contemporary (LA-AS)
Spring. 4 credits. Next offered 2008-2009 D. Woubshet.]

## Special Topics

[ENGL 210(2100) Medieval Romance: Voyage to the Otherworld \# (LA-AS)
Spring. 4 credits. This course may be used as one of the three pre- 1800 courses required of English majors. Next offered 2009-2010. T. Hill.]

## ENGL 213(2130) Cultures of the Middle

 Ages \# (CA-AS)Spring. 4 credits. This course may be used as one of the three pre- 1800 courses required of English majors. A. Galloway. This course introduces a wide range of literature written before 1500 and the cultures it was written in, especially in the region that became known as England. No previous knowledge of this material is required. We will read, in translation and with other help, a sample of works originally in Latin, French, Old English, Middle English, and Italian, beginning with the arrival of Christianity to England and ending with the splitting of the English church from Rome in the 16 th century. Authors, works, and genres considered include Bede, Beowulf, Old English prose and poetry, saints' lives, women's writing, French and English romance, Piers Plowman, Chaucer, and late-medieval drama. Requirements include weekly informal writing and three formal, medium-sized papers, which may draw on your informal writing.
[ENGL 217(2170) History of the English Language (also LING 217[2170]) \# (HA-AS)
Fall. 4 credits. Next offered 2008-2009. W. Harbert.]

## [ENGL 263(2630) Studies in Film Analysis: Hitchcock (also FILM 265[2650]) (LA-AS)

Fall. 4 credits. Limited to 20 students. Next offered 2008-2009. L. Bogel.]

ENGL 264(2640) The Private I and the Public Eye: Exploring Latino/a Identlity in Poetry, Fiction, and NonFiction (CA-AS)
Fall. 4 credits. Next offered 2008-2009.
H. Viramontes.]
[ENGL 268(2680) Culture and Politics of the 1960s (also AM ST 268[2680]) (CA-AS)
Fall. 4 credits. Next offered 2008-2009. P. Sawyer.]

ENGL 292(2920) Introduction to Visual Studies (also COM LVISST 200[2000]) (LA-AS)
Spring. 4 credits. Staff.
For description, see VISST 200.
ENGL 296(2960) Linguistic Theory and Poetic Structure (also ENGL 585[5850], LING 285/585[2285/5585]) (LA-AS)
Fall. 4 credits. J. Bowers.
For description, see LING 285.

## Courses for Sophomores, Juniors, and Seniors

Courses at the 300 level are open to sophomores, juniors, and seniors and to others with the permission of the instructor.
[ENGL 302(3020) Literature and Theory (also ENGL 602[6020], COM L 302/622[3020/6220]) (LA-AS)
Fall. 4 credits. Next offered 2008-2009. J. Culler.]

ENGL 308(3080) Icelandic Family Sagas \# © (LA-AS)
Fall. 4 credits. This course may be used as one of the three pre- 1800 courses
required of English majors. T. Hill.
An introduction to Old Norse-Icelandic mythology and the Icelandic family saga-the "native" heroic literary genre of Icelandic tradition. Texts will vary but will normally include the Prose Edda, the Poetic Edda, Hrafnkels Saga, Njals Saga, Laxdaela Saga, and Grettirs Saga. All readings will be in translation.

## ENGL 311(3110) Old English (also ENGL

 $611[6110])$ \# (LA-AS)Fall. 4 credits. This course may be used as one of the three pre- 1800 courses
required of English majors. S. Zacher. The course is intended as an introduction for graduate and undergraduate students to the Old English language. In this course, we will read and discuss some of the earliest surviving English poetry and prose. We will focus on (1) learning to read the language in which this literature is written; (2) evaluating the poetry as poetry: its form, structure, style, and varieties of meaning; (3) examining the culture of Anglo-Saxon England from the standpoint of Old English literary records. We will begin with simple prose texts and proceed to poetic texts such as The Wanderer, The Seafarer, The Dream of the Rood, and The Wife's Lament. There will be regular quizzes, translations, a mid-term, and a final exam.

## ENGL 312(3120) Beowulf (also ENGL

 $612[6120]$ ) \# (LA-AS)Spring. 4 credits. Recommended: one semester's study of Old English or equivalent. May be used as one of the three pre-1800 courses required of English majors. T. Hill.

A close reading of Beowulf. Attention is given to relevant archaeological, literary, cultural, and linguistic issues.
[ENGL 316(3160) Beasts, Bodies, and Boundaries " (LA-AS)
Spring. 4 credits. Next offered 2008-2009. S. Zacher.]

ENGL 319(3190) Chaucer \# (LA-AS) Fall. 4 credits. This course may be used as one of the three pre- 1800 courses required of English majors. A. Galloway. This lecture and discussion course introduces Chaucer in his literary and cultural settings. No previous knowledge of Chaucer or medieval literature is required. The main focus will be on his major works, Troilus and Criseyde and selections from The Canterbury Tales; we will also read outside a little to see his literary background and some of his literary (and non-literary) contemporariesand have a look at his literary influence and afterlife. There will be weekly informal writing and three formal, medium-sized papers, which may draw on your informal writing.

## ENGL 320(3200) Renaissance

 Literatures: "Blood Politics" (also COM L 356[3560]) " (LA-AS)Spring. 4 credits. P. Lorenz.
For description, see COM L 362

## ENGL 321(3210) Spenser and Malory *

 (LA-AS)Fall. 4 credits. This course may be used as one of the three pre- 1800 courses required of English majors. Informal lecture and discussion. C. Kaske. Paired selections covering about half of Malory's Morte d'Arthur and half of Spenser's Faerie Queene. The French Prose Arthurian Cycle, Chretien's romances, Sir Gawain and the Green Knight, and some of Spenser's minor poems are mentioned occasionally as background. Comparisons assess possible literary influence, the distinctive vision, style, and narrative technique of each author as a writer of romance, and the development of Arthurian romance from the Middle Ages to the Renaissance.

## ENGL 322(3220) Studies in Renaissance Literature: Literature and the Scientific Revolution in England * (LA-AS)

Spring. 4 credits. This course may be used as one of the three pre- 1800 courses
required of English majors. J. Mann.
Francis Bacon, the first philosopher of English science, vowed "to trust nothing but on the faith of my eyes." Bacon's declaration became a central tenet of philosophical inquiry during the 17 th century, as gentlemen and artisans began to collect specimens, dissect bodies, and survey the physical universe. This course will explore how the methods of the new experimental "science" reverberated in-and were challenged by-imaginative productions in the age of Shakespeare and Milton. We will also consider the representation of figures subject to the developing scientific gaze: curiosities such as the human cadaver, the hermaphrodite, and the New World Indian.

## ENGL 323(3230) Renaissance Poetry \#

 (LA-AS)Spring. 4 credits. This course may be used as one of the three pre- 1800 courses required of English majors. B. Correll. The Renaissance was a time of great innovation in poetry, and the influence of early modern poets continues to the present.

At the heart of this course are Shakespeare, Sidney, Spenser, Donne, and their sonnets and elegies. But Isabella Whitney, Anne Lok, Mary Sidney, and other women writers'
contributions to early modern poetry also belong to this course. We will read a range of poetic forms and discuss historical context and cultural politics. If Renaissance poetry is just not about hearts, flowers, and Cupid, what is at stake for poets and readers in reading early modern poetry? What cultural work does this poetry perform? What is the relationship between Renaissance lyric and early modern subject formation? Between seemingly private sentiments and historical forces?
[ENGL 327(3270) Shakespeare \# (LA-AS)
Fall. 4 credits. Next offered 2008-2009.]

## [ENGL 328(3280) The Bible as Literature

 \# (LA-AS)Fall. 4 credits. Next offered 2008-2009
L. Donaldson.]

## [ENGL 329(3290) Milton \# (LA-AS)

Fall. 4 credits. This course may be used as one of the three pre- 1800 courses required of English majors. Next offered 2008-2009. R. Kalas.]

## ENGL 330(3300) Restoration and 18thCentury Literature \# (LA-AS)

Spring. 4 credits. This course may be used as one of the three pre- 1800 courses required of English majors. F. Bogel. Close reading of texts in a variety of genres (poetry, fiction, drama, autobiography) will be guided by such topics as: the nature of satire, irony, and mock-forms; the languages of the ridiculous and the sublime; the politics of gender and sexuality; the authority and fallibility of human knowledge; connections among melancholy, madness, and imagination Works by such writers as Rochester, Behn, Finch, Dryden, Swift, Gay, Defoe, Johnson, Boswell, Sterne, and Cowper.

## [ENGL 333(3330) The 18th-Century English Novel \# (LA-AS)

Spring. 4 credits. This course may be used as one of the three pre- 1800 courses required of English majors. Next offered 2008-2009. F. Bogel.]
[ENGL 335(3350) Modern Western Drama, Modern Western Theater: Theory and Practice (also THETR 335/VISST 335[3350]) (LA-AS)
Fall. 4 credits. Next offered 2008-2009 N. Salvato.

ENGL 340(3400) Studies in Romantic Literature: Green Romanticism: Literature and Ecology \# (LA-AS)
Fall. 4 credits. A.-L. François.
What does Romanticism have to teach us about contemporary debates on species extinction, genetic engincering, food politics global warming, globalization, and the "death of the planet"? This course examines the relation between ecological politics and the literary movement known as Romanticism, a movement once defined as a turn toward "nature" in response to the urbanization and industrialization marking l3ritain's transition to modern capitalism in the early 19 th century Topics include: the gendering of "nature"; agriculture as a border-space between "culture" and "nature"; writing about place and the loss of place; weather-reporting and other practices of attention; fantasies about ecological disaster and science's ability to save
or destroy humankind. Writers include William Wordsworth, Dorothy Wordsworth, Mary Shelley, John Clare, Thoreau, Sarah Orne Jewett, Rachel Carson, and Michael Pollan.

## ENGL 344(3440) American Film

 Melodrama (also AM ST 338[3440], VISST 345[3645], FILM 344[3440]) (LA-AS)Spring. 4 credits. S. Haenni
For description, see FILM 344.
[ENGL 345(3450) Victorian Controversies \# (LA-AS)
Fall. 4 credits. Next offered 2008-2009 S. Siegel.]
[ENGL 348(3480) Studies in Women's Literature: The Feminist Literary Tradition (also FGSS 348[3480]) (LA-AS)
Spring. 4 credits. Next offered 2008-2009 K. McCullough.]

ENGL 349(3490) Shakespeare and Europe (also COM L 348[3480]) (LA-AS)
Fall. 4 credits. This course may be used as one of the three pre- 1800 courses required of English majors. W. Kennedy For description, see COM L 348.

## ENGL 350(3500) The Modern Tradition

 (LA-AS)Spring. 4 credits. D. Schwarz
Critical study of major works by Hardy, Conrad, Lawrence, Joyce, Woolf, Eliot, Yeats, Hopkins, Wilde, Wallace Stevens, and others While the emphasis will be on close reading of individual texts, we shall place the authors and works within the context of literary, political, cultural, and intellectual history. The course will seek to define the development of literary modernism (mostly but not exclusively in England), and relate literary modernism in England to that in Europe and America as well as to other intellectual developments. We shall be especially interested in the relationship between modern literature and modern painting and sculpture; on occasion, we shall look at slides. Within the course material, stuclents will be able to select the topics on which they write essays

ENGL 352(3520) Americans Abroad (also AM 5T 305[3050])
Spring. 4 credits. S. Haenni.
For description, see AM ST 305
[ENGL 353(3530) The Modern Indian Novel © (LA-AS)
4 credits. Next offered 2008-2009.]
[ENGL 354/3540) The British Modernist Novel (LA-AS)
Fall. 4 credits. Next offered 2008-2009 D. Mao.]
[ENGL 355(3550) Decadence (also FGSS 355[3550]) (LA-AS)
Fall. 4 credits. Next offered 2008-2009 E. Hanson.]

ENGL 360(3600) Another World Is Possible: The American Left Since the 1960s (also AM ST 359[3590]) (LA-AS)
Fall. 4 credits. P. Sawyer
Since the collapse of world communism and the rise of a conservative hegemony at home, the American left has changed profoundly since the turbulent decade of the 1960 s. Yet progressive writers and artists and intellectuals have continued to expose oppressive forms of power while envisaging genuine alternatives,
including new ways of affirming previously marginalized identities. Moving in time from the election of Ronald Reagan to second Iraq War, the course will cover the topics of race, gender, poverty, sexual identity, the media, glohalization, war, and the university. Works will include drama, fiction, paintings of Basquiat, films of Spike Lee, rap music, and the literature of ideas. Writing will include an option of working in the online archive on the History of Activism at Cornell.
[ENGL 361(3610) Studies in the Formation of U.S. Literature (also AM ST 361[3610]) " (LA-AS) Spring. 4 credits. D. Fried.
An introduction to literary culture in the U.S between the mid-1830s and the 1880 s. Focus will be on how to read a range of extraordinary, stylistically idiosyncratic writing and their bold scrutiny of the unexamined pieties of their day and ours. Some consideration of historical and cultural contexts: the reform movements of the 1840s, New England Transcendentalism, the rise of feminism, the politics of the Abolition movement, Southern slavery and Northern collaboration and resistance, the emergent culture of celebrity, religious revivals and the challenges to belief posed by advances in natural science, and the Civil War. Readings from Emerson. Thoreau, Margaret Fuller, Dickinson, Whitman, Frederick Douglass, Melville, and others.
[ENGL 362(3620) Studies in U.S. Literature after 1850: Reconstructing America (also AM ST 364[3640]) (LA-AS)
Fall. 4 credits. Next offered 2008-2009. N. Waligora-Davis.]

ENGL 363(3630) Studies in U.S. Literature: The Age of Realism and Naturalism (also AM ST/FGSS 363[3630]) (LA-AS)
Spring. 4 credits. K. McCullough Literary history tells us that various literary genres-regionalism, realism and naturalism, among others--jockeyed for place in American fiction at the turn of the 19th century. Cultural histories of the era tell us that social ideals about what constituted the "real" as well as the "American" were debated in this period, a period that witnessed such sweeping changes as, for instance, Jim Crow, Manifest Destiny, and women's movements. This course puts these two accounts-the literary and the historical-into conversation in order both to examine the varied styles and issues that comprised the American literature in the period and to query the larger question of the fiction's impact on society. Authors under consideration may include: Chesnutt Crane, James, Jewett, Ruiz de Burton, Sui, Twain, Wharton, Winnemuca, and Zitkala-Sa

## ENGL 364(3640) Studies in U.S.

## Literature After 1950: Native

 Daughters Speak (also AM ST 373[3730]) (LA-AS)Spring. 4 credits. L. Donaldson American Indian and First Nations women have made important contributions to North American literature and culture. This course will explore the distinct voices that Native women have expressed within fiction, poetry, storytelling, theater and song. We will examine the urgent concerns of Native women such as community, sovereignty, sexuality, family and the environment. We will read and listen to the writing and song making of both US and

Canadian Native women. Possible authors/ performers include Joy Hario, Walela and Ulali (music cds), Winona LaDuke, Eden Robinson, Jeanette Armstrong and Nora Marks Dauenhauer. The class will have a discussion format with occasional lectures by the instructor.

## [ENGL 365(3650) American Literature

 Since 1945 (also AM ST 365[3650]) (LA-AS)Fall. 4 credits. Next offered 2008-2009. B. Maxwell.]

## [ENGL 366|3660) Studies in U.S. Fiction

 Before 1900: The 19th-Century American Novel (also AM ST 366[3660]) \# (LA-AS)Spring. 4 credits. Next offered 2008-2009.]
ENGL 367(3670) Studies in U.S. Fiction After 1900: Major Writers and Movements (also AM ST 367[3670]) (LA-AS)
Fall. 4 credits. M. P. Brady.
This course will survey some of the significant themes and movements preoccupying 20thcentury fiction as well as some of the major U.S. writers such as Henry James, Zora Neale Hurston, Thomas Pynchon, and Willa Cather.

## [ENGL 368(3680) Faulkner (LA-AS)

4 credits. Next offered 2008-2009.]
ENGL 369(3690) Fast-Talking Dames and Sad Ladies: 1940s and Now (also FILM 369[3690], FGSS 369[3690]) (LA-AS)
Fall. 4 credits. Limited to 15 students Students must be able to attend Mon. and or Tues. late-afternoon screenings. Film fee: $\$ 20$. L. Bogel
Focusing on sassy or subdued heroines of Hollywood's 1940s films and current films, this seminar works to define romantic comedy and melodrama as genres; as vehicles for female stars; as ways of viewing the world.
Psychoanalytic and feminist analyses of these films will help us pose questions about gender and culture, about gendered spectatorship, about Hollywood's changing constructions of "woman," the "maternal," and the "feminine," and about representations of desire, pleasure, fantasy, and ideology. Required twice-weekly screenings of such films as Gilda, The Lady Eve, Notorious, The Women, The Philadelpbia Story, His Girl firiday, Mrs. Dalloway, The Hours, First Wives Cluh, All About My Mother, Silence of the Lambs, and Far from Heaven.

## [ENGL 370(3700) The 19th-Century Novel \# (LA-AS)

Spring. 4 credits. Next offered 2008-2009. J. Adams. 1

## ENGL 371(3710) The Literature of the

 Outlaw (also COM L 373[3730]) © \# (LA-AS)Fall. 4 credits. B. Maxwell.
For description, see COM L 373.

## ENGL 372(3720) Medieval and Renaissance Drama (also THETR 372[3720) \# (LA-AS)

Spring. 4 credits. This course may be used as one of the three courses pre-1800 required of English majors. M. Raskolnikov.
The first part of this course asks: what does it mean to invent theatre (again)? If, as some critics believe, the Middle Ages had forgotten ancient dramatic traditions (how do you forget Sophocles?), medieval drama was a new
invention. This drama poses an interpretive challenge: it lacks authors. Most of the "mystery plays" discussed were staged at annual festivals over decades, accumulating a collective authorship. In the Renaissance, theatre became one of the most polished and complex forms of English literary art (and one of the sleaziest). We will read some comedies and some extraordinarily bloody tragedies by Shakespeare, Marlowe, Jonson, Wehster, Dekker, and Beaumont. This class considers drama's origins and changing cultural meanings, interrogating the popular culture of another time, and thereby, our own.

## ENGL 373(3730) Weird Science, Hard

 Poems (LA-AS)Spring. 4 credits. L. Van-Clief Stefanon. Science and poetry seem to some strange bedfellows. Are they and should they be? In the introduction to an anthology of poems written about science and math, Kurt Brown writes, "If science and art have anything in common it exists in the resources of the human brain and our ability to create something unforeseen and revolutionary out of our dreaming." What are the implications, philosophical, cultural, and otherwise in tearing down the walls between science and poetry? Is there revolutionary potential in a marriage between them? For whom? What are the historical arguments for and against such separation? Where can cross-pollination between science or math and creative arts lead us?

## ENGL 374(3740) Slavery in 20th-Century Film and Fiction (also AM ST 374[3681]) (LA-AS)

Spring. 4 credits. N. Waligora-Davis. This course explores 20th-century preoccupations and reconstructions of slavery, examining the ways slavery continues to define and impact sexuality, racial identities and their popular representations, our sense of public and private spaces, legal discourse, and our national identity. What does it mean to be a black or white man or woman in America? Who does law, history, and society concede as legitimate witness? How should we craft our histories? Who is a subject of, and who is subjected to law? How are privacy interests diffused against social interests? Our readings will place in close proximity not only historical writings on slavery (slave history and slave narratives) and these 20th-century revisionist slave stories, but slave law and contemporary immigration, property, reproduction, criminal, and privacy legislation

## ENGL 375(3750) Studies in Drama and Theatre: 20th-Century Drama: Theatres of Selfhood (also THETR 375[3750]) (LA-AS)

Spring. 4 credits. P. Lorenz.
There is a long tradition of "discovering" what it means to be a human being in theater. From the tragedies of Sophocles and Shakespeare that were so important to Freud, through Schiller's understanding of "the stage as a moral institution," to the alienation effect discovered and deployed there by Brecht, theater has long been a test-site of theory. In this course we will follow this tradition, asking, in particular, how the modern stage has responded to the historical, political, philosophical and aesthetic challenges of the 20th century. We will read plays and other texts by Chekhov, Pirandello, Lorca, Brecht, Artaud, Pinter, Soyinka, Müller, and Parks.

ENGL 376(3760) Special Topics in Drama and Performance (also THETR 313[3130])
Fall. 4 credits. S. Warner
For description, see THETR 313
ENGL 379(3790) Reading Nabokov (also RUSSL 385[3385]) (LA.AS)
Fall. 4 credits. G. Shapiro.
For description, see RUSSL 385.
ENGL 380(3800) Time Sensitive: Poets of the Last Ten Minutes (LA-AS)
Fall. 4 credits. A. Fulton.
We'll read an eclectic assortment of books by contemporary poets with an eye toward matters of content and form. Depending on the poet, we might note inclusions of an autobiographical, historical, or linguistic past; the presence of heirloom, souvenir, or frontier emotions--such as nostalgia, regret, or hope; depictions of timelessness (immortality, the Now) and mortality; and time-dependent cognitive sensations, such as déja vu, premonition, or amnesia. We'll also consider the poems' relation to tradition and genre; its meter or rhythm; metaphors and tropes; rhetoric and tone; surface and texture; erasures and ellipses. The "ten minutes" of the subtitle alludes to geologic time; in mortal terms, the poets will be of the last ten years. Students will write brief essays on the assigned books.

## ENGL 381(3810) Reading as Writing (LA-

 AS)See complete course description in section headed "Expository Writing."

ENGL 382-383(3820-3830) Narrative Writing (LA-AS)
See complete course description in section headed "Creative Writing."

## ENGL 384-385(3840-3850) Verse Writing (LA-AS)

See complete course description in section headed "Creative Writing."

## ENGL 386(3860) Philosophic Fictions

 (LA-AS)See complete course description in section headed "Expository Writing."

ENGL 387(3870) Autoblography: Theory and Practice (LA-AS)
See complete course description in section headed "Expository Writing."

## ENGL 38B(3880) The Art of the Essay

 (LA-AS)See complete course description in section headed "Expository Writing."
ENGL 390(3090) Autobiography: The Politics of History, Memory, and Identity (LA-AS)
Spring. 4 credits. J. Carlacio.
Autobiographical writing reveals a person's life not only to him- or herself but also to his or her readers. Constructed from memory and experience, life narratives complicate the seemingly transparent relationship between memory, bistory, and the " $I$ " who recounts it. The course will investigate this relationship and seek to understand how experience and memory shape each other and how these in turn shape the texts that "story" our lives. We will read both books and essays that exemplify key historical moments from the 19th through the 21st centuries from writers such as Reinaldo Arenas, James Baldwin, Harriet Jacobs, Rigoberta Menchú, Binjamin Wilkomirsky, and others. Students will write
several short responses and two longer papers.
[ENGL 397(3970) Policing and Prisons in American Culture (also AM ST 395[3970]) (CA-ASj
Spring. 4 credits. Next offered 2008-2009. B. Maxwell.]
[ENGL 398(3980) Latino/a Popular Culture (also AM ST 396[3981], LSP 398[3980]) (CA-AS)
Spring. 4 credits. U.S. Latino/a history is strongly recommended as a prerequisite, but not required. Next offered 2008-2009. M. P. Brady.]

## Courses for Advanced Undergraduates

Courses at the 400 level are open to juniors and seniors and to others by permission of instructor unless other prerequisites are noted.
[ENGL 402(4020) Literature as Moral Inquiry (KCM-AS)
Spring. 4 credits. Next offered 2008-2009. S. Mohanty.]
[ENGL 403(4030) Advanced Seminar In Poetry: Studies in American Poetry, 1955-1980 (also AM ST 403[4030]) (LA-AS)
Fall. 4 credits. Next offered 2008-2009. R. Gilbert.]
[ENGL 404|4040) Paleography, Bibliography, and Reception History (also ENGL 604[6040]) \# (LA-AS)
Spring. 4 credits. Next offered 2008-2009. A. Galloway.]
[ENGL 405(4050) The Politics of Contemporary Criticism (LA-AS)
Fall. 4 credits. Next offered 2008-2009 S. Mohanty.]

ENGL 407-408(4070-4080) Sociaty for the Humanities
407, Fall; 408, Spring. 4 credits.
407 (fall)
Sec. 1: Poetry and Totality
C. Nealon.

For description, see S HUM 416.
Sec. 2: Imagining Contemporary Asia
W-L. Wee.
For description, see S HUM 419.
Sec. 3: On the Inner Voice
D. Riley.

For description, see S HUM 418.
408 (spring)
Sec. 1: Futures of American Poetry
M. Cavitch.

For description, see S HUM 423.
Sec. 2: Cerebral Seductions
W. Jones.

For description, see S HUM 425.
Sec. 3: Modernity and Critique
B. Maxwell.

For description, see S HUM 426.
Sec. 4: Sensing Thinking
C. Kronengold.

For description, see S HUM 428.
Sec. 5: Epistemologies of U.S. Empire M. Wesling.

For description, see S HUM 430.

ENGL 412(4120) A Usable Past: History and Story in the Norse Sagas (also HIST 476/676) (HA-AS)
Spring. 4 credits. T. Hill and O. Falk.
For description, see HIST 476.
[ENGL 413(4130) Middle English (also ENGL 613[6130]) \# (LA-AS)
Fall. 4 credits. This course may be used as one of the three pre-1800 courses required of English majors. Next offered 2008-2009. T. Hill.]
[ENGL 414(4140) Bodies of the Middle Ages: Embodiment, Incarnation, Performance (also FGSS 414[4140]) * (LA-AS)

Spring. 4 credits. This course may be used as one of the three pre-1800 courses required of English majors. Next offered 2008-2009. M. Raskolnikov.]
[ENGL 419(4190) The Old English Laws and Their Politico-Cultural Context (also ENGL 609[6090], HIST 469/669[4691/6691]) \# (CA-AS)
Fall. 4 credits. Next offered 2009-2010. P. Hyams and T. Hill.]

ENGL 420|4200) Renaissance Humanism (also ENGL 624[6240], COM L 452/652[4520/6520]) \# (LA-AS)
Spring. 4 credits. W. Kennedy.
For description, see COM L 452.
[ENGL 421(4210) Advanced Seminar in the Renaissance: Literature, Science, and Renaissance Curiosities \# (LA-AS)
Fall. 4 credits. This course may be used as one of the three pre- 1800 courses required of English majors. Next offered 2008-2009. J. Mann.]
[ENGL 422(4220) Renaissance "Traffick" \# (LA.AS)
Spring. 4 credits. This course may be used as one of the three pre- 1800 courses required of English majors. Next offered 2008-2009. R. Kalas.]

## [ENGL 423(4230) Renaissance Lyric \#

 (LA-AS)Spring. 4 credits. This course may be used as one of the three pre- 1800 courses required of English majors. Next offered 2008-2009. B. Correll.]

ENGL 426(4260) The Animal (also COM L 424[4240], GERST 426[4260]) (LA-AS)
Spring. 4 credits. P. Gilgen.
For description, see GERST 426.
ENGL 427(4270) Advanced Seminar in Shakespeare: The Greek and Roman Plays " (LA-AS)
Spring. 4 credits. B. Correll.
Some of Shakespeare's most important dramas are about ancient figures and events: Julius Caesar, Antony and Cleopatra, Troilus and Cressida, Coriolanus, Timon of Athens, Cymbeline, and others. But while Shakespeare transports a classical cultural heritage to his early modern audience, he also actively and critically adapts it in thought-provoking and innovative ways. These plays come with big questions. Why are so many of Shakespeare's characters representatives of classical authority and in conflict with it? How do Shakespeare's adaptive practices compare to playwrights such as Christopher Marlowe (Dido) or Ben Jonson (Sejanus)? What do Shakespeare's Greek and Roman plays tell us about the contexts in which they are written and performed? We will include some film in the course.
[ENGL 428(4280) Problem Poems: Close Reading and Critical Debate \# (LAAS)
Spring. 4 credits. This course may be used as one of the three pre- 1800 courses required of English majors. Next offered 2008-2009. F. Bogel.]
[ENGL 429(4290) Adam's Rib and Other Divine Signs (also RELST 429[4290] \# (LA-AS)
Spring. 4 credits. Next offered 2009-2010. L. Donaldson.)

ENGL 430(4300) Toplcs in American Studies (also AM ST 430[4303]l)
Spring. 4 credits. S. Samuels.
The Rabinor Seminar. For description, see AM ST 430.
[ENGL 440(4440) Romantic Drama (also ENGL 644[6440], THETR 440/644[4400/6440]) (LA-AS)
Fall. 4 credits. Next offered 2008-2009. R. Parker.]

ENGL 444(4441) Toxt Analysis for Production: How to Get from the Text onto the Stage lalso THETR 445[4450])
Fall. 4 credits. B. Levitt.
For description, see THETR 445 .
[ENGL 446(4660) Comedy and Satire: The 19th Century \# (LA-AS)
Spring. 4 credits. Next offered 2009-2010. P. Sawyer.]

## ENGL 452(4520) Wilde and Woolf (LA-AS)

Fall. 4 credits. S. Siegel.
This seminar considers the question of style: what does the word mean; why has it claimed attention; how has it behaved in the work of two authors whose writings among their contemporaries marked distinctive departures? We explore Oscar Wilde and Virginia Woolf as readers of literary and social texts. Along the way, we direct our attention to the implicit expectations brought to the understanding of "Victorians" and "Modernists." Selections are drawn from the full range of Wilde's and Woolf's work. Our principal texts, however, are limited to a few essays by each author.

## ENGL 453(4530) 20th-Century Women Writers of Color (also AAS 453[4530]]

 (LA-AS)Spring. 4 credits. S. Wong
In this course, we'll be reading literatureprimarily novels-produced by hemispheric American women writers of the mid- to late 20th century. We will look at how these writings articulate concerns with language, home, mobility, and memory, and at how the work is informed by the specificities of gender, race, region and class. Readings may include work by Leslie Marmon Silko, Sandra Cisneros, Theresa Hak Kyung Cha, Jamaica Kincaid, Gwendolyn Brooks, Ann Petry, Fae Myenne Ng, Carolivia Herron, Helena Maria Viramontes, and Shani Mootoo. Course requirements will include class presentations, short responses to the readings, and a longer research essay.
ENGL 456(4560) Constructing the Book, Reconstructing the Text (also ENGL 650[6500]) \# (LA-AS)
Fall. 4 credits. This course may be used as one of the three pre- 1800 courses required of English majors. C. Ruff.
The fortunes of texts depend on the physical media that carry them. This course will trace two twisted strands of biblionostalgia: the
search for the fugitive text, and longing for lost arts of book production. Beginning with a hands-on introduction to how books were made in the early centuries of printing, we'll consider to what extent printing was or was not capable of fixing texts in easilyreproducible form. We'll then look at the motivations and methodologies of those who have sought to stabilize protean texts and reconstruct lost ones. Our focus will be on the period from the 15 th to the 19 th centuries, but we'll be glancing backwards at the scribal culture of the Middle Ages and forwards at the world of the electronic text.

## ENGL 458(4580) Imagining the Holocaust (also COM L 483[4830], GERST 457[4570]) (LA-AS) <br> Spring. 4 credits. D. Schwarz.

 What is the role of the literary imagination in keeping the memory of the Holocaust alive for our culture? We shall examine major and widely read Holocaust narratives that have shaped the way we understand and respond to the Holocaust. We shall begin with first person reminiscences-Wiesel's Night, Levi's Survival at Auschwitz, and The Diary of Anne Frank-before turning to realistic fictions such as Kineally's Scbindler's List (and Spielberg's film), Kertesz's Fateless, Kosinski's The Painted Bird, and Ozick's "The Shawl." We shall also read the mythopoeic vision of Schwarz-Bart's The Last of the fust, the illuminating distortions of Epstein's King of the Jews, the Kafkaesque parable of Appelfeld's Badenheim 1939, and the fantastic cartoons of Spiegelman's Maus books.
## [ENGL 460(4601) Riddles of Rhythm

 (LA-AS)Spring. 4 credits. Next offered 2008-2009. D. Fried.]
[ENGL 462(4620) Senior Seminar in Latina/o Studles: Chicana Feminisms in a Globalizing World (LA-AS)
Spring. 4 credits. Next offered 2008-2009. M. Brady.]

## [ENGL 465(4650) American Violence

 (LA-AS)Fall. 4 credits. Next offered 2008-2009 S. Samuels.]

ENGL 467(4670) Black Manhattan: 19191940 (also AM ST 467[4670]) (LA-AS) Fall. 4 credits. N. Waligora-Davis.
This course examines the key figures, political movements, literary, cinematic, and musical traditions that are remembered as the Harlem Renaissance. Reading Locke, Hughes, Larsen, Hurston, Toomer, Johnson, and Garvey alongside black cinematic and musical (jazz and blues) productions, we take up the political and social implications of the "new Negro" and a distinctly African American modernist aesthetic. We trace the effects of WWI and segregation on black cultural expression. This course studies the relationship among these artistic productions and emerging black nationalisms, black revolutionary tendencies, and radical black political philosophies. We will also critique figurations of "Harlem," a place imagined as a site of black possibility at the very moment it was being transformed into a "ghetto."

## ENGL 469(4690) The Paranoid Style in

 Contemporary American Fiction and Film (LA-AS)Spring, 4 credits. K. Attell.

This course examines the paranoid style in contemporary American fiction and film. The paranoias and plots we will encounter vary considerably (personal paranoias, political conspiracies, governments turned enemy, surveillance technology run amok, apocalyptic-millennial paranoia), and yet when viewed together they seem to cohere as a distinct style within post-WWII American narrative. Throughout the course, we will be asking how the paranoid style responds to the contemporary American context and how the paranoid content of these narratives shapes their aesthetic form. What is the paranoid afraid of, and does he or she have a point? Why is it that paranoia has arisen as such a distinctively American attitude? Novels by Nabokov, Pynchon, Reed, Dick, DeLillo, Didion, Roth; films by Coppola, Romero, Bigelow, Baldwin.

## [ENGL 470(4700) Senior Seminar in the Novel: Austen and the Psychological Novel (LA-AS) <br> Spring. 4 credits. Next offered 2008-2009.

 A.-L. François.][ENGL $472(4720)$ Islands of Clobalization (also ENGL 672[6720]) (LA-AS)
Spring. 4 credits. Next offered 2008-2009.
E. DeLoughrey.]

ENGL 473(4730) Parody (also ENGL 673[6730], THETR 420/620[4200/6200] (LA-AS)
Spring. 4 credits. N. Salvato.
For description, see THETR 420.
[ENGL 474(4740) Senior Seminar on Major Authors: Hemingway, Fitzgerald, and Faulkner (LA-AS)
Spring. 4 credits. Next offered 2008-2009.]
[ENGL 475(4750) Senior Seminar in the 20th Century: Narratives of LossAIDS
Fall. 4 credits. Next offered 2009-2010. D. Woubshet.]

## [ENGL 476(4760) Global Women's Literature (LA-AS)

Spring. 4 credits. Next offered 2008-2009. E. DeLoughrey.]

## ENGL 477(4600) Melville (also AM ST

 477[4601]) \# (LA-AS)Fall. 4 credits. Next offered 2008-2009. B. Maxwell.]
[ENGL 478(4780) Intersections in Lesbian Fiction (also AM ST 468[4780], FGSS $477[4770]$ ) (LA-AS) Spring. 4 credits. Next offered 2009-2010. K. McCullough.)

ENGL 479(4790) Advanced Seminar in American Literature: Reading Walden (LA-AS)
Spring. 4 credits. D. Fried.
An intensive study of Thoreau's Walden. Focus will be on how to read this extravagantly strange, luminously perceptive, and searchingly critical account of an experiment in standing just beyond the usual course of life in mid-19th-century New England. We will also read other writings by Thoreau, including his poetry, essays, translations, and selections from his journals. Some attention to the history of nature writing, the writing of Thoreau's contemporaries, and American landscape painting. Assignments will include writing imitations and parodies of Thoreau, journal-keeping, two papers, and a take-home final exam.

ENGL 480-481(4800-4810) Seminar in Writing (LA-AS)
480; fall; 481, spring. 4 credits.
For description, see section "Creative Writing."
ENGL 482(4820) Hamiet, The Seminar (also THETR 447[4470]) \# (LA-AS)
Fall. 4 credits. B. Levitt.
For description, see THETR 447.
[ENGL 483(4601) Seminar Ín Comparative 20th-Century Anglophone Drama (also THETR 483[4830]) (LA-AS)
Fall. 4 credits. Some knowledge of classical and avantgarde theories of drama and theatre would be useful, but is not a prerequisite for this course. Next offered 2008-2009.]
[ENGL 486(4860) American Indian Women's Literature (also AIS 486[4860]) (LA-AS)
Spring. 4 credits. Next offered 2009-2010. L. Donaldson.]

ENGL 490(4900) Literature of the Fin de Slècle (LA-AS)
Spring. 4 credits. K. Biers.
This course will explore the British and American literature of the late 19th and early 20th centuries in the context of cultural history, philosophy, and aesthetics. We will emphasize the diverse cross-currents and antagonisms of the era, including "art for art's sake" vs. social realism; racial passing; the cults of the European dandy and the American engineer; dystopian vs. utopian fiction; pessimism vs. pragmatism; the vampire vs. the feminist or "new woman." What fears and fantasies haunted the fin de siecle literary imagination? How were they connected to the social, political, and philosophical debates that characterized the period? Authors may include Willa Cather, W.E.B. du Bois, Thomas Alva Edison, Charlotte Perkins Gilman, William James, Pauline Hopkins, Friedrich Nietzsche, Christina Rossetti, Bram Stoker, and Oscar Wilde.

## ENGL 491(4910) Honora Seminar I

Fall. 4 credits. Open to students in the
Honors Program in English or related fields, or by permission of instructor.
Sec. 1: James Baldwin and Toni Morrison
D. Woubshet.

James Baldwin and Toni Morrison are two of the most discerning interpreters of the English language and among the shrewdest interlocutors of American life. This course will examine their writings (essays, novels, plays, poems, libretti) against a variegated historical backdrop. We will take an in-depth look at their oeuvre, paying careful attention to style and form, and how their work pries open America's literary, cultural and political imagination. Among the themes for consideration are: familial and broader kinship ties; the politics of (racial, gender, sexual and class) difference; individual and collective death; and love. Readings will include: The Price of the Ticket; The Amen Corner; Another Country; Just Above My Head; Song of Solomon; Beloved; Playing in the Dark; and Honey and Rue.
Sec. 2: Literature and National IdentityImagining England in the Age of

## Shakespeare

J. Mann.

This course may be used as one of the three pre-1800 courses required of English majors.

This course explores the relationship between literature and national identity in the English Renaissance. How do early modern writers imagine what Shakespeare called "this blessed plot, this earth, this realm, this England"? How does the process of national self-fashioning respond to a period of unprecedented overseas exploration and imperial adventure? Throughout the course we will attend to the ways in which writers attempt to shape an English literary tradition while also studying critical texts that query the very concept of a "national" literature. Beginning with Thomas More, and reading works by Sidney, Spenser, Bacon, Hebbert, and Jonson, we will conclude with an act of poetic resistance to the project of national self-fashioning, when John Milton writes a religious epic instead of a nationalist romance.

ENQL 492(4920) Honors Seminar II
Spring. 4 credits. Open to students in the Honors Program in English or related
fields, or by permission of instructor.
Sec. 1: Authentic Romantics
C. Chase.

Looking for an author's authentic voice when we read dates back to the Romantics. In this seminar we shall examine how the idea of authenticity appears in works by William Wordsworth, Percy Bysshe Shelley, and a "preRomantic," Jean-Jacques Rousseau. Rousseau's Confessions subordinate the concept of truth versus falsehood to the concept of truth as authenticity. Wordsworth's autobiography, too, The Prelude, aims at authentically representing a self. Wordsworth's and Shelley's poetry also pursues other conceptions of an authentic language. The questions their works raise, one might say, make these writers authentic Romantics. Three papers, developing skills necessary for writing an Honors thesis.
Sec. 2: Roots of Tolkien
S. Zacher.

This seminar will mainly explore medieval texts that influenced Tolkien's fiction. Though the focus will not be on Tolkien's fiction per se, a few of his shorter works will be considered. Since Tolkien was a renowned philologist, we'll read selections from his critical essays, in addition to several medieval texts he edited and translated. Other readings will derive from Old English, Norse, and Celtic (in translation), spanning the genres of heroic literature, sagas, elegies, charms, runes, and Germanic mythology. Texts will include: Beourulf, The Prose Edda, the Saga of Hrolf Kraki, and mythologies of "the ring," such as The Saga of the Volsungs, the Nibelungenlied, the Mabinogion, and Wagner's Ring-cycle.
Required work will include in-class presentations and research papers.
Prerequisite: The Lord of the Rings.
ENGL 493(4930) Honors Essay Tutorial I Fall or spring. 4 credits. Prerequisites: senior standing and permission of director of the Honors Program.

ENGL 494(4940) Honors Eseay Tutorial II Fall or spring. 4 credits. Prerequisites: ENGL 493 and permission of director of the Honors Program.

ENOL 495(4950) Independent Study Fall or spring. 2-4 credits. Prerequisites: permission of departmental advisor and director of undergraduate studies.

## Courses Primarily for Graduate Students

Permission of the instructor is a prerequisite for admission to courses numbered in the 600 s . These are intended primarily for graduate students, although qualified undergraduates are sometimes admitted. Undergraduates seeking admission to a 600level course should consult the instructor. The list of courses given below is illustrative only; a definitive list, together with course
descriptions and class meeting times, is published in a separate department brochure before course enrollment each semester.

## Graduate Courses In English 2007-2008

Fall
ENGL 585(5850) Linguistic Theory and Poetic Structure (also LING 585[5585])
J. Bowers.

ENGL 600(6000) Colioquium for Entering Students
J. Adams.

ENGL 611(6110) Old English (also ENGL 311[3110])
S. Zacher.

ENGL 617(6170) Linguistic Structure of Old English (also LING 649[6649]) W. Harbert.

ENGL 619(6190) Chaucer and Cower A. Galloway.

ENQL 625(6250) Love, Loss, and Lament In the Renaissance (also FGSS 628[6280])
B. Correll.

ENGL 633(6330) Satire, Sensibility, Imitation, and Mechanism In 18thCentury Literature F. Bogel.

ENGL 639(6390) Studies in Romantic Literature: Writers of the Revolution R. Parker.

ENGL 646(6460) The Uses of Inherltance J. Adams.

ENGL 647(6470) Jefferson's Amerlca: From the Underside
L. Donaldson.

ENGL 650(6500) Constructing the Book, Reconstructing the Text (also ENGL 456[4560])
C. Ruff.

ENGL 651(6510) Camp, Kitsch, and Trash (also THETR 605[6050])
N. Salvato.

ENGL 652(6520) Passionate Politics: Affect, Protest Periormance (also THETR 606[6060]) S. Wamer.

ENGL 653(6530) The Modern British Novel: Conrad, Joyce, Lawrence, Woolf, and Forster
D. Schwarz.

ENGL 681(6810) Trauma, Time, and History (also COM L 615[6150])
C. Caruth.

ENCL 699(6990) Studies in African American Literature: The Question of Rights: African American Literature, 1940-1980
N. Waligora-Davis

ENGL 780.01(7800) MFA Seminar: Fietion S. Vaughn.

ENGL 780.02(7800) MFA Seminar: Poetry L. Van-Clief Stefanon.

ENGL 785(7850) Reading for Writers: Contemporary Poetry and Poetics A. Fulton.

## Spring

ENGL 612(6120) Beowulf (also ENOL 412(4120]) T. Hill.

ENGL 624(6240) Renaissance Mumanism (also ENGL 420[4200], COM L 452/6524520/6520]) W. Kennedy.

ENGL 626(6260) Forms of Life in the 16th and 17th Centurles P. Lorenz.

ENGL 629(6290) Deloure and Lyotard: Aesthetics and Technology (also COM L 634[6340]) T. Murray.

ENGL 640(6400) Keats and HIs Successors A.-L. François.

ENGL 655(6550) Modernist Fiction and the Erotics of Style E. Hanson.

ENGL 665(6650) Race, Gender, and Crossing Water: Narratives of Mobility and Escape in the 19thCentury United States S. Samuels.

ENCL $671(6710)$ Law and Literature E. Cheyfitz.

ENGL 702(7020) Decolonization and Culture: Key Issues In Contemporary Theory S. Mohanty.

ENGL 71017100) Advanced Old English S. Zacher.

ENGL 781.01(7810) MFA Seminar: Poetry K. McClane.

ENGL 781.02(7810) MFA Seminar: Fiction E. Quinonez.

ENGL 785(7850) Reading for Writers J. Lennon.

ENGLISH FOR ACADEMIC PURPOSES
D. Campbell, director; S. Schaffzin, I. Arnesen, K. (Priscilla) Kershaw

Note: Courses and credits do not count toward the A.B. degree.

ENOLF 205(1005) English as a Second Language
Fall. 4 credits. Prerequisite: placement by exam. S. Schaffzin.
All-skills course emphasizing listening and speaking, with some writing practice. Students also meet individually with the instructor.

## ENGLF 206(1006) English as a Second

 LanguageSpring. 3 credits. Prerequisite: ENGLF 205 or placement by exam. S. Schaffzin. Writing course for those who have completed ENGLF 205 and need further practice, or for those who place into the course. Individual conferences are also included.

## ENGLF 209(1009) English as a Second Language

Fall or spring. 1 credit. Prerequisite:
permission of instructor. S. Schaffzin. Practice in classroom speaking and in informal conversational English techniques for gaining information. Students also practice giving informal presentations. Individual conferences with the instructor supplement class work.

## ENGLF 210(1010) English as a Second

 LanguageSpring. 1 credit. Prerequisite: permission of instructor. S. Schaffzin.
Practice in academic speaking. Formal classroom discussion techniques and presentation of information to a group. Presentations are videotaped and reviewed with the instructor. Individual conferences supplement class work.

## ENOLF 211(1011) English as a Second

 LanguageFall, spring, or summer. 3 credits.
Prerequisite: placement by exam. D. Campbell.

Academic writing with emphasis on improving organization, grammar, vocabulary, and style through the writing and revision of short papers relevant to students' fields. Frequent individual conferences supplement class work.

## ENGLF 212(1012) English as a Second Language

Spring. 3 credits. Limited to 12 students on first-come, first-served basis. Prerequisite: permission of instructor. D. Campbell. Research paper writing. For the major writing assignment of this course, students must have a real project that is required for their graduate work. This can be a thesis proposal; a pre-thesis; part of a thesis, such as the literature review or discussion section; a paper for another course or a series of shorter papers (by permission of the other instructor); or a paper for publication. Time limitations make it difficult to deal with work over 20 pages in length. Course work involves practice in paraphrase, summary, the production of cohesive, coherent prose, vocabulary use, and grammatical structure. Frequent individual conferences are a necessary part of the course. Separate sections for social sciences/ humanities and for science/technology.

## ENGLF 213(1013) Writton English for

 Non-Native SpeakersSpring. 3 credits. Prerequisite: permission of instructor. S. Schaffzin.

Designed for those whose writing fluency is sufficient for them to carry on regular academic work but who want to refine and develop their ability to express themselves clearly and effectively. Individual conferences supplement class work

## First-Year Writing Seminar

ENGLB 115-116(1050-1060) English for Later Bllinguals
For description, see First-Year Writing Program brochure.

FALCON PROGRAM (INDONESIAN) See "Department of Asian Studies."

## FEMINIST, GENDER \& SEXUALITY STUDIES

Core faculty: A. Basu, S. Bem, L. Beneria, L. Bogel, D. Castillo, S. Correll, E. DeLoughrey, I. DeVault, S. Feldman, M. Fernandez, J. Fortune, J. E. Gainor, D. Ghosh, E. Hanson, M. Hite, C. Howie, M. Katzenstein, P. Liu, K. Long, K. March, C. A. Martin, S. Martin, K. McCullough, M. B. Norton, J. Peraino, M. Raskolnikov, D. Reese, S. Samuels, D. Schrader, S. Seth, A. Villarejo, S. Warner, R. Weil, D. Woubshet

Cross-listing faculty: E. Baptist, J. Bernstock, F. Blau, D. Chang, K. Cohen, B. Correll, M. Evangelista, K. Graubart, S. Haenni, K. Haines-Eitzen, P. Hyams, P. Janowitz, C. Lazzaro, T. Loos, M. Migiel, A. Parrot, Q. Roberson, M. Rossiter, N. Russell, N. Salvato, S. Sangren, R. Savin-Williams, N. Sethi, A. M. Smith, P. Tolbert, M. C. Vallois, M. Warner, M. Washington, L. Williams, S. Wong

## Introduction to the Program

The Feminist, Gender \& Sexuality Studies Program (FGSS) is an interdisciplinary program in the College of Arts and Sciences that seeks to deepen our understanding of gender and sexuality. Since its founding in 1972 as Women's Studies, the Program has integrated the study of gender with complex structures of power and inequality including race, sexuality, class, and nation. Over the past several decades, the curriculum has also increasingly broadened its scope theoretically and methodologically to encompass cultural, historical, literary, scientific, and quantitative analysis. Students find that these innovative methods and theories enhance their lifelong personal and intellectual growth, as well as their professional development insofar as they prepare students for future study or work in a wide variety of fields: law, medicine, social policy, art, psychology, literature, and so on.
The Program is built around several assumptions about the study of gender and sexuality. First, understandings of sex, sexuality, and gender are neither universal nor immutable; to study them is to gain a fuller understanding of human behavior, culture and society across times and places as well as to gain a sense of how these social constructions shape us as individuals. Second, gender and sexuality are best understood when examined in relation to one another by learning about women and men of different economic
classes, sexual orientations, and cultural and racial backgrounds. Third, even the most current knowledge derived from the humanities, social sciences and natural sciences is not as impartial, objective, or neutral but instead emerges out of particular historical and political contexts. Students, as a consequence, transfer the critical and analytical skills they acquire in FGSS courses to other courses and activities beyond Cornell.

## Program Offerings

Feminist, Gender \& Sexuality Studies offers an undergraduate major, an undergraduate concentration, and a graduate minor. Undergraduate students in the College of Arts and Sciences who wish to major in FGSS may apply directly to the program. Undergraduate students in other colleges at Cornell will need to work out special arrangements and should speak to FGSS's director of undergraduate studies (DUS).

## The Undergraduate Major: FGSS

1. Prerequisite courses: Before applying to the major, the student must complete any two FGSS courses with a grade of B- or better. For FGSS courses that are crosslisted with another department, students may register through FGSS or the crosslisting department. Suggested entry-level courses include any FGSS course at the 200 level, especially 201 and 202 , both of which are required for completion of the major. FGSS courses at the 200 level or above may count as both prerequisites and as part of the FGSS major. First-year writing seminars may count as prerequisites but not as part of the major.

## 2. Required course work:

a. A minimum of 36 credits in FGSS courses with a grade of C- or higher is required for the major. For FGSS courses that are cross-listed, students may register through FGSS or the cross-listing department.
b. These 36 credits must include the following three courses:

FGSS 201 Introduction to FGSS Studies
FGSS 202 Introduction to FGSS Theories
FGSS 400 Senior Seminar in FGSS Studies
c. The 36 credits must also include at least one FGSS course with a significant focus on each of the following three categories: (Note: Although a given course may satisfy one, two, or even three of these categories, a given student must take at least two courses to fulfill this requirement):

- LBG studies
- Intersecting structures of oppression: race, ethnicity, and/or class
- Global perspectives: Africa, Asia, Latin America, or Middle East, by itself or in a comparative or transnational framework. Students may choose from the list in the course catalog or at the FGSS office.
A student with a double major may count up to three FGSS courses toward the FGSS major that she/he is simultaneously counting toward a second major.

The Honors Program: To graduate with honors, a student majoring in FGSS must complete a senior thesis under the supervision of an FGSS faculty member and defend that thesis orally before an honors committee. To be eligible, a student must have at least a cumulative 3.0 GPA in all course work and a 3.3 GPA in all courses applying to their FGSS major. Students interested in the honors program should consult the DUS late in the spring semester of their junior year, or very early in the fall semester of their senior year.

## The FGSS Concentration

Undergraduate students in any college at Cornell may concentrate in Feminist, Gender, \& Sexuality Studies in conjunction with a major defined elsewhere in the university. The concentration consists of five FGSS courses with a grade of C- or higher, through FGSS or the cross-listing department that are completed with a grade of C- or above, none of which may be counted toward the student's non-FGSS major. An exception to this rule may be made for students in the contract colleges, who may petition the FGSS DUS to count one course from their major toward the FGSS concentration. First-year writing seminars may not be included within the five required courses. Students wishing to concentrate in FGSS should see the DUS. The five courses required for the FGSS Undergraduate
Concentration must include:
FGSS 201 Introduction to FGSS Studies FGSS 202 Introduction to FGSS Theories
Any FGSS course that satisfies at least one of the three categories required for a major as defined above.
Any two additional FGSS courses of the student's choice

## The LBG Concentration

FGSS serves as home to the Lesbian, Bisexual \& Gay Studies (LBG) Program, which offers an undergraduate concentration as well as a graduate minor. The LBG undergraduate concentration consists of four courses. For a complete listing of all courses that will fulfill this concentration please see the LBG Studies portion of this catalog.

## 1. First-Year Writing Seminars

FGSS 106(1060) FWS: Women and Writing (also ENGL 105[1060])
Fall and spring. 3 credits. Staff.

## 2. Courses

FGSS 201(2010) Introduction to Feminist, Gender, and Sexuality Studles (CA-AS)
Fall and spring. 4 credits. Staff. Feminist, Gender \& Sexuality Studies is an interdisciplinary program focused on understanding the impact of gender and sexuality on the world around us and on the power hierarchies that structure it. This course focuses mainly on the experiences, historical conditions, and concerns of women as they are shaped by gender and sexuality both in the present and the past. Students read a variety of texts, personal narratives, historical documents, and cultural criticism across a range of disciplines. In doing so students consider how larger structural systems of both privilege and oppression affect individuals' identities, experiences, and options, and simultaneously examine forms of agency and
action taken by women in the face of these larger systems.
FGSS 202(2020) Introduction to Feminist,
Gender, and Sexuality Theories (also Gender, and Sexuality Theories (also VISST 203[2020]) (CA-AS)
Fall. 4 credits. D. Reese.
Introduces students to critical approaches in feminist scholarship to the cultural, socioeconomic, and political situation(s) of women. Particular attention is paid to the conceptual challenges and dangers posed by attempts to study women without taking account of relations between race, class, and gender in ideological and social formations.
Readings draw on work in various disciplines and include literary texts and visual images.
[FGSS 209(2090) Seminar in Early American History (also HIST 209[2090], AM ST 209[2090])
Fall. 4 credits. Next offered $2008-2009$. M. B. Norton.]
[FGSS $212(2120)$ African American Women: 20th Century (also HIST/ AM ST 212[2120])
4 credits. Next offered 2008-2009. M. Washington.]
[FGS5 214(2140) Biological Basis of Sex Differences (also BIOAP 214[2140], B\&SOC 214[2141]]
3 credits. Offered alternate years. Next offered 2008-2009. J. Fortune.]
FGSS 216(2160) Gender and Colonization in Latin America (also HIST 216[2160], LAT A 216[2161])
Spring. 4 credits. K. Graubart.
For description, see HIST 216.
[FGSS 219(2190) Women and Gender in South Asia (also HIST 219 [2190], ASIAN $219[2219])$
4 credits. Next offered 2010-2011.
D. Ghosh.]

FOSS 246(2460) Contemporary Narratives by Latina Writers (also SPAN/LSP 246[2460])
Fall. 3 credits. D. Castillo.
For description, see SPAN 246.
FGSS 249(2490) Feminism and Philosophy (also PHIL 249[2490])
Fall. 4 credits. N. Sethi.
For description, see PHIL 249.
[FGSS 251(2510) 20th-Century Women Writers (also ENGL 251[2510])
4 credits. Next offered 2008-2009. Staff.]
[FGSS 270|2700) Gender: Meanings and Practice (also SOC 270[2700])
3 credits. Next offered 2008-2009.
S. Correll.]

FGSS 273(2730) Women in American Society, Past and Present (also AM ST 273[2730], HIST 273[2730])
Fall. 4 credits. M. B. Norton.
For description, see HIST 273.
FGSS 27612760) Desire (also COM L 276[2760], ENGL 276[2760], THETR 278[2780])
Spring. 4 credits. E. Hanson.
For description, see ENGL 276.
FGSS 284(2840) Sex, Gender, and Communication lalso COMM 284[2840])
Fall. 3 credits. L. Van Buskirk. For description, see COMM 284.
[FGSS 304(3040) Sex, Power, and Politics (also GOVT 304[3043])
4 credits. Next offered 2008-2009.
S. Martin.]

FGSS 307(3070) African American Women in Slavery and Freedom (also HIST/AM ST 303[3030])
Fall. 4 credits. M. Washington.
For description, see HIST 303.
FGSS 313(3130) Special Topics in Drama and Performance (also THETR 313[3130])
Fall. 4 credits. S. Warner.
For description, see THETR 313.
FGSS 321/631(3210/6310) Sex and Gender in Cross-Cultural Perspectlve (also ANTHR 321/621[3421/6421])
Fall. 4 credits. K. March.
For description, see ANTHR 321/621
[FGSS 325(3250) Queer Performance (also THETR 326[3260])
Spring. 4 credits. Next offered 2008-2009.
S. Warner.]
[FGSS 344(3440) Male and Female in Chinese Culture and Society (also ANTHR 344[3554])
4 credits. Next offered 2008-2009.
S. Sangren.]
[FGSS 347(3470) Asian American Women's History (also HIST 347[3470], AM ST 351[3470])
Spring. Next offered 2008-2009. D. Chang.]
[FGSS 348|3480] Studies in Women's Literature (also ENGL 348[3480])
4 credits. Next offered 2008-2009.
K. McCullough.]

FGSS 350(3500) Contemporary Issues in Women's Health (also PAM 350[3500])
Fall. 3-5 variable credits. A. Parrot.
For description, see PAM 350.
FGSS 353(3530) Monsters A-Z (Aristotle-X-files) (also FREN/COM L 353[3530])
Fall. 4 credits. K. Long.
For description, see FREN 353.

## [FGSS 355(3550) Decadence (also ENGL

 355[3550])4 credits. Next offered 2008-2009.
E. Hanson.]

FGSS 358(3580) Theorizing Gender and Race In Asian Histories and Literatures (also ASIAN 388/688[3880/6880], COM L 398[3980])
Spring. 4 credits. N. Sakai.
For description, see ASIAN 388

## [FGSS 360(3600) Gender and

 Globalization (also CRP 395[3950]) (SBA)3 credits. Next offered 2008-2009.
L. Beneria.

This course invites students to think globally about gender issues and to trace the connections between global, national and local perspectives.]

## FGSS 363(3630) Age of Realism and

 Naturalism (also AM ST/ENGL 363[3630])Spring. 4 credits. K. McCullough.
For description, see ENGL 363.
[FGSS 368(3680) Marriage and Sexuality In Medieval Europe (also HIST/RELST 368[3680]
Next offered 2008-2009. P. Hyams.]
FGSS 369(3690) Fast-Talking Dames and Sad Ladies (also ENGL/FILM 369[3690]।
Fall. 4 credits. L. Bogel.
For description, see ENGL 369.
FGSS 370/670(3700/6700) Gender and Age in Archeology (also ANTHR/ ARKEO 369[3269])
Fall. 4 credits. N. Russell.
For description, see ANTHR 369

## FGSS 385(3850) Gender and Sexual

 Minorlties (also HD 384[3840]]Fall. 3 credits. K. Cohen.
For description, see HD 384.

## FGSS 399(3990) Undergraduate

 Independent StudyFall and spring. 1-4 credits. Prerequisites: one course in Feminist, Gender, and
Sexuality Studies and permission of a Feminist, Gender, and Sexuality Studies faculty member. Staff
FGSS 400(4000) Senior Seminar in Feminist, Gender, and Sexuality Studies
Spring. 4 credits. Prerequisite: requirement for and limited to Feminist, Gender, and Sexuality Studies majors. K. McCullough. Although the topic/focus of this course surely varies with the instructor, it is always treated as a broad capstone course for majors.
FGSS 404(4040) Women Artists (aiso ART H 466[4610])
Fall. 4 credits. J. Bernstock.
For description, see ART H 466.
[FGSS 406(4060) The Culture of Lives (also ANTHR 406[4406])
4 credits. Next offered 2009-2010.
K. March.]

FGSS 410(4100) Health and Survival Inequalities (also D SOC 410[4100], SOC $410[4100]$ )
Fall. 4 credits. A. Basu.
For description, see D SOC 410
FGSS 411/611(4110/6110) Seminar: Devalution and Privatization: Challenges for Urban Public Management (also CRP 41 2/612[41 20/6120], AEM 433/633[4330/6330])
Fall. 4 credits. M. Warner.
For description, see CRP 412.
[FGSS $414(4140)$ Bodies in the Middle Ages: Embodiment, Incarnation, Performance (also ENGL 414[4140])
4 credits. Next offered 2008-2009.
M. Raskolnikov.]

FGSS 416(4160) Gender and Sex in South East Asia (also HIST 416/616[4160/6160], ASIAN 416[4416])
Fall. 4 credits. T. Loos.
For description, see HIST 416.
FGSS 420/620(4200/6200) Government Policy Workshop (also CRP 418/618[4180/6180], AEM 634[6340])
Spring. 4 credits. M. Warner.
For description, see CRP 418/618.

FGSS 421(4210) Theories of Reproduction (also SOC 421[4210], D SOC 421[4210])
Spring. 4 credits. A. Basu.
For description, see D SOC 421
FGSS 422|4220) New York Women (also S\&TS 422[4221], HIST 445[4451])
Fall. 4 credits. M. Rossiter.
For description, see S\&TS 422.
FGSS 425(4250) Bodies in Medicine, Science, and Technology (also S HUM 420[4200])
Spring. 4 credits. R. Prentice.
For description, see S HUM 420
FGSS 426(4260) Cutting and Film Cutting (also S HUM 421[4210])
Spring. 4 credits. S. Fathy.
For description, see S HUM 421

## FGSS 427(4270) Parody (also THETR

 420/620[4200/6200])Spring. 4 credits. N. Salvato.
For description, see THETR 420
[FGSS 442(4420) Gossip (also ENGL 464[4640], FGSS 642[6420], THETR 444/644 [4440/6440])
4 credits. Next offered 2009-2010.
N. Salvato.]

FGSS 444(4440) Historical Issues of Gender and Science (also S\&TS 444[4441])
Spring. 4 credits. M. Rossiter.
For description, see \$\&TS 444
[FGSS 445[4450) American Men (also HIST/AM ST 444[4440])
4 credits. Next offered 2008-2009
E. Baptist.]

FGSS 446(4460) Women in the Economy (also ILRLE 445[4450], ECON 457[4570])
Fall. 4 credits. F. Blau.
For description, see ILRLE 445.
FGSs 448(4480) Global Perspectives on Violence against Women (also PAM 444[4440])
Spring. 3 credits. A. Parrot
For description, see PAM 444.
[FGSS 451(4510) Women in Italian Renaissance Art (also ART H 450[4450])
4 credits. Next offered 2008-2009.
C. Lazzaro.]

FGSS $461(4610)$ Sexuality and the Law (also AM ST 460[4265], GOVT 462[4625], GOVT 762[7265], FGSS 726[7620])
Spring. 4 credits. A. M. Smith.
For description, see GOVT 462.
FGSS 462(4620) Diversity and Employee Relations (also ILRHR 463[4630])
Fall. 4 credits. Q. Roberson.
For description, see ILRHR 463
FGSS 475/675(4750/6750) Advanced Undergraduate Seminar in Global Feminisms: Naming "Women" in Globalization
Spring. 3 credits. D. Reese.
Recent international treaties have designated "trade barrier" as a primary term in legislative negotiations between nation-states. In this course, we will explore the implications of this particular economic form of valuation for larger questions of social justice. How do certain values appear as values, how are they
coded, and how are they read? What of values that are unable to appear under the lens of the term "trade barrier" such as communal property, domestic labor or historical injustice? Can projects for social equality appear within the calculations of global capital? If so, how and under what auspices? How and when are human rights and/or women's rights articulated within this context?

## [FGSS 476\{4760] Global Women's

 Literature: \{En\} Gendering Space (also ENGL 476[4760])4 credits. Next offered 2009-2010.
E. DeLoughrey.]
[FGSS 477(4770) Intersections in Lesblan Fiction falso ENGL 478[4780], AM ST 468[4780])
4 credits. Next offered 2009-2010.
K. McCullough.]
[FGSS 478(4780) Senior Seminar in the 20th Century: Narratives of Loss (AIDS) (also ENGL 475[4750])
4 credits. Next offered 2009-2010.
D. Woubshet.]
[FGSS 480(4800) Studies in Gender Theory: Kinship and Embodiment (also COM L 481[4810])
4 credits. Next offered 2008-2009.]
FGSS 499(4990) Senior Honors Thesis Fall and spring. 1-8 credits. Prerequisite: FGSS seniors only. Staff.
To graduate with honors, FGSS majors must complete a senior thesis under the supervision of a FGSS faculty member and defend that thesis orally before an honors committee. To be eligible for honors, students must have at least a cumulative GPA of 3.0 in all course work and a 3.3 average in all courses applying to their FGSS major. Students interested in the honors program should consult the DUS late in the spring semester of their junior year or very early in the fall semester of their senior year.
FGSS 603(6030) The Question of Feminist and Queer Criticism in Premodern Studies (also ENGL 603[6030])
Spring. 4 credits. M. Raskolnikov.
For description, see ENGL 603.
FGSS 604(6040) Passionate Politics: Affect, Protest, Performance (also THETR 606[6060]]
Spring. 4 credits. S. Warner.
For description, see THETR 606.
FGSS 605(6050) Camp, Kitsch and Trash (also THETR 605[6050])
Spring. 4 credits. N. Salvato.
For description, see THETR 605
FGSS 606(6060) Psychology of Adolescence in Case Study (also EDUC 617[6170])
Spring. 3 credits. D. Schrader.
For description, see EDUC 617.
FGSS 612(6120) Population and Development in Asia (also D SOC $612[6120])$
Spring. 3 credits. L. Williams.
For description, see D SOC 612.

## FGSS 614(6140) Gender and

 International Development (also CRP 614[6140])Spring. 3 credits. L. Beneria.
For description, see CRP 614.
[FGSS 617(6170) Feminist Methodology (also GOVT 642[6423])
Spring. 4 credits. Next offered 2008-2009. S. Martin.]

FGSS 618/6180) The Psychology of Moral Development and Education (also EDUC 616[6160])
Fall. 3 credits. D. Schrader.
For description, see EDUC 616.

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FGSS 620(6200) Government Policy Workshop (also CRP 618[6180), AEM 634[6340])
Spring. 4 credits. M. Warner
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For description, see CRP 618.

## FGSS 621(6210) Black Communities and the Politics of Health (also AS\&RC 620[6602], HD 622[6220])

Fall. 4 credits. Staff.
For description, see AS\&RC 620.

## [FGSS 624(6240) Epistemological

 Development and Reflective Thought (also EDUC 614[6140])3 credits. Next offered 2008-2009.
D. Schrader.]

FGSS 628(6280) Love, Loss, and Lament in the Renaissance (also ENGL 625[6250])
Fall. 4 credits. B. Correll.
For description, see ENGL 625.
FGSS 631(6210) Sex and Gender in Cross-Cultural Perspective (also FGSS 321[3210], ANTHR
321/621[3421/6421])
Fall. 4 credits. K. March.
For description, see ANTHR 321.
FGSS 636(6360) Comparative History of Women and Work (also ILRIC 636[6360])
Spring. 4 credits. I. DeVault.
For description, see ILRIC 636.

## FGSS 637(6370) Parody (also THETR 420/620(4200/6200]) <br> Spring. 4 credits. N. Salvato.

For description, see THETR 420.

## FGSS 638(6380) Seminar in Dramatic

 Theory: Theater and Social Change (also THETR 637[6370])Fall. 4 credits. S. Warner.
For description, see THETR 637.
[FGSS 640|6400) Historical Issues of Gender and Science (also HIST 641[6410], S\&TS 640[6401]]
4 credits. Next offered 2008-2009. S. Seth.]

## [FGSS 642(6420) Gossip (also ENGL

 464[4640], FGSS 442[4200], THETR 444/644[4440/6440])4 credits. Next offering 2009-2010.
N. Salvato.]

FGSs 655(6550) Modernist Fiction and the Erotics of Style (also ENGL 655[6550])
Spring. 4 credits. E. Hanson.
For description, see ENGL 655.
FGSS 691(6910) Gender and Sexuality in Early Modern Europe (also FREN 690[6900]
Fall. 4 credits. K. Long.
For description, see FREN 690.
[FGSS 695(6950) Topics in Music: Gender, Sexuality, and Glam Rock (also MUSIC 695[7311])
Fall. 4 credits. Next offered 2009-2010. J. Peraino.]

## FGSS 699(6990) Topics in Feminist,

 Gender, and Sexuality StudiesFall and spring. Variable credit. Staff. Independent reading course for graduate students on topics not covered in regularly scheduled courses. Students develop a course of readings in consultation with a faculty member in the field of Feminist, Gender, and Sexuality Studies who has agreed to supervise the course work.

## FGSS 762(7620) Sexuality and the Law (also GOVT 462[4625], FGSS 461[4610], 762[7625]) <br> Spring. 4 credits. A. M. Smith. <br> For description, see GOVT 462.

## FILM

See "Department of Theatre, Film, and Dance."

## FIRST-YEAR WRITING SEMINARS

For information about the requirements for writing seminars and descriptions of seminar offerings, see the John S. Knight Institute web site: www.arts.cornell.edu/knight_institute.

## FRENCH

See "Romance Studies."

## GERMAN STUDIES

L. Adelson; D. Bathrick, acting chair (fall); M. Briggs (Dutch); B. Buettner, associate language program director; P. Gilgen, director of graduate studies; A. Groos;
P. U. Hohendahl, acting chair (spring); G. Lischke, language program director and director of undergraduate studies; B. Martin; U. Maschke, associate language program director; P. McBride, D. Reese, A. Schwarz; L. Trancik (Swedish); G. Waite. Emeritus: H. Deinert.

The Department of German Studies offers students a wide range of opportunities to explore the literature and culture of Germanspeaking countries, whether as part of their general education, a major in German Studies, or a double major involving anothier discipline, or as preparation for graduate school or an international professional career. Courses are offered in German as well as in English; subjects range from medieval to contemporary literature and from film and visual culture to intellectual history, music, history of psychology, and feminist, gender, and sexuality studies.
The course offerings in German begin with GERST 121-122, 123 (introductory language level). Students then continue with intermediate-level courses, which provide further grounding in the language and in German literature and cultural studies. GERST 206 provides instruction for German in the culture of business, leading to certification. On the advanced level ( 300 level or above), we offer thematically oriented courses that include intensive language work ( $301,302,306,310$ ); literature and culture study courses in German, including the senior seminar; and seminars of interdisciplinary interest taught in

English. Addressing a broad spectrum of topics in German culture, our courses appeal to German majors and other qualified students alike.

The department's offerings in English begin with a series of first-year writing seminars introducing various aspects of German literature (e.g., the fairy tale and Romantic consciousness or 20th-century writers such as Kafka, Hesse, Mann, Brecht), theorists such as Marx, Nietzsche and Freud, issues in mass culture and modernity, problems of German national identity/ies, and cinema and society. Courses in German and English at the 300 and 400 levels explore such topics as the Faust legend, aesthetics from Kant to Heidegger, city 'topographies, Freud and his legacy, opera' from Mozart to Strauss, the German novel, literature and philosophy, political theory and cinema, the Frankfurt School, migration and globalization, and feminist theory. It may be possible to arrange a German section for courses taught in English, either informally or formally (for credit). Students are encouraged to discuss this possibility with instructors.

## Sequence of Courses

Courses in German:
Introductory level: GERST 121-122, after completion, placement into GERST 123 or 200 Intermediate level: GERST 200, 202, 204, and 206
Advanced level: GERST 301, 302, 306, 307, 310, and 410
Courses taught in German that are numbered 300 through 320 focus on intensive language study; courses taught in German that are numbered 321 through 350 focus on studying literature and other forms of cultural expression.
Courses in German or English: further 300and 400 -level literature and culture courses (see course descriptions)

## Advanced Standing

Students with an AP score of 4 or hetter are automatically granted 3 credits in German. Students with an AP score of 4 or better, an LPG score of 65 or higher, or an SAT II score of 690 or higher must take the CASE exam for placement in courses above GERST 200. Students coming to Cornell with advanced standing in German and/or another subject are encouraged to consider a double major and to discuss the options with the director of undergraduate studies as early as possible.

## Certificate in German Language Study

The Certificate in German Language Study is issued to recognize substantial language study beyond the GERST 200 level in the Department of German Studies. Students are awarded the certificate after passing three German Studies courses held in German with a grade of $B$ or above. Two of these courses must be at the 300 level or above. No more than two of the three courses can be taken with the S-U option. Applications for the language certificate may be picked up in the Department of German Studies ( 183 Goldwin Smith Hall) in February.

## Internships

The department works with the USA-Interns program to provide summer internships to qualified students with German companies and agencies. Interested students should contact the language program director, Gunhild Lischke (g115@cornell.edu, G75 Goldwin Smith Hall, 255-0725), early in the fall semester.

## The Majors

The department offers two options for the major: German literature and culture, and German area studies. The latter is a more broadly defined sequence that includes work in related disciplines. The course of study in either major is designed to give students proficiency in reading, speaking, and writing in German, to acquaint them with German culture, and to help them develop skills in reading, analyzing, and discussing German texts in relevant disciplines with those goals in mind. The department also encourages study abroad. For both majors, there is a wide variety of courses co-sponsored with other departments (Comparative Literature; Government; History; Music; Theatre, Film, and Dance; Feminist, Gender, and Sexuality Studies).

The department encourages double majors and makes every effort to accommodate prospective majors with a late start in German Students interested in a major should consult the director of undergraduate studies, Gunhild Lischke, G75 Goldwin Smith Hall.

## German (Literature and Culture)

Students in this major select courses from the Department of German Studies and may use them to pursue individual interests in literature, film and visual culture, theater and performing arts, music, intellectual and political history, and gender studies, for example. Please consult with the director of undergraduate studies.

Admission: By the end of their sophomore year, prospective majors should have successfully completed GERST 202, 204, or 206.

To complete the major, a student must:

1. Demonstrate competence in the German language by successful completion of two 300 -level courses with intensive language work (GERST 301, 302, 306,310) or the equivalent.
2. Complete six courses in the Department of German Studies at the 300 level or above. One of these must be GERST 410 Senior Seminar.
3. Select a faculty advisor from the department.

## German Area Studies

Students select courses from the Department of German Studies as well as courses with a substantial German component from other departments, such as Comparative Literature; Government; History; Music; Theatre, Film, and Dance; and Feminist, Gender, and Sexuality Studies.
Admission: By the end of their sophomore year, prospective majors should have successfully completed GERST 202, 204, or 206.

To complete the major, a student must:

1. Demonstrate competence in the German language by successful completion of two 300 -level courses with intensive language work (GERST 301, 302, 306, 310) or the equivalent.
2. Complete six courses with a substantial German component at the 300 level or above. Three of these must be in the Department of German Studies, including GERST 410 Senior Seminar.
3. Select a committee of one or more faculty advisors to help formulate a coherent program of study. One of the advisors must be from the Department of German Studies.

## Honors

Honors in German Studies are awarded for excellence in the major, which includes overall grade point average and completion of the honors thesis. Students are awarded either honors (cum laude), high honors (magna cum laude), or the highest honors (summa cum laude) in the program based on the honors advisors' evaluation of the level and the quality of the work completed toward the honors degree. The honors distinction will be noted on the student's official transcript and will also be indicated on the student's diploma.
Prerequisites for admission. Students must have upperclass standing, an overall GPA of a B or higher, and a GPA of 3.5 or higher in the major. Students must first consult with the director of undergraduate studies in German Studies regarding eligibility for the honors program.
Procedure. Students who wish to be considered for honors ideally should apply to the director of undergraduate studies no later than the second term of the junior year. Students who are off campus in their junior year must apply by the third week of classes in the first semester of their senior year. Students should secure the consent of a faculty member to serve as the director of both the reading course (GERST 453) and the writing of a thesis (GERST 454). With the help of their thesis advisor, students choose an area of special interest and identify at least one other faculty member who is willing to serve on the honors committee. An oral thesis defense concludes the process.

## Study Abroad in a German-Speaking Country

The Department of German Studies strongly supports study abroad as an opportunity for students to live and study in the German cultural context. The experience of living abroad promotes enduring personal growth, provides new intellectual perspectives through cultural immersion, and opens up academic and professional opportunities.
Students interested in studying abroad are encouraged to consider the Berlin Consortium, of which Cornell is a member. The program is run in conjunction with the Free University of Berlin and is of very high caliber. Six weeks of an intensive language practicum held at the Berlin Consortium center are followed by one or two semesters of study at the university. Participants enroll in regular courses at the university. Assistance in finding internships between semesters may be available to
students staying for an entire academic year. Four semesters of German language study are prerequisite for participating in the program; ideally the last of these courses should be at the 300 level.
Students interested in this or other study abroad options in Germany, Austria, or Switzerland should consult the language program director, Gunhild Lischke (G75 Goldwin Smith Hall, 255-0725, gl15@cornell. edu).

## First-Year Writing Seminars

Consult the John S. Knight Institute brochure for course times, instructors, and descriptions.

## Courses Offered in German <br> GERST 121(1210) Exploring German Contexts I

Fall or spring. 4 credits. Intended for
students with no prior experience in
German or language placement test (LPG) below 37, or SAT II below 370. G. Lischke, U. Maschke, and staff.

Students develop basic abilities in listening, reading, writing, and speaking German in meaningful contexts through interaction in small group activities. Course materials including videos, short articles, poems, and songs provide students with varied perspectives on German language, culture, and society.

## GERST 122(1220) Exploring German

 Contexts IIFall or spring. 4 credits. Prerequisite: GERST 121, LPG 37-44, or SAT II 370-450.
U. Maschke, G. Lischke, and staff. Students build on their basic knowledge of German by engaging in intense and more sustained interaction in the language. Students learn more advanced language structures allowing them to express more complex ideas in German. Discussions, videos, and group activities address topics of relevance to the contemporary German-speaking world.
GERST 123(1230) Expanding the German Dossier
Fall or spring. 4 credits. Successful completion of GERST 121, 122, and 123 satisfies Option 2. Prerequisite: study of Grerman and LPG 45-55 or SAT II 460-580. Staff.
Students continue to develop their language skills by discussing a variety of cultural topics and themes in the German-speaking world. The focus of the course is on expanding vocabulary, reviewing major grammar topics, developing effective reading strategies, improving listening comprehension, and working on writing skills. Work in small groups increases each student's opportunity to speak in German and provides for greater feedback and individual help.
GERST 200(2000) Germany: Intercultural Context (CA-AS)
Fall or spring. 3 credits. Satisfies Option 1 Prerequisite: GERST 123 or LPG 56-64 or SAT II 590-680, or placement by exam. Staff.
Content-based language course on the intermediate level. Students examine important aspects of present-day German culture while expanding and strengthening their reading, writing, and speaking skills in German. Materials for each topic are selected from a variety of sources (fiction, newspapers, magazines, and the Internet). Units address a
variety of topics including studying at a German university, modern literature, Germany online, and Germany at the turn of the century. Oral and written work and individual and group presentations emphasize accurate and idiomatic expression in German. Successful completion of the course enables students to continue with more advanced courses in language, literature, and culture.

GERST 202(2020) Literary Texts and Contexts (LA-AS)
Fall. 3 credits. Satisfies Option 1. Prerequisite: GERST 200 or equivalent or placement exam. Conducted in German. U. Maschke and staff.

Students in this intermediate course read and discuss a number of works belonging to different literary genres by major Germanspeaking authors such as Kafka, Walser, Brecht, Mann, Frisch, Dürrenmatt, Bachmann, and others. They explore questions of subjectivity and identity in modern society, of human existence as existence in language, and of the representation of history in literary texts. Activities and assignments focus on the development of reading competency in different literary genres, the improvement of writing skills including the accurate use of idiomatic expressions, the expansion of students' German vocabulary, and the systematic review of select topics in German grammar.

## GERST 204(2040) Working with Texts (CA-AS)

Fall or spring. 3 credits. Satisfies Option 1. Prerequisite: GERST 200 or placement by exam (placement score and CASE). Staff. Emphasis is on improving oral and written expression of idiomatic German. Enrichment of vocabulary and appropriate use of language in different conversational contexts and written genres. Material consists of readings in contemporary prose, articles on current events, videos, and group projects. Topics include awareness of culture, dependence of meaning on perspective, interviews with native German speakers, German news broadcasts, reading German newspapers on the Internet.

## GERST 206(2060) German in Business Culture (CA-AS)

Spring. 3 credits. Satisfies Option 1. Prerequisite: GERST 200 or placement by examination placement score and CASE.
Students without previous knowledge of
business German are welcome. G. Lischke Students learn German and understand German business culture at the same time. This German language course examines the German economic structure and its major components: industry, trade unions, the banking system, and the government. Participants learn about the business culture in Germany and how to be effective in a work environment, Germany's role within the European Union, the role of the Bundesbank, the importance of trade and globalization, and current economic issues in Germany. The materials consist of authentic documents from the German business world, TV footage, and a business German textbook. At the end of the course, the external Goethe Institut exam "Deutsch fur den Beruf" is offered.

## [GERST 301(3010) Scenes of the Crime:

 German Mystery and Detective Fiction (LA-AS)Fall. 4 credits. Taught in German. Next offered 2008-2009. P. Gilgen.]

GERST 302(3020) Youth Culture: Adolescence in German Fiction (LA. AS)
Spring. 4 credits. Satisfies Option 1 Prerequisite: GERST 202, 204 or 206 or equivalent or placement exam, permission of instructor. Taught in German. Next offered 2008-2009. B. Buettner.]

## GERST 303(3030) Angels and Demons in German Literature (LA-AS)

Spring. 4 credits. Prerequisites: GERST 202, 204, 206 or placement exam. Maximum of 20 students. Satisfies Option 1. K. Otto. This advanced language course focuses, in both the readings and the discussions, on the supposedly contradictory concepts of angels and demons. We will see how they are not only different but also similar. We will have the opportunity to investigate our belief in angels and demons from a variety of perspectives, and to investigate how the terms are used in everyday parlance as opposed to, or in accord with, their original meanings. Taught in German.

## GERST 306(3060) German Medla (CA-AS)

 Fall. 4 credits. Taught in German. Satisfies Option 1. Prerequisites: GERST 202, 204 or 206 or equivalent or permission of instructor. U. Maschke.The course explores the German media landscape through analysis of print, film, and digital media. We will investigate different styles of writing and presentation to unravel culturally specific discourses of communication. Intensive language study will enable the students to develop their own projects in the media of choice.

## GERST 321(3210) After the Fires: Divided

 Germany 1945-1989 (formerly GERST 307) (CA-AS)Fall. 4 credits. Satisfies Option 1.
Prerequisite: GERST 202 or GERST 204 or GERST 220; otherwise, equivalent or permission of instructor. Taught in German. L. Adelson
Introduction to the history and culture of postwar Germany, the development and unification of the two Germanys, and their societies. The emphasis is on cultural and social institutions as well as political and intellectual debates. Focal topics include responses to the Nazi past, Germany and Europe, protest movements, migration patterns, women, mass media, and popular culture. We will consider the changes taking place in Germany today in light of the recent past. Some films will also be shown.
[GERST 325(3250) The Age of Goethe * (LA-AS)
Fall. 4 credits. Satisfies Option 1. Next offered 2008-2009. A. Groos.]

## GERST 410(4100) Senior Seminai

Fall. 4 credits. Satisfies Option 1. Limited to 15 students. Prerequisites: adequate command of German; any 300 -level course taught in German, or equivalent, or permission of instructor. Readings and discussions in German. P. Gilgen. Topic: Melancholy Writing. Taking its departure from Freud's seminal distinction between mourning and melancholia, this seminar examines whether melancholy writing may be an ethical desideratum. Close readings of literary, philosophical, and psychological texts will guide us in our attempt at defining a melancholy style of writing and its textual effects. Readings may include Freud, Kristeva,

Abraham and Torok, Derrida, Kant, Hegel, Hölderlin, Heine, Conrad, Trakl, Benjamin, Kafka, Wittgenstein, Celan, Grass, and Sebald.

## GERST 418(4180) New German

 Literature: After the Wall (LA-AS) Spring. 4 credits. Satisfies Option 1. Prerequisite: Any 300-level course taught in German, or equivalent, or permission of instructor. Required readings and discussion in German. L. Adelson Since the Berlin Wall came crumbling down in 1989, contemporary trends in German literature have often been celebrated as new or even unprecedented. This writing is at times associated with a turn away from weighty preoccupations with historical responsibility that had characterized much German literature in the wake of World War II and the Holocaust. At other times the contemporary preoccupation with "newness" is seen as a marketing phenomenon in the competitive world of international publishing, especially after the collapse of communism in Europe. Given that literary developments in German over the last sixty years have repeatedly been hailed as marking some type of "new beginning," this course explores the interplay of innovation and continuity in German literature written since the end of the cold war. Paradoxically, national unification and transnational phenomena have all loomed large on the cultural horizons of a changing readership in this time. Introducing students to representative texts of this new period in German literary history, the course also invites students to consider how stylistic features of contemporary literature engage the problematics of innovation. Rather than merely relying on journalists' categories for describing the literature at hand (for example, "Wenderoman," "Frauleinwunder," "neues Erzählen," or even "pop"), this course brings renewed curiosity to literary trends most often celebrated for being "new." The course emphasizes prose writing, but some poetry, theater, and other media will also be considered. Focal readings include selected works by authors such as Christa Wolf, Thomas Brussig, Botho Strauß, Ingo Schulze, W.G. Sebald, Christian Kracht, Karen Duve, Judith Hermann, Anne Duden, Hans-Ulrich Treichel, Marcel Beyer, Bernhard Schlink Doron Rabinovici, Irene Dische, Elfriede Jelinek, E. S. Ozdamar, Zafer Senocak, Feridun Zaimoglu, Berkan Karpat, Josê Oliver, Herta Muller, Terezia Mora, Yoko Tawada, Günter Grass, Uwe Timm, Christoph Hein, and others
## GERST 419(4190) Vienna 1900 and the

 Challenge of ModernitySpring. 4 credits. Satisfies Option 1.
Prerequisite: any GERST 300-350 course or
equivalent advanced intermediate
knowledge of German. Taught in German. P. McBride.

This course focuses on the culture of turn-of-the-century Vienna as a laboratory for ideas and practices formulated in response to the challenges of modernization in Western and Central Europe. In particular, we will explore the innovative experiments that transformed literature and the visual arts between 1880 and 1914; the impact that Freudian psychoanalysis and pre-Freudian psychological theories had on 19th-century notions of subjectivity, language, and morality (as well as their contribution in spurring innovative modes of writing and representation); and the ways in which Vienna's public and private spaces became the site of conflicting views of
modernity in the visions of contemporary architects, urban planners, and interior designers. Possible texts include works by Musil, Loos, Canetti, Salomé, Mayreder, Weininger, Hofmannsthal, Kraus, Kafka, Rilke, Schnitzler, Andrian, Otto Wagner, Freud, Mauthner, Mach, Kokoschka, Klimt, Wittgenstein.

## [GERST 442(4420) Changing Worlds:

 Migratlon, Minorities, and German Literature (LA-AS)4 credits. Satisfies Option 1. Next offered 2008-2009. L. Adelson.]
[GERST 443(4430) Love as Fiction. German Novellas from Three Centuries
Spring. 4 credits. Satisfies Option 1. Conducted in German. Prerequisite: any course at 300 level taught in German or equivalent or permission of instructor. Readings and discussions in German. Next offered 2009-2010. A. Schwarz.]

## Courses conducted In English

It may be possible to arrange a German section for courses conducted in English, either informally or formally (for credit). Students are encouraged to discuss this possibility with instructors.

## OERST 353(3530) 19th- and 20th-century

 European Philosophy (also PHIL 217[2170]) (KCM-AS)Spring. 4 credits. M. Kosch.
Survey of philosophy on the continent after Kant. Figures covered include Hegel, Marx, Nietzsche, Weber, Freud, Husserl, Heidegger, Lukacs, Horkheimer, Adorno, Habermas, and Foucault.

## CERST 355(3550) Political Theory and Cinema (formorly GERST 330) (also COM L 330[3300], FILM 329[3290], COVT 370[3705]) (CA-A5)

Spring. 4 credits. G. Waite
This is an introduction to fundamental problems of contemporary political and cultural theory, filmmaking, and film analysis, along with their interrelationships. A particular focus is on comparing European and alternative cinema to Hollywood in terms of Marxist, feminist, psychoanalytic,
postmodernist, and postcolonial types of interpretation. Explicitly political cinema is compared to more subtle, subliminal types of ideological transmission. Filmmakers/theorists may include: D. Cronenberg, T. Conley, M. Curtiz, K. Bigelow, G. Deleuze, R. Fassbinder, J. Ford, J.-L. Godard, M. Gorris, W. Herzog, A. Hitchcock, A. \& A. Hughes, S. Kubrick, F. Jameson, P.-P. Pasolini, G. Pontecorvo, R. Ray, M. Scorsese, R. Scott, O. Stone, G. Romero, S. Shaviro, K. Tahimik, M. Viano, S. Zizek. This is a lecture course but there will be plenty of time for discussion. There are no prerequisites.

## [GERST 360(3600) Words and Music (also

 MUSIC 272[2245]) (LA-AS)Formerly GERST 342. Next offered 20082009. A. Groos.]
[CERST 374(3740) Opere and Culture
(also MUSIC 374[3222]) \# (LA-AS)
Next offered 2008-2009. A. Groos.]

## GERST 377(3770) The Art of the

 Historical Avant-Garde (also ART H 372[3672], VISST 372[3672], ROM S 377 [3770], COM L 384[3840]) (LA-AS)Fall. 4 credits. P. McBride.
At the height of modernism (1910-1930), avant-garde artists and intellectuals began arguing that art could be employed to "reconstruct the universe," as one Futurist manifesto put it. They joined forces with the most radical political movements of their day and created innovative artistic practicesranging from collage, montage, and the found object to the installation and the happeningthat continue to shape our perception of art and popular culture. This course will focus on strategies for politicizing art as well as formulating a new relation between high and popular culture in Germany, Italy, and France in the first half of the 20th century. Our investigation of avant-garde art will include original documents of Italian Futurism,
Expressionism, Dada, and Surrealism.

## Advanced Undergraduate and Graduate Courses

[GERST 405(4050] Introduction to Medieval German Literature I " (LA-AS)
Fall. 4 credits. Prerequisite: reading
knowledge of German. Next offered 20092010. A. Groos.]

## [GERST 406(4060) Introduction to

 Medleval German Literature II \# (LA-AS)Spring. 4 credits. Prerequisite: GERST 405 or equivalent or permission of instructor. Anchor course for the medieval period. Next offered 2009-2010. A. Groos.]

## GERST 407(4070) Teaching German as a

 Foreign LanguageFall. 4 credits. G. Lischke.
Designed to familiarize students with current ways of thinking in the field of applied linguistics and language pedagogy. Introduces different concepts of foreign language methodology as well as presents and discusses various techniques as they can be implemented in the foreign language classroom. Special consideration is given to topics such as planning syllabi, writing classroom tests, and evaluating students' performance. Participants conduct an action research project.
GERST 415(4150) Marx, Freud, Nietzsche (also COM L 425[4250]) \# (CA-AS)
Fall. 4 credits. There are no prerequisites. G. Waite.

This is an introduction to the three "master thinkers" who have helped determine the discourses of modernity and post-modernity. We consider basic aspects of their work: (a) specific critical and historical analyses; (b) theoretical and methodological writings; (c) programs and manifestos; and (d) styles of argumentation, documentation, and persuasion. This also entails an introduction, for non-specialists, to essential problems of political economy, continental philosophy, psychology, and literary and cultural criticism. Second, we compare the underlying assumptions and the interpretive yields of the various disciplines and practices founded by Marx, Nietzsche, and Freud: historical materialism and communism, existentialism and power-knowledge analysis, and psychoanalysis, respectively. We also consider how these three writers have been fused into a single constellation, "Marx-Nietzsche-Freud," and how they have been interpreted by
others, including L. Althusser, A. Badiou, A. Camus, H. Cixous, G. Deleuze, J. Derrida, M. Foucault, H.-G. Gadamer, M. Heidegger, L. Irigaray, K. Karatani, J. Lacan, P. Ricoeur, L. Strauss, S. Zizek. This is a lecture course but there will be plenty of time for discussion.
GERST 417(4170) Topics In German Philosophy (also PHIL 417[4170]) Fall. 4 credits. M. Kosch.
Topic: German Idealism-Fichte, Schelling, Hegel.

## [GERST 420(4200) Faust: Close Reading

 (LA-AS)Fall. 4 credits. Conducted in English. Next offered 2009-2010. G. Waite.]
[GERST 424(4240) The Totalltarian Order: Vision and Critlque (also GOVT 425[4255]) (CA-AS)
Fall. 4 credits. Next offered 2008-2009. P. U. Hohendahl.]

GERST 428(4260) The Animal (also COM L 424[4240], ENGL 426[4260]) (CAAS]
Spring. 4 credits. P. Gilgen.
In recent years literary representations and philosophical discussions of the status of the animal vis-ä-vis the human have abounded. In this course, we will track the literary
phenomenology of animality. In addition we will read philosophical texts that deal with the questions of animal rights and of the metaphysical implications of the "animal." Readings may include, among others, Agamben, Aristotle, Berger, the Bible, Calvino, Coetzee, Darwin, Derrida, Descartes, Donhauser, Gorey, Haraway, Hegel, Heidegger, Herzog, Kafka, Kant, La Mettrie, de Mandeville, Montaigne, Nietzsche, Ozeki, Rilke, Schopenhauer, Singer, Sorabji, Sterchi, Stevens, de Waal, Wittgenstein, Wolfe. A reading knowledge of German and French would be helpful.

## [GERST 428(4280) Genius and Madness

 in German Literature (LA-AS)Next offered 2009-2010. Offered as GERST 225 in Summer 2007 and 2008 to introduce students to German literature in a course surveying several centuries. Summer course will not count toward the German major requirements. A. Schwarz.]
[GERST 433(4330) History of Modern
Jewry (also HIST 433[4330]) (HA-AS) Fall. 4 credits. Limited to 15 students. Next offered 2009-2010. V. Caron.]

## [GERST 441(4410) Introduction to

 Germanic Linguistics (also LING 441[4441]) (HA-AS)Next offered 2008-2009. W. Harbert.
For description, see LING 441.]
GERST 451-452(4510-4520) Independent Study 451, fall; 452, spring. $1-4$ credits each semester. Prerequisite: permission of instructor.

GERST 453(4530) Honors Research Fall. Staff.

## GERST 454(4540) Honors Thesis

Spring. 8 credits. Prerequisite: GERST 453. Staff.

## GERST 457(4570) Imagining the

 Holocaust (also COM L 483[4830], ENGL 458[4580], JWST 458[4580]) [LA-AS]Spring. 4 credits. D. Schwartz.
For description, see ENGL 458.

## [CERST 496[4960] Theorizing the Public

 SphereNext offered 2008-2009. P. U. Hohendahl.]

## Graduate Courses

Note: For complete descriptions of courses numbered 600 or above consult the appropriate instructor.

## [CERST 615(6150) Jows in Cerman Culture Since 1945

Next offered 2008-2009. L. Adelson.]
[GERST 616(6160) Spaces of Literature Next offered 2008-2009. A. Schwarz.]

## GERST 618(8180) The Sclence of the

 Experience of Consciousness: Hegel's Phenomenology of Splrit (and Beyond) (also COM L 618[6180]) Fall. 4 credits. P. GilgenCentered on a close reading of the
Pbenomenology of Spirit, this course examines its problematic position vis-à-vis Hegel's subsequent system of philosophy. Intended as a ladder that would lead up to philosophical knowledge, the Phenomenology is and, at the same time, is not (yet) philosophy. This undecided position of the text is reflected in the text, and it poses the question of the possibility, the status, and the options of philosophy after the Phenomenology (which then leads to the question whether such philosophy would or would not coincide with philosophy after Hegel). The examination of three prominent constellations in the reception history of the Phenomenology will, on the one hand, address contemporary theory's vast debt to Hegel (primarily to the
Phenomenology) and will, on the other hand, lead us back to the primary text by forcing repeated re-examination of its philosophical arguments as well as its textual structure. We will begin this examination by tracing the aftermath of the Phenomenology in postHegelian German thought (especially in the works of "Left-Hegelians" such as Feuerbach and Marx, among others). In a second stage, we will focus on the intense reception of Hegel-for the most part the Hegel of the Phenomenology-in France during the years immediately preceding and following World War II, especially Jean Hyppolite's seminal commentary and Alexandre Kojeve's influential lectures, published as Introduction to the Reading of Hegel. Finally, the presence of the Phenomenology in contemporary theory will be addressed in readings that may include Francis Fukuyama, Jacques Derrida, Judith Butler, John Sallis, and Donald Phillip Verene.

## [OERST 620(6200) Faust; Close Reading (also GERST 420[4200])

Fall. 4 credits. Limited to 15 students. Next offered 2009-2010. G. Waite.]

## CERST 622(6220) Cultural Pessimism and the Fln-de-sibcle

Fall. 4 credits. P. McBride.
In the final decades of the 19th century, the aesthetic experiments of naturalism, impressionism, and symbolism all flourished amidst narratives of sickness, decline, and doom. Thinkers like Nietzsche, Simmel, and Weber pointed to the realm of culture as both the product of and a possible antidote to this quintessentially modern crisis. The discourse of cultural pessimism seized on this diagnosis to invest art and culture with a twofold function. On the one hand, they display most graphically the corruption and decay of modern societies; on the other, they promise a
final site of salvation from the illnesses of the social body: materialism, rationalization, mechanization, depersonalization, secularization. This course will focus on the discourses of cultural decline and redemption articulated in German-speaking culture between the 1870 s and the 1920 s within a variety of domains (literature, philosophy, sociology, and psychology, among others). Topics we will examine include the chauvinistic discourse of völkisch nationalism since the 1880 s; the relation between scientific and philosophical knowledge; the collapse of the notion of the "self" and its impact on the enterprise of literature; conceptualizations of modernity, society, and rationality; and the heated debates on gender as the primary battle ground for cultural conflict at the turn of the century. In the final part of the course we will examine the ways in which culturalpessimistic themes have resurfaced in contemporary debates on the clash of civilizations that will presumably shape a post-Cold War era destabilized by economic globalization and a new geo-political order.

## [GERST 627(6270] Baroque

Fall. 4 credits. Anchor course. Conducted in English. Next offered 2008-2009. G. Waite.]

## GERST 630(6300) Classicism and

 IdeallsmSpring. 4 credits. D. Reese. Texts in German. Anchor course.
An introduction to some of the major poetic and philosophical texts generally considered to be part of the period of German Classicism (1785-1805), while at the same time giving reasons to call into question notions of periodization and the canon, particularly as they have excluded women and lower social classes. In addition to the basic problem of the appropriation of classic antiquity at a time marked by the transition to bourgeois modernity, special consideration will be given to the emergence of modern aesthetic theory. Attention will also be given to the gender of Bildung and the workings of emergent notions of "culture" in the texts. Readings will be taken from the works of Goethe, Herder, Humboldt, Kant, Moritz, and Schiller among others. While the main focus of the seminar will be on primary texts, we will also consider contemporary criticism of the concept of Classicism and its problems.

## GERST 631-632(6310-6320) Reading <br> Academic German I and II

631, fall; 632 , spring. 3 credits each semester. Prerequisites: graduate standing; for GERST 632, GERST 631 or equivalent. Staff.
Intended primarily for beginners with little or no previous German knowledge. Emphasis in 631 on acquiring basic German reading skills. Emphasis in 632 on development of the specialized vocabulary of student's field of study.
GERST 634(6340) German Romanticism Spring, 4 credits. Most readings in German (though some translations exist); discussion and papers in English. This is a German Department anchor course, but students from other disciplines are welcome. G. Waite.

This graduate seminar introduces some major topics and texts in German literature, art, criticism, political thought, and philosophy from c. 1789 to ca. 1830 in two basic contexts: Europe between two revolutions and in
subsequent critical theory. The latter may include Marxists (on "the German ideology" and "flight from reality"), Freudians (on "the uncanny"), Balibar (on "the internal border" in Fichte), Heidegger (on "the other beginning" in Hölderlin), Adorno (on "parataxis" also in Hollderlin), de Man (on "the rhetoric of romanticism"), Lacoue-Labarthe \& Nancy (on "the literary absolute," following Walter Benjamin), and Deleuze \& Guattari (on "the war machine" in Kleist). But the primary focus will be on the close reading of texts, especially literary.

## [GERST 636(6360) Kleist and Kafka: Prose Works

Spring. 4 credits. Next offered 2008-2009. D. Reese.]
[GERST 637(6370) 19th-Contury Fiction: The Realist Project
Next offered 2008-2009. A. Schwarz.]

## [GERST 638(6380) Readings of

 Recallection (also COM L 601[6010]) Fall. 4 credits. P. Gilgen. Next offered 2009-2010.][CERST 639(6390) Walter Benjamin: Constellatlons of Thought
Spring. 4 credits. Texts in English and German. Discussions in English. Next offered 2009-2010. A. Schwarz.]

## [GERST 647(6470) German Literature

 from 1949 to 1989Fall. 4 credits. Prerequisite: reading knowledge of German. Next offered 20092010. D. Bathrick.]

## GERST 650(6500) Culture in the Welmar

 PerlodFall. 4 credits. D. Bathrick. Prerequisite: reading knowledge of German. Anchor course.
This survey course will treat major developments in the area of German culture (literature, cinema, painting) between 1900 and 1933. Individual representative texts will be studied and discussed in their relation to the cultural, political and social contexts out of which they emerge. Lectures and discussions will focus both on detailed interpretation of individual works as well as on the general historical background and developments of the period.

## [GERST 653(6530) Opera

Next offered 2008-2009. A. Groos.]

## GERST 655(6550) German 20th-Century Poetry

Fall. 4 credits. Not a full semester course Course will run October 1 to November 30. W. Emmerich.

This course will focus on three major modern poets of the 20th century (Bertolt Brecht, Gottfried Benn and Paul Celan) in light of the following concerns: A contextualization of each poet within the cultural and aesthetic landscape of 20th-century literary movements in Germany and Europe; a concentrated focus on developing a close reading of individual poem in order to help students develop an interpretive methodology.
【GERST 658(6560) Old High German, Oid Saxon (also LING 646[6646])
Spring. 4 credits. Next offered 2009-2010. W. Harbert.!

CERST 662(6620) Reassembling Culture: Montage and Collage In Weimar Germany
Spring. 4 credits. P. McBride.
This course will explore montage practices that gained currency in literature and the arts in Weimar Germany and signaled a shift from a literary culture predicated on the predominance of writing and the print media to a visual culture made possible by new technologies. The course will pursue two interlocking objectives. On the one hand, we will examine montage and collage as labels encompassing disparate practices of combining, layering, and juxtaposing that destabilized the boundaries of traditional art forms. On the other hand, we will probe the hypothesis that montage at this historical juncture also denoted a principle for forging individual identity in a post-humanist culture, a principle that facilitated the negotiation of irreconcilable political, ethical, and artistic demands. In scrutinizing the media contamination that montage and collage enact, we will interrogate modernist theories of (aesthetic) signification, representation, and performance in view of the challenges they posed for established relations between the visual and the verbal, realism and abstraction, "high" art and mass culture. Possible texts include works by Dōblin, Schwitters, Höch, Hausmann, Mann, Brecht, Benjamin, Heartfield, Eisenstein, Vertov, Lissitzky, Tzara, Serner, Keun, Adorno, Duchamp, and Hans Richter.

## CERST 663(6630) Nietzsche and

 Heidegger (slso COM L. 663[6630])Fall. 4 credits. G. Waite
This graduate seminar provides a basic introduction to the thinking of Nietzsche and Heidegger, and to the latter's interpretation and appropriation of the former. A major concern is the articulation of philosophy and politics, particularly in the case of Heidegger. We are also interested in the types of argumentation and styles of writing of both thinkers, including in light of the hypothesis that they were working in the ancient tradition of prudent exotericism, viz. that they never wrote exactly what they thought and that they intended their influence to come slightly beneath the level of conscious apprehension. We also consider their impact on the long list of intellectuals across the "Left-Center-Right" spectrum, including (depending on seminarparticipant interest): Adorno, Agamben, Bataille, Badiou, Bourdieu, Butler, Derrida, Deleuze, Foucault, Gadamer, Irigaray, Klossowski, Löwith, Marcuse, Rorty, Leo Strauss, Vattimo, Zupancic. The readings are provided in German (and French or Italian in some cases) and in English translations, when these exist. Discussion and papers in English. Students from all disciplines are welcome

## GERST 688(6680) Literature and the Uncanny <br> Next offered 2008-2009. A. Schwarz.]

## [CERST 671(6710) Postcolonial Theon and German Studies <br> Next offered 2008-2009. L. Adelson.]

## [CERST 689(6890) The Aesthetlc Theory of Adorno (also COM L 689[6890])

Fall. 4 credits. Next offered 2008-2009. P. U. Hohendahl.]
[GERST 696(6960) Conceptualizing Cultural Contact
Next offered 2009-2010. L. Adelson.]

## GERST 753-754(7530-7540) Tutorial In

 German LiteratureFall and spring. 1-4 credits each semester. Prerequisite: permission of instructor.

## Dutch

DUTCH 121-122(1210-1220) Elementary Dutch
121, fall; 122, spring. 4 credits each semester. Prerequisite: permission of instructor. M. Briggs.
Intensive practice in listening, speaking, reading, and writing basic Dutch in meaningful contexts. The course also offers insight into Dutch language, culture, and society.

## DUTCH 203(2030) Intermediate

Composition and Conversation
Fall. 3 credits. Satisfies Option 1. Prerequisite: DUTCH 122 or permission of instructor. Offered in Dutch. M. Briggs. Improved control of Dutch grammatical structures and vocabulary through guided conversation, discussions, compositions, reading, and film, drawing on all Dutchspeaking cultures.

## DUTCH 300(3000) Directed Studies

Spring. 1-4 credits, variable. Prerequisite: permission of instructor. Conducted in Dutch. M. Briggs
Individualized advanced Dutch studies.
Provides students with individualized programs which can be anything from advanced mastery in any or all skills to the mastery of Dutch for research, literature, and history in support of all disciplines.

## Swedish

SWED 121-122(1210-1220) Elementary Swedish
121, fall; 122 , spring. 4 credits each semester. Prerequisite: for SWED 122,
SWED 121 or equivalent. L. Trancik. Students develop abilities in listening, speaking, reading, and writing within Sweden's cultural context. Work on the Internet, interactive computer programs, and a virtual textbook are used in these courses.

SWED 203(2030) Intermediate Swedish
Fall. 3 credits. Satisfies Option 1.
Prerequisite: SWED 122 or permission of instructor. L. Trancik
Intermediate to advanced-level instruction using audiovisual material and text to enhance language comprehension.

## SWED 300(3000) Directed Studies

Fall. 1-4 credits, variable. Prerequisite: permission of instructor. Times TBA with instructor. L. Trancik.
Taught on a specialized basis to address particular student needs

## GOVERNMENT

V. Bunce, chair; C. Way, director of graduate studies; A. Carlson, director of undergraduate studies; C. Anderson, R. Bensel, S. Buck-Morss, P. Enns, M. Evangelista, J. Frank, L. Frasure, M. Gallagher, B. Hendrix, R. Herring, M. Jones-Correa, M. Katzenstein,
P. Katzenstein, J. Kirshner, I. Kramnick,
T. J. Lowi, S. Martin, L. Maxwell, D. Moehler, D. Patel, K. Roberts, D. Rubenstein, E. Sanders, M. Shefter, A. M. Smith, S. G. Tarrow,
N. T. Uphoff, N. van de Walle,
H. Zimmermann.

Web site: falcon.arts.cornell.edu/Govt
"Government" is what Cornell calls a department that elsewhere might be termed political science. The focus of this discipline is power applied to public purposes. Some faculty concentrate on purposes, some on applications. Some engage in the close reading of great texts of political philosophy, while others analyze the behavior of powerwielders and publics in this and other societies. Government is divided into four subfields: U.S. politics, comparative politics (other nations), political theory (philosophy) and international relations (transactions between nations).

## The Major

To be admitted to the major, a student must pass two Cornell government courses.
To complete the major, a student must:

1. pass two of the introductory government courses (GOVT 111, 131, 161, 181);
2. pass an additional course in one of the remaining subfields (American government, comparative government, political theory, or international relations) This course may be any course offered in the government department, including introductory courses, upper-level courses or seminars but must be a minimum of 3 credits. Students are strongly advised to take at least one course in each of the four subfields;
3. accumulate an additional 28 credits of government course work at the 300 level or above;
4. complete at least one seminar-style course in government that may be applied toward the 28 credits. These courses include those numbered $400 . \mathrm{XX}$ to which students are admitted by application only; or other 400 -level GOVT courses in which no more than 15 students are enrolled.
5. accumulate 11 credits in upper-level courses in related fields (e.g., anthropology, economics, history, science and technology studies, psychology, and sociology). Upper-level courses are usually courses numbered at the 300 level or above (200-level courses are not considered upper-level). Students should consult with their major advisor to choose appropriate courses. All choices of related courses must be approved by the major advisor or the director of undergraduate studies;
6. all courses used to fulfill a government major must be passed with a letter grade No S-U grades accepted.

To summarize, a total of 10 government courses and three additional courses (11 credits) of upper-level related courses are required to complete the major. For more information about the government major, please visit our web site: http://falcon. arts.cornell.edu/Govt.
Cornell in Washington Program.
Government majors may apply to the Cornell in Washington program to take courses and undertake a closely supervised externship during a fall or spring semester.

## European Studies Concentration.

Government majors may elect to group some of their required and optional courses in the area of European studies, drawing from a wide variety of courses in relevant
departments. Students are invited to consult Professors P. Katzenstein and S. G. Tarrow for advice on course selection and foreign study programs.
Model European Community Simulation. Undergraduates with an interest in the European Union, public affairs, or debating may participate in an annual European Union simulation held, on an alternating basis, in April at SUNY Brockport or in. January in Brussels. The simulation provides an opportunity for participants, representing politicians from the members states, to discuss issues and resolutions of current concern to the European Union.
To prepare for the simulation, a 2 -credit course is offered by the Department of Government each year (GOVT 431 or 432). Participation in the simulation is open only to those who register for this course. Anyone interested in participating or finding out more information should contact the Institute for European Studies at 120 Uris Hall, 255-7592.
International Relations Concentration. See the description under "Special Programs and Interdisciplinary Studies."
Honors. Application to the honors program is made in the early spring of the second semester of a student's junior year. For more information about the honors program and an application form, please visit falcon.arts. cornell.edu/Govt.
First-Year Writing Seminars. Consult the John S. Knight Institute brochure for times, instructors, and descriptions.
Major Seminars. Fall or spring. 4 credits. These seminars, emphasizing important controversies in the discipline, cap the majors experience. Thus preference in admission is given to majors over nonmajors and seniors over juniors. Topics and instructors change each semester. For more information, please visit "Guide to the Undergraduate Major in Government" on falcon.arts cornell.edu/GOV/ ugrad_brochure.html"seminars.
Course Subfields. Courses in the Department of Government are broken down into four subfields: American government, political theory, international relations, and comparative government. To determine in which category (or subfield) the following courses fall, please note the two-letter reference at the end of the descriptions. The key is as follows: $\mathrm{AM}=$ American, $\mathrm{PT}=$ theory $\mathrm{IR}=$ international relations, and $\mathrm{CO}=$ comparative.

## GOVT 111(1111) Introduction to

American Government and Politics (SBA-AS)
Fall and summer. 3 credits. T. Lowi.

Introduction to government through the American experience. Concentrates on analysis of the institutions of government and politics as mechanisms of social control. (AM)

## GOVT 131(1313) Introduction to Comparative Government and Politics (SBA-AS)

Spring and summer. 3 credits. K. Roberts. Provides a survey of the institutions, political processes, and policies of contemporary states. Focuses on the conditions for and workings of democracy. Looking at Western Europe, students analyze institutional variations among liberal democracies, and their political implications. Then they probe the origins of democracy in Western societies and the reasons why communism and other forms of authoritarian rule have prevailed elsewhere. Finally, they explore the impetus behind and the obstacles to democratization in the Third World and the erstwhile Communist Bloc. Throughout this survey, problems of democracy are related to problems of economic development, efficiency, and equality. (CO)

## GOVT 161(1615) Introduction to Political Philosophy \# (HA-AS)

Spring. 3 credits. I. Kramnick
Survey of the development of Western political theory from Plato to the present. Readings from the works of the major theorists. Examination of the relevance of their ideas to contemporary politics. (PT)

## GOVT 181(1817) Introduction to

 International Relations (SBA-AS)Fall and summer. 3 credits. J. Kirshner. Introduction to the basic concepts and practice of international politics. (IR)

## GOVT 182(1827) WIM Section: Introduction to International Relations

Fall. 1 credit. Prerequisite: permission of instructor; GOVT 181. Staff.
Special, writing-intensive section of GOVT 181, designed to provide a small number of students the opportunity to practice and improve their writing skills as they learn about world politics. Students complete a series of papers and are expected to take an active part in class discussion. (IR)

GOVT 222(2225) Controversies About Equality (also SOC 222[2220], D SOC/ PAM/ILROB 222[2220], PHIL 195[1905]) (SBA-AS)
Fall. 4 credits. S. Morgan.
For description, see SOC 222
GOVT 248(2485) Ethics and International Relations (also PHIL 248[2480]) (KCM-AS)
Spring. 4 credits. R. Miller.
For description, see PHIL 248. (PT)
GOVT 274(2747) History of Modern Middle East in 19-20th Cent. " © (HA-AS)
For description, see NES 274.

## GOVT 282(2827) China and the World

 (also CAPS 282[2827]) © (CA-AS)Spring. 3 credits. A. Carlson.
Study of the dramatic rise of China through reviewing major developments in contemporary Chinese foreign policy since the establishment of the People's Republic of China (PRC), and concentrating more specifically on major developments in Chinese foreign policy during the 1980s and 1990 s. Such a wide-ranging survey of Chinese foreign policy involves not
only a consideration of the evolution of China's relations with its major hilateral partners but also an investigation of how China has defined its broader relationship with the international system. In addition, students are asked to consider which causal factors have been of primary importance in motivating Chinese behavior. (IR)

## GOVT 294(2947) Global Thinking © (KCM-AS)

Fall. 4 credits. H. Shue.
Existing nation-states face many challenges that cross their borders, including environmental degradation, international terrorism, and global market forces. This course considers the possibility and desirability of a world government. Students evaluate the practical achievability of different world-level political structures, paying particular attention to contemporary theories of international relations, and to related questions of social-scientific evidence. Students also evaluate the ethical status of potential world-level political structures evaluating the normative value of existing states compared to the likely dangers and benefits of several visions of world government. (IR)
[GOVT 302(3021) Soclal Movements in American Polltles (also AM ST 302[3021]) (HA-AS)
Fall. 4 credits. Next offered 2008-2009. E. Sanders.

Analyzing a variety of movements from the late 19th century to the present, this course seeks answers to the following questions: What social and political conditions gave rise to these movements? What determined success or failure (and how should those terms be defined)? How do social movements affect political processes and institutions (and vice versa)? What is their legacy in politics and in patterns of social interaction? The major movements analyzed are populism; progressivism; labor; socialism; women's suffrage, the contemporary gender equality movement; protest movements of the 1930 s; civil rights; SDS and antiwar movements of the 1960 s ; environmentalism; the 1980s antinuclear (weapons) movement; gay rights; and the new religious right. Some theoretical works are used, but most of the theoretical explorations are derived inductively, from studies of actual movements and the difficulties they faced. (AM)]
[GOVT 303(3031) Imagining America (also AM ST 326[3031], COM L 341[3410], FRLIT 324[3240]) (CA.AS)
Fall. 4 credits. Next offered 2008-2009.
D. Rubenstein.

For description, see AM ST 326.]
[GOVT 304(3043) Sex, Power, and Politics (also FGSS 304[3040]) (SBAAS)
Spring. 4 credits. Next offered 2008-2009. S. Martin.]
[GOVT 306(3063) Society and Party Politics (also SOC 307[3070]) (SBAAS)
Spring. 4 credits. Next offered 2008-2009. S. Van Morgan.

For description, see SOC 307.]
GOVT 307(3071) Introduction to Public Policy
Summer. 4 credits. S. Jackson
Public policy is shaped by many forces. This course will enhance your ability to understand
those forces and the policies that they produce. It will provide you with tools for thinking about, assessing, and evaluating those policies. And it will introduce you to the substantive core of several major issues in America today. The course will have three segments. In the first, we will examine the relevant institutions, interests, and ideologies which operate in the policy arena and the debates about the impact of these forces which engage students of the policy process In the second, we will consider two different lenses through which we might peer to evaluate policies. In the third, we will discuss the main lines of debate in contemporary American politics concerning four substantive issues: crime and punishment, education, the economy and foreign trade, and foreign policy. The course will meet four days a week for one hour. Based on assigned readings, the class sessions will mix lectures, discussions, group activities, and guest speakers.

## GOVT 309(3091) Science in the American Polity [also AM ST 389[3911], S\&TS $391[3911$ ]) (SBAAS)

Spring. 4 credits. Next offered 2008-2009. J. Reppy.

For description, see S\&TS 391.]

## GOVT 311(3111) Urban Politics (also AM ST 311[3111]) (SBA-AS)

Fall. 4 credits. M. Shefter.
The major political actors, institutions, and political styles in large American cities: mayors, city councils, bureaucracies, ethnic and racial minorities, urban machine politics and the municipal reform movement. The implications of these political forces for policies pertaining to urban poverty,
homelessness, and criminal justice.

## GOVT 312(3128) America's Changing Faces (also AM ST 301[3121])

Summer. 2 credits. Offered in Cornell in
Washington Summer Program. S. Jackson. A new generation of leaders has emerged in America's political, economic, educational and cultural institutions. Those leaders employ and explore in their work modern communications technologies such as the Internet. Thereby, they are changing both what is done, and how things are done in the respective life spheres. This course explores the resulting changes in the nature of American life and asks questions about the interactions among the different realms of life. (AM)

## GOVT 313(3131) The Nature, Functions,

 and Limits of Law (CA-AS)Spring. 4 credits. Prerequisite:
undergraduate standing. A. Riles. General education course for students at the sophomore and higher levels. Law is presented not as a body of rules but as a set of varied techniques for resolving conflicts and dealing with social problems. The roles of courts, legislatures, and administrative agencies in the legal process is analyzed, considering also the constitutional limits on their power and practical limits of their effectiveness. Assigned readings consist mainly of judicial and administrative decisions, statutes and rules, and commentaries on the legal process. Students are expected to read assigned materials before each class and to be prepared for participation in class discussion. (AM)

This seminar will look at the politics of incarceration. Why is prison construction a growth industry? What is the role of public policy and of the law in this process of prison expansion? How does race and racism in American society figure in this? Are women's prisons designed to respond to the needs of a "generic-male" prisoner or are they organized around women's needs? Are there "spaces" within the prison (educational programs, libraries, chaplain's offices) that alleviate the grim realities of prison life? We will devote a section of the course to reading about and discussing different forms of political activism on behalf of prison reform. Seminar members should plan on an occasional extra class time, likely to be Wednesday or Thursday evenings, to hear guest speakers and see films. (AM)

## [GOVT 316(3161) The American Presidency (SBA-AS)

Spring. 4 credits. Next offered 2009-2010. E. Sanders.]

## GOVT 318(3181) U.S. Congress (also AM ST 319[3181]) (SBA-AS)

Spring. 4 credits. M. Shefter.
The role of Congress in the American political system. Topics include: the political setting within which Congress operates, the structure of Congress, the salient features of the legislative process, and recent congressional behavior in a number of policy areas. (AM)

## [GOVT 319(3191) Racial and Ethnic Politics (also AM ST 313[3191], LSP 319[3191]) (SBA-AS)

Spring. 4 credits. Next offered 2009-2010. M. Jones-Correa.

In 1965 the landscape of American politics changed dramatically with the passage of the Voting Rights Act. That same year, Congress passed the Immigration Reform Act, which though little heralded at the time, arguably has had equally profound effects. This course provides a general survey of minority politics in the United States, focusing on the effects of these two key pieces of legislation. The course highlights the relationships between immigrants and minorities, electoral politics and protest politics, and between cooperation and competition within and among minority groups. The purpose of the course is not only to pinpoint the similarities and differences in the agendas and strategies adopted by minority groups, but to indicate the interaction between "minority" politics and American politics as a whole. (AM)]

## GOVT 321(3212) Public Opinion and Representation

Fall. 4 credits. P. Enns.
This course will examine the nature of public opinion and analyze when and how it influences government. Specifically, the class will study various definitions of public opinion, theories of opinion formation and change, and how public opinion influences government policy. We will also analyze public attitudes toward specific issues, such as race and welfare, and we will discuss normative questions, such as the role opinion should play in American democracy.

## [GOVT 329(3293) Comparative Politics of Latin America (also LAT A 329[3290]) © (SBA-AS)

Fall. 4 credits. Next offered 2008-2009 K. Roberts.]
[GOVT 330(3303) Politics of the Global North (also ILRIC 333[4330])
Fall. 4 credits. Next offered 2008-2009. L. Turner.

For description, see ILRIC 333. (CO)]

## GOVT 331(3313) Middle Eastern Politics

Spring. 4 credits. D. Patel.
This course provides an introduction to contemporary Middle Eastern politics. The goal is to provide students with historical background and theoretical tools to answer the following core questions: (1) Why do authoritarian political systems persist in the Middle East more than they do elsewhere? (2) Why have Islamist groups become prominent opposition forces in and across some countries? (3) Why do some Middle Eastern countries suffer from high levels of political violence while others are spared? (4) What accounts for the region's current economic underdevelopment? (5) Would the adoption of Western-style political institutions improve governance and stability in the region? The course explicitly compares outcomes and explanations within the region, between the region and other world areas, and over time.

## GOVT 332(3323) Modern European

 Politics (SBA-AS)Fall. 4 credits. H. Zimmermann.
This course offers an introduction into politics and political systems in Western Europe. It starts with a brief history of the consolidation of West European democracies before and after World War II. We .hen discuss core theoretical concepts guiding the comparative analysis of political systems. The main part of the course will consist of a discussion of the political cultures, parties, electoral systems, and current problems confronting the political systems of Britain, France, Germany, and Italy. Italy and Germany will be treated in-depth. Hotly debated issues in European politics will be presented by students in class and in a short research paper, before we conclude with an analysis of the European Union (EU) as political system. (CO)

## GOVT 336(3363) Postcommunist Transitions (SBA-AS)

Spring 4 credits. V. Bunce.
The focus of the course is on political and economic developments since the collapse of communism in the 28 states that make up Eastern Europe and Eurasia. Topics to be addressed include why democracy has developed in some countries, but not others in the region; differences in economic performance across the region; the role of the United States and the European Union in promoting democratic governance. The geographical focus will shift, depending upon the topic at hand.

## GOVT 338(3383) Comparative Political Economy (SBA-AS)

Spring. 4 credits. C. Way. Examines the juncture of politics and the economy in the advanced industrial democracies. Why do some countries have large, inclusive welfare states while others have minimal social programs? Is the welfare state in decline, and if so why? What difference does it make for the economy whether parties of the Left or Right govern? Are strong unions bad for the economy, or can they actually boost economic performance? What does increasing globalization of the world economy mean for the constraints and opportunities facing governments in managing the economy and
providing social welfare? Are all market economies pretty much the same, or are there varieties of capitalism that differ in important ways-and can they survive in the face of glohalization? This course uses a variety of theoretical perspectives to investigate these and other questions, paying particular attention to evaluating the theoretical arguments with both systematic and historical evidence. (CO)

## GOVT 339(3393) Political Economy of Development © (SBA-AS) <br> Fall. 4 credits. D. Moehler.

For description, see http://falcon.arts.cornell. edu/Govt.

## GOVT 341(3413) Modern European Society and Politics (also SOC 341[3410]) (SBA-AS)

Spring. 4 credits. S. Van Morgan
This survey course provides an
interdisciplinary overview of European affairs from the past to the present. Themes of the course will include, but will not be limited to, European political development from the 19 th century forward, political and economic integration, developments in the welfare states of Europe, party systems and elections, immigration and demography, culture and identity, foreign policy, the shifting roles of women, and the special challenges faced by Eastern Europe and Russia. A series of background and contextual lectures will be complemented by presentations delivered by leading Europeanists. (CO)

## [GOVT 342(3427) Germany and Europe

 (SBA-AS)Fall. 4 credits. Next offered 2009-2010. P. Katzenstein.]

## GOVT 343(3437) Politics of the European Union (SBA-AS)

Spring. 4 credits. H. Zimmermann. Despite recent bad feelings, the countries constituting the European Union (EU) still remain the most important partners for the United States in the world. And despite the rise of China and other Asian countries, the EU, together with the United States, still calls the tune in the international economy. However, even citizens of the European Union generally know very little about how this complex structure works. This course explores the policies and policy-making of the European Union against the backdrop of the postwar history of European integration and the institutional framework of the EU. Also considers the external dimension of the EU and explore current debates about the emerging European polity, in particular the European constitution. Throughout the course students reflect on parallels with the American political system and on the state of current transatlantic relations. (IR)
[GOVT 351(3513) Politics of South Asia (also GOVT 735[7353]) (SBA-AS)
Spring. 4 credits. Next offered 2009-2010. R. Herring.]

## [GOVT 354(3549) Capitalism, Competition, and Conflict in the Global Economy (SBA-AS)

Fall. 4 credits. Next offered 2009-2010. P. Katzenstein.

## GOVT 360(3605) Ideology (CA-AS)

Spring. 4 credits. D. Rubenstein
Focuses on critical approaches to the study of ideology in order to understand the role of ideology in political subject formation. After
an initial presentation of the classical Marxist texts on ideology, examines 20th-century reworkings of hegemony theorist Antonio Gramsci and the critical structuralist approaches of Roland Barthes, Jean Baudrillard and Dick Hebdige. Concentrates on the "lived relation" to ruling ideas in the form of ideologies of everyday life. The second part of the course is clevoted to psychoanalytically oriented theories (Freud, Lacan) which address the internalization of belief, both in relation to the intrapsychic and in the interaction between p.yychic and state apparatuses. Concludes with Louis Althusser's notion of interpellation, which resumes the Marxist, structuralist and psychoanalytic objectives of the course material. The theorists in the second part of the course are contextualized within the experience of the historical traumas of fascism and French decolonization. Throughout the semester, students reflect on the continued relevance of historic ideologies, centered around notions of class interest, to late 20 th-century ideologies' attachments to national, religious, gendered, ethnic, technological identity. (PT)

## GOVT 361(3615) Liberalism and Its <br> Critics \# (KCM-AS)

Fall. 4 credits. B. Hencrix.
The term "Liberalism" refers to a broadly allied set of political theories and practices that focus on maximizing individual liberty, generally through the protection of personal rights. This course will consider both competing views within the liberal tradition, and challenges made by those outside it. The course begins with the historical origins of liberalism in European religious wars and changing coalitions of power, and moves forward through its major theorists (including Thomas Hobbes, John Locke, and John Stuart Mill) to the present day. We will then consider a variety of objections to liberalism, ranging from the very old (lodged by Plato) to the contemporary (by for example Michael Sandel and Michel Foucault). ( P H )

## GOVT 363(3633) Politics and

Culture (also SOC 248[2480]) (HA-AS)
Spring. 4 credits. M. Berezin.
For description, see SOC 248. (CO)

## GOVT 364(3645) Politics of "Nations

 Within" (also AIS 364[3640]) (SBA-AS)Spring. 4 credits. B. Hendrix. This political theory course will consider the political status of Native Americans in the United States, as well as the status of indigenous peoples in Canada, Australia, and New Zealand. We will begin with brief overviews of native peoples in the countries considered, with special attention to the history of their interactions with the states that now rule them, and their contemporary legal status. The course will consider the ideologies used to justify conquests and displacements by European colonists, particularly as illustrated in historical works of political theory and key court cases. The latter half of the course will consider the possible futures of these "nations within" by considering normative arguments about assimilation, cultural rights, treaty federalism, and full sovereign statehood. (PH)

GOVT 366(3665) American Political Thought from Madison to Malcolm X (also HIST 316[3160], AM ST 376[3665]) \# (HA-AS)
Fall. 4 credits. Next offered 2009-2010. I. Kramnick.

Survey of American political thought from the 18 th century to the present. Particular attention is devoted $t 0$ the persistence of liberal individualism in the American tradition. Politicians, pamphleteers, and poets provide the reading. Insightful historical and social context is offered.]

## GOVT 368(3685) Global Justice (also PHIL 347[3470]) (KCM-AS)

Spring. 4 credits. R. Miller.
For description, see PHIL 347

## GOVT 370(3705) Political Theory and Cinema (also GERST 355[3550], COM L 330[3300], FILM 329[3390])

Spring. 4 credits. G. Waite.
For description, see GERST 355.

## [GOVT 375(3755) Visual Culture and

 Social Theory (CA-AS)Fall. 4 credits. Next offered 2009-2010. S. Buck-Morss.J

## GOVT 383(3837) The Cold War (HA-AS)

Spring. 4 credits. M. Evangelista During more than four decades following the end of World War II international politics was dominated by a phenomenon known as the Cold War. This class examines the origins, course, and ultimate demise of this conflict that pitted the United States and NATO against the Soviet Union and its allies. It seeks to evaluate the competing explanations that political scientists and historians have put forward to explain the Cold War by drawing on the new evidence that has become available. The course considers political, economic, and strategic aspects of the Cold War, including the nuclear arms race, with particular focus on the link between domestic and foreign policy in the United States and the Soviet Union. The course emphasizes writing, and includes a final research paper for which students will use original archival materials.

## GOVT 385(3857) American Foreign Policy

 (also CAPS 385[3857]) (SBA-AS)Fall. 4 credits. P. Katzenstein
Introduction to several aspects of U.S. foreign policy, emphasizing current concerns and organized in terms of several principal functions and regions of interest to U.S foreign policy. Examines theories of foreign policy as well as specific historical/ contemporary cases. This course has three basic goals: (1) to familiarize students with the importance of theory for describing, understanding, and explaining foreign policy decision making behavior; (2) to sensitize students to the complex constraints under which foreign policy is made, the margins of choice that statesmen have in shaping policy, and the intended and unintended
consequences shat a chosen policy has on international as well as domestic life; and (3) to help students develop a critical, in-depth understanding of some of the foreign policy issues that face the United States today and to encourage them to think creatively about alternatives. (IR)

GOVT 386(3867) The Causes of War (SBA-AS)
Spring. 4 credits. C. Way.

Surveys leading theories of the causes of interstate war-that is, large-scale organized violence between the armed forces of states. Why is war a recurring feature of international politics? Are democracies more peaceful than other types of states, and if so what explains this "democratic peace"? Why do democratic publics seem to reward threats to use force by "rallying around the flag" in support of their governments? Does the inexorable pattern of the rise and fall of nations lead to cycles of great power wars throughout history? These and other questions are examined in this survey of theories of war at three levels of analysis: the individual and small groúps. domestic politics, and the international system. Topics include: theoretical explanations for war; evaluation of the evidence for the various explanations; the impact of nuclear weapons on international politics; ethics and warfare; the uses and limitations of air power; international terrorism. (IR).

## GOVT 389(3898) International Law (HA-AS)

Fall. 4 credits. Taught in Washington, D.C. and Ithaca Campus
Is international law a pious delusion, helpless in the face of real power? Or is public policy becoming so entangled in international standards that international law is now eroding national sovereignty? This course surveys the theoretical foundations and general history of international law since the 17 th century to highlight what is new in the doctrines and institutions by which it operates in the contemporary world. The course gives special attention to the relation between international and U.S. law and to the workings of international law in particular fields-including environmental and human rights protection, trade regulation, and control of terrorism. (IR)

## GOVT 393(3937) Introduction to Peace Studies (SBA-AS)

Fall. 4 credits. M. Evangelista. This course serves as an introduction to the study of war, peace, and peacemaking. We will study different theories of peace and war from a variety of disciplinary perspectives. The course will cover definitions of peace and war, causes of conflict, and modes of conflict prevention and resolution. The concepts will be applied to a range of historical and current conflicts. Students will prepare analyses of specific conflicts or instances of peacemaking for class presentation. (IR)

## GOVT 404(4041) American Political Development in the 20th Century (also AM ST 404[4041], GOVT 612[6121]) (HA-AS)

Fall. 4 credits. E. Sanders
This course examines the growth and change of the American national state from the early 20th century to the present. It is concerned with the responses of the national government to changes and pressures originating in society, economy and the international distribution of power, as well as the state's effect on society, market and work politics. We will explore pluralist, class-based, statecentered and other approaches in an effort to see which provides a better explanation for the rise (and contraction) of the national state in three main arenas: economic regulation, social welfare and rights; and national security

[^0]Examines the presidencies of Reagan G. H. W. Bush, Clinton, and G. W. Bush in relation to what scholars have called "the postmodern presidency." While this term has been used by institutionalist students of the presidency as a periodizing hyporhesis, this course emphasizes the work of cultural critics and historians. Addresses the slippage between fact and fiction in cinematic and popular representations of the presidency (hiography, novels, television). The construction of gender normativity (especially masculinity) is an attendant subtheme. The postmodern presidency is read as a site of political as well as cultural contestation. The larger question of this approach to the presidency concerns the relationship between everyday life practices and citizenship as well as the role of national fantasy in American political culture today. (AM)
[GOVT 406(4061) Politics of Slow-Moving Crisis (also GOVT 616[6161), AM ST 406/616[4061/6161]) (SBA-AS)
Fall. 4 credits. Next offered 2008-2009. M. Jones-Correa.]

## GOVT 414(4142) Causes and

 Consequences of U.S. Foreign Policy (SBA-AS)Spring. 4 credits. E. Sanders.
How can we characterize the 20 th/21stcentury legacy and continuing impact of U.S foreign policy on the world? What forces domestic, international, institutional, electoral, economic, cultural, or personal-drive U.S foreign policy? These are the broad questions to be addressed this semester.

## [GOVT 423(4231) The 1960s:

Conceptualizing the Future from the Past (also AM ST 425[4231]) (CA-AS)
Fall. 4 credits. Next offered 2008-2009.
J. Kirshner and T. Lowi.

The decade of the 1960 s was a genuine sea change in American history. 1968 was its culmination and remains its symbol. Politically it was the end of the great Roosevelt Revolution and Democratic party hegemony, the end of consensus on rights, the end of liberalism, and the end of world bipolarity. It was also the end of American economic sovereignty. And it was the end of the arts as pure entertainment. Was it the end of everything? What was the response to " 1968 "? Cultural as well as political and economic phenomena must be explored. The seminar divides neatly and naturally between ends and beginnings. (AM)]

## GOVT 424(4241) Contemporary American Politics (also AM ST 424[4241], GOVT 629[6291]) (HA-AS)

Spring. 4 credits. M. Shefter.
Seminar analyzing some major changes in U.S electoral and group politics in recent decades Topics include: partisan realignment, the new conservatism, racial cleavages, "identity politics," and clemocratic decline

## GOVT 426(4264) Social Movements in Latin America

Fall. 4 credits. K. Roberts.
This course analyzes different types of historical and contemporary social movements in Latin America. It hegins with an overview of class-based labor and peasant movements; including their relationships with populist or leftist political parties. The class will then study revolutionary movements and the social actors that participate within them. The second half of the course will focus on various "new" social movements that have
altered the region's social and political landscape over the past twenty years, including movements organized around gender issues, human rights, environmental protection, shantytown communities, and indigenous rights. Special attention will be given to the construction and transformation of collective identities, and to new patterns of social protest in response to market globalization in the region

GOVT 428(4281) Government and Public Policy: An Introduction to Analysis and Criticism (also AM ST 428/628 [4281/6281], GOVT 728[7281]) (SBA-AS)
Fall. 4 credits. T. J. Lowi.
Concentrates on history and criticism of U.S policies and the politics associated with them. Particular attention is given to the origins and character of the regulatory state and the welfare system. (AM)

## GOVT 431(4313) Model European Union I

 Fall. 2 credits. Staff.For description, see GOVT web site.

## GOVT 432(4323) Model European Union II

Spring. 2 credits. Staff.
For description, see GOVT web site
[GOVT 458(4585) American Political Thought (also GOVT 658[6585], AM ST 458[4585]) (HA-AS)
Spring. 4 credits. Next offered 2008-2009 J. Frank.

Seminar providing an advanced survey of the history of American political thought, with emphasis placed on four significant periods Puritan New England, the Revolution and Founding, Abolition and Civil War, and the Progressive Era. Authors read may include Winthrop, Hutchinson, Franklin, Paine, Jefferson, Madison, Warren, Tocqueville, Fitzhugh, Calhoun, Douglas, Garrison, Thoreau, Melville, Whitman, Lincoln, Adams, DuBois, Goldman, Dewey, Lippmann, Taylor, and Bourne. ( PT )]

## GOVT 461(4616) Interpreting Race and Racism: DuBois (also AM ST 461(4616])

Spring, 4 credits. A. M. Smith.
This seminar is an advanced undergraduate course based on classic and contemporary social and political theory texts. We will explore the historically specific and antagonistic construction of race, and we will focus on the complex and contradictory ways in which racializing formations are defined in terms of class, gender and sexuality. For the spring 2008 version of the course, we will focus on the works of W.E.B. Du Bois. Seminar participants should have already completed GOVT 161 or GOVT 319 or equivalent courses in other departments before the course begins. Class size will be limited, and seniors who have satisfied the prerequisite course work will be given priority. To apply for admission, please contact the instructor

## GOVT 462(4625) Sexuality and the Law (also GOVT 762[7625], FGSS 461/762[4610/7620], AM ST 460/660[4625/6625]) (KCM-AS)

Spring. 4 credits. A. M. Smith
Advanced feminist theory/political theory/ queer theory/legal theory seminar for graduate students and law students. Deals first with theoretical approaches to sexuality that build on and interrogate the post-structuralist
approach that defines sexuality as a social construction, rather than an expression of ahistorical instincts. Explores a series of major legal and political issues: the right to privacy with respect to contraception and abortion; the restriction of abortion rights; the exclusion of homosexual sodomy from the practices protected by the right to privacy; the racial regulation of marriage; same-sex marriage; Fineman's "sexual family" critique of family law; the moral regulation of poor women in early welfare law; the sexual regulation of poor single mothers in contemporary welfare law; the question of suspect class status for lesbians and gay men; and homosexuality and military service. Throughout the course, students examine the extent to which sexuality is constructed in articulation with gender, class and racé differences. The reading list includes theoretical works (Foucault, Butler, Cohen and Martin), Supreme Court decisions; and critical commentaries by feminist legal theorists. (PT)

## GOVT 463(4635) Feminist Theory/Law and Society (also AM ST 459[4365]) (CA-AS)

Spring. 4 credits. A. M. Smith.
Feminist theory presents unique challenges to the student of politics interested in State structures, legal systems, and public policy. While liberal democratic state theory takes for granted the separation between the "private" and "public" spheres, feminist theory submits that distinction to a thorough interrogation. Feminists also insist that the "personal is political." An individual woman might decide to use contraception or to practice safer sex in a highly intimate context, but feminist theory brings to light the fact that social movements, cultural trends, changes in the health care field, governmental agencies, and legal doctrine have set the stage for that personal decision. Feminist theory is therefore situated in a privileged position to shed new light on some of the most interesting issues in contemporary politics, such as same-sex marriage, abortion, the HIV and AIDS epidemic, stem cell research, access to health care, discrimination in the workplace, and poverty policy. In this seminar we will explore feminist theory's interrogation of State theory. We will pay particularly close attention to the feminist theory that explores the intersection between racism and sexism in America today. (PT)

## GOVT 464(4646) Theories of Empire (also GOVT 678[6786])

Spring. 4 credits. L. Maxwell.
"Empire" has reemerged in recent years as a potent political concept, both in popular political life and debates in contemporary political theory. In this class, we will ask: what kind of domination or form of rule is empire and why is it a continuing trope in human political life? To answer these questions, we will examine the changing concept of empire in ancient Roman, modern, and contemporary political thought. What have theorists been trying to capture when they call something "empire" and how has it changed and shifted in each epoch? We will also consider the entanglement of enlightenment concepts of freedom, equality, and democracy with imperial practices. How have imperial concepts and practices shaped our democratic aspirations to freedom and equality? Did imperialism corrupt Enlightenment aspirations, or were these aspirations haunted by imperialism from within? Readings include
texts by ancient Roman historians such as Livy, Tacitus, and Sallust, by modern political thinkers such as Burke, Mill, and Montesquieu, and by 20th century and contemporary theorists such as Hardt \& Negri, Hannah Arendt, Richard Tuck, and James Tully.

## GOVT 466(4665) Islamism (also NES 453[4553]) @

Fall. 4 credits. Prerequisite: graduate students or juniors and seniors who have taken GOVT 161 or 300 -level course in political theory. S. Buck-Morss.
In the past five years, there have been important contributions in critical theory by writers from a Muslim perspective, dealing with issues of globalization, the society of the spectacle, post-colonialism, feminism, and commodity culture. This course is intended to introduce students to the complexities of Islamism as a modern discourse of opposition that deals with issues of social justice, legitimate power, and ethical life. Because the literature is part of the partisan debates, attention is given to the political and theoretical presuppositions embedded in the very concepts of "Islamism" and the "West," and how the struggle to define them challenges the meanings of "modernity," "democracy," "universal rights," and "liberation." Emphasizing the wide diversity of Islamic discourse, we will read original sources by Reverend Louis Farrakhan, Ayatollah Ruhallah Khomeini, Muhammad Iqloal, Osama bin Laden, Ustadh Mahmoud Taha, Sayyid Quth, and Ali Shar'iati, and commentaries by academic scholars, including Talal Asad, Asma Barlas, Hamid Dabashi, Faisal Devji, Roxanne Euben, Saha Mahmood, Bobby Sayyid, and others. As the major experiment in founding an "Islamist Republic," Iran will be a focus. Themes will include Islamism and feminism, Islamism and cinema, Islamism and diaspora culture, American Islam, the Sunni-Shia divide.

## [GOVT 47014705] Contemporary Reading of the Ancients (also FREN 470[4700], COM L 475[4750]) (CA-AS) <br> Fall. 4 credits. Graduate students welcome

to enroll. Next offered 2009-2010.

## D. Rubenstein.

Focuses on Derrida's reading of Plato and St. Augustine. Begins with Derrida's close reading of Plato's Phaedrus and traces his conceptual adumbration of the pharmakon to other critical and philosophical scenes: addiction and terrorism. The next textual encounter is between St. Augustine's Confessions and Derrida's Circonfession. Considers the questions of national and religious identity in relation to other Derridean texts such as Monolinguism of the Other. Returns to conclude with Plato's Apology, Crito and Pbaedo, read in tension with Derrida's last extended interview, his writings on death and the death penalty. Throughout the seminar students explore Derrida's conceptual interrogation of globalization, citizenship, hospitality, friendship, pedagogy, eros and death. (PT)
[GOVT 471(4715) Critical Reason, The Basics: Kant, Hegel, Marx, Adorno (also GERST 471[4710]) (KCM-AS)
Fall. 4 credits. Next offered 2009-2010. S. Buck-Morss.

This course deals with basic concepts and methods of Critical Theory from Kant to Adorno. Lectures will consider philosophy from the perspective of the political,
demonstrating how autonomy, freedom, democracy, and law are approached by the following: critical reason, dialectics, materialist epistemology, and the socio-logics of nonidentity. Students will tackle difficult primary texts in this cradition, with the goal of enhancing their own critical capacities to analyze political, social and economic life. (PT)]

## GOVT 473(4735) Marx, Freud, Nietzsche (also GERST 415 [4150], COM L 425[4250]) (CA-AS] <br> Fall. 4 credits. G. Waite.

## For description, see GERST 415.

## GOVT 480(4809) Politics of '70s Fllms

 (SBA-AS)Spring. 4 credits. J. Kirshner.
The ten years from 1967 to 1976 were an extraordinary time both in the history of American politics and in the history of American film. In the same period that the country was rocked by the Vietnam War, the feminist and civil rights movements, Watergate and economic crisis, the end of Hollywood censorship along with demographic and economic change in the industry ushered in what many call "the last golden age" of American film. In this class we study both film theory and political history to examine these remarkable films and the political context in which they were forged. The goal of the course is to take seriously both the films and their politics. (AM or PT)

## GOVT 482(4827) Unifying While Integrating: China and the World (also GOVT 682[6827]) (HA-AS)

Fall. 4 credits. A. Carlson.
Seminar intended to examine the increasingly complex relationship that has evolved between China and the rest of the international system during the 1980s and 1990s. Emphasizes the interrelated, yet often contradictory, challenges facing Beijing in regard to the task of furthering the cause of national unity while promoting policies of integration with international society and interdependence with the global economy. Concentrates especially on ongoing controversies over the rise of Chinese nationalism and the persistence of "minority nationalism" in many regions within China. (IR)

## [GOVT 483(4837] The Military and New Technology (also S8TS 483[4831]) (SBA-AS)

Spring. 4 credits. Next offered 2008-2009. K. Vogel.

For description, see S\&TS 483.]

## GOVT 487(4877) Asian Security (also CAPS 487[4870], GOVT 687[6877]) © (SBA-AS)

Fall. 4 credits. A. Carlson.
Throughout the 1990s it has been part of the conventional wisdom of international relations scholarship that Asia was, in the words of Aaron Friedberg, "ripe for rivalry." In this seminar we explore the accuracy of such an assessment through studying Asia's historical and contemporary security situation. Such an examination will be oriented toward introducing students to the main security issues confronting Asia, alongside an exploration of the extent to which competing explanations drawn from different strands of IR theory and the security field can explain such issues. In addition, we will ask students to challenge the limitations of traditional
security studies through considering the importance of new actors and issue areas within the region. In short, while the Seminar will have a regional focus on East Asia, it will be framed within the broader literature of the field.

## GOVT 491(4917) Ethics in International Relations (KCM-AS)

Spring. 4 credits. M. Evangelista This course, examines current and historical issues in international relations from the perspective of international law, norms, and ethics. We develop general principles and concepts, such as "just war," "national interest and "human rights," and apply them to realworld situations. Most of the focus of the course is on particular cases that involve legal and ethical issues; violations of human rights and genocide; war crimes; military intervention; economic sanctions;
environmental degradation; economic injustice. The first part of the course examines these issues using examples from 20th century international affairs, including recent events. The second part focuses on current issues that pose ethical problems for the foreign policy of the United States: internal violence and human rights abuses in the former Yugoslavia and former Soviet Union; indigenous uprisings in Mexico and their relation to U.S. foreign economic policy; the appropriate U.S. response to situations in countries such as Haiti, Nigeria, and China

## COVT 494(4949) Honors Seminar: Thesis Clarification and Research

Fall. 4 credits. Prerequisite: acceptance into honors program. M. Katzenstein. Designed to support thesis writers in the honors program during the early stages of their research projects.
GOVT 495(4959) Honors Thesis: Research and Writing
Spring. 4 credits. Prerequisite: successful completion of GOVT 494.

## GOVT 499(4999) Undergraduate Independent Study

Fall or spring. $1-4$ credits.
One-on-one tutorial arranged by the student with a faculty member of his or her choosing. Open to government majors doing superior work, and it is the responsibility of the student to establish the research proposal and to find a faculty sponsor. Applicants for independent study must present a welldefined program of study that cannot be satisfied by pursuing courses in the regularly scheduled curriculum. No more than four credits of independent study may count toward fulfillment of the major. Students who elect to continue taking this course for more than one semester must select a new theme or subject each semester. Credit can be given only for work that results in a satisfactory amount of writing. Emphasis is on the capacity to subject a body of related readings to analysis and criticism. Keep in mind that independent study cannot be used to fulfill the seminar requirement. The application form for independent study is available in 210 White Hall and must be completed at the beginning of the semester in which the course is being taken.

GOVT 500(4998) Polltics and Policy: Theory, Research, and Practice (also AM ST $501[4998]$, CAPS 500[5000], PAM 406[4060], ALS 500[4998])
Fall, spring. Offered in Cornell in
Washington Program.
This required course forms the core of the Cornell in Washington program for students in the public policy option. The central course objective is to provide students with the instruction and guidance necessary to analyze and evaluate their own chosen issue in public policy. Toward that end, the course has three components: (1) weekly lectures providing background on the structures and processes of national politics and policy as well as training in research methodology; (2) student externships; and (3) individual research papers or projects. All three components interrelate so as to provide students with a strategy and framework for integrating classroom based learning, field experience and individual research.

## GOVT 601(6019) Methods of Political Analysis I

Fall. 4 credits. Staff,
The first half of this course examines how to frame, evaluate, and compare empirical explanations in political science. Introduces several theoretical approaches that have been widely applied in political science research, including rational choice, social mechanisms, and functionalism. Students discuss the differences between explanation and description, emphasizing the idea of experimental manipulation. Building on this general discussion, the second half explores the distinctive methodological issues involved in comparing macro-social units and surveys a range of different approaches to comparative analysis.

## GOVT 602(6029) Methods of Political Analysis II

Spring. 4 credits. P. Enns.
This course will introduce students to some basic methods for conducting quantitative analyses in political science. After taking this course, students will be able to read and critique political science research that uses basic statistical analyses as well as be able to use basic statistical techniques, such as multiple regression analysis, in their own research. The course will begin with basic probability theory and proceed to statistical analysis of political data.

## GOVT 603(6031) Field Seminar in American Politics

Spring. 4 credits. E. Sanders
Introduces the major issues, approaches, and institutions of American government and the various subfields of American politics. Focuses on both substantive information and theoretical analysis. (AM)
[GOVT 605(6053) The Comparative Method in International and Comparative Politics
Spring. 4 credits. Next offered 2008-2009. K. Roberts.

An in-clepth, graduate-level introduction to qualitative and comparative methods of political analysis, with special emphasis on the application of these methods in comparative and international politics. Through readings, discussions, and written assignments, students will explore strategies for concept formation, theory construction, and theory testing, using the craft and tools of comparative political analysis.]

## GOVT 606(6067) Field Seminar in

 International RelationsFall. 4 credits. M. Evangelista and J. Kirshner.

General survey of the literature and propositions of the international relations field. Criteria are developed for judging theoretical propositions and are applied to the major findings. Participants are expected to do extensive reading in the literature as well as research. (IR)

## GOVT 607(6075) Field Seminar in

 Political ThoughtSpring. 4 credits. I. Kramnick. A survey of the early modern political theory canon, emphasizing texts and writers from the 17 th and 18 th centuries. (PT)

## [GOVT 610(6101) Political Identity: Race, Ethnlcity, and Nationalism

Fall. 4 credits. Next offered 2008-2009. M. Jones-Correa

The social sciences generally treat ethnicity, nationalism, and race as descriptive categories or variables, while avoiding actually defining these categories or thinking about how they should be used. How should we go about describing ethnicity, nationalism, and race? Should we treat them as primordial or as social constructions? Much of the recent literature suggests the latter. If constructed, by whom are they constructed (or by what)? What constrains/structures these constructions? What purposes do these constructions serve? Whom do they serve? Are some constructions better representations of identity than others, and what does this mean? How should we go about applying these categories in political analysis? (AM)]

## GOVT 612(6121) American Political Development in the 20th Century (also AM ST/GOVT 404[4041])

Fall. 4 credits. E. Sanders.
For description, see GOVT 404.

## GOVT 614(6142) Causes and

 Consequences of U.S. Foreign PolicySpring. 4 credits. E. Sanders.
For description, see GOVT 414.
[GOVT 615(6151) State and Economy in Comparative Perspective
Spring. 4 credits. Next offered 2008-2009.
R. Bensel:

Reviews the extensive literature on the political economy of comparative state formation, economic development, and institutional change. Topics include warmaking and state expansion, regime evolution and modernization, and market processes and class transformation. The focus ranges from the micro-economic foundations of political choice through the grand historical forces that have shaped the contemporary world economy. Although much of the reading and discussion focuses on European cases, the limits of this experience as a theoretical model for the remainder of the world also are considered. (AM)]

## GOVT 620(6202) Polltical Culture (also AM ST 620[6202])

Fall. 4 credits. R. Bensel
This graduate course will explore the relationship between popular belief, political action, and the institutional deployment of social power. The class will be roughly divided in three parts, opening with a discussion of the material foundations of cultural ideation in socio-economic "practice." The middle section will connect ideation to
political ideology, including symbolism and group identity. The last portion of the course will consider the impact of both cultural ideation and political ideology on institutional structure and legitimation. This section will also trace how political regimes can influence, coming full circle, to the material foundations of cultural ideation.

## GOVT 628(6264) Social Movements in

 Latin AmericaFall. 4 credits. K. Roberts.
For description, see GOVT 426.

## [GOVT 627(6274) People, Markets, and

 DemocracySpring. 4 credits. Next offered 2009-2010. C. Anderson.

Examines the relationship between the economy and democracy. Focuses on behavioral political economy in democratic or democratizing countries. Major topics include inequality and democratic performance.]

## GOVT 629(6291) Contemporary Amorican

 Politics (also OOVT 424[4241])Spring. 4 credits. M. Shefter
For description, see GOVT 424. (AM)

## OOVT 63016301) Institutions (aiso AM 8 T 630[6301])

Fall. 4 credits. R. Bensel.
This graduate course will explore the ways in which institutional rules shape the conduct and outcome of politics as collective decisionmaking and deliberation. The focus will be primarily on the United States Congress where the literature on institutional design and structure is both comprehensive and deep. Subordinate sections of the course will cover the general literature on theories of institutional formation and influence over politics, as well as briefly addressing law and judiciaries in order to broaden the sampling of specific cases and applications.

## [GOVT 634(6349) Now Life Scionces: Emorging Technologles, Emerging Politics (also SeTs 645[6451])

Fall. 4 credits. Next offered 2009-2010. J. Reppy.

For description, see S\&TS 645.]

## GOVT 635(6353) Field Seminar In Comparative Politics

Spring. 4 credits. C. Anderson. This course provides an introduction to comparative politics, introducing students to classic works as well as major recent contributions to the field. Topics to be covered include the comparative method, democratic institutions, political culture, modernization theory, ethnicity, economic development and contentious politics. The course will require extensive reading and assignments will include several review papers. (CO)

## GOVT 639(6393) Comparative Political Particlpation

Spring. 4 credits. S. Martin and D. Moehler. This course is concerned with understanding how and under what conditions citizens seek to influence political elites through use, expansion, circumvention or subversion of existing channels of political participation. Cases from a variety of institutional contexts over time will be used to examine how mediating institutions diminish and/or exacerbate social inequalities in the exercise of political voice. We will consider how observations from other cultural contexts challenge dominant paradigms within

American political science that shape how we think about political participation.

## GOVT 641(6413) Revitallizing Labor: A Comparative Perspective (also ILRIC 632[6320]) <br> Spring. 4 credits. L. Turner.

For description, see ILRIC 632.

## [GOVT 642(6423) Feminist Methodology

 (also FGSS 617[6170])Spring. 4 credits. Next offered 2008-2009. S. Martin.

For description, see FGSS 617.]

## GOVT 652(6523) Political Culture

Spring. 4 credits. D. Patel.
This research seminar surveys the study of political culture. The course is designed to assess the strengths and weaknesses of various approaches that seek to account for the influence of culture on economic and political behavior and institutions, and to account for shifts in culture over time. A wide range of methodological approaches within political science are examined, as well as approaches from anthropology, sociology, and economics. Applications include ethnicity and identity, conflict, regime type, and economic growth. The focus is on how rationalist and institutionalist approaches ignore or incorporate political culture through choice, coordination, and common knowledge.

## ©OVT 657(6573) Comparative

 DemocratlizetionFall. 4 credits. D. Moehler.
This course compares recent democratization in Africa, the post-communist world, Latin America, Asia and southern Europe. We will focus on both transitional dynamics and the quality and sustainability of democracy and the relationship between nationalism and democracy, economic reform and democracy, and economic performance and democratic governance.
[COVT 658(6585) American Political Thought (also GOVT/AM ST 458[4565])
Spring. 4 credits. Next offered 2008-2009. J. Frank.

For description, see GOVT 458.]

## [OOVT 659(6595] Ethics and Cultural Difference

Spring. 4 credits. Next offered 2008-2009. B. Hendrix.]
[GOVT 660(6603) States and Social Movoments (also SOC 660[6600])
Spring. 4 credits. Next offered 2008-2009. S. Tarrow.

Two traditions run parallel in political sociology and comparative politics: the study of statebuilding and state transformation and the study of social movements and contentious politics. In the 1960 s and 1970 s , they converged in the work of scholars like Charles Tilly, who advanced both fields of study, which then ran along parallel but largely independent tracks. This course seeks to synthesize the two traditions, drawing on both historical and contemporary materials from Europe and the Third World, and searching for the key mechanisms and processes that link forms of contention to processes of statebuilding and state transformation. (CO)]

## [OOVT 661(6615) Secession,

 Intervention, and Just-War TheorySpring. 4 credits. Next offered 2009-2010. B. Hendrix.

This course examines philosophical viewpoints on secession, military intervention, legitimate reasons to go to war, and justice in prosecuting wars. Roughly the first half of the course will focus on the discussion of secession, while the second half will investigate intervention and war. Central texts include Allen Buchanan, Secession; David Miller, On Nationality; and Michael Walzer, Just and Unjust Wars.]

## [GOVT 662(6625) Field Seminar in

 Political TheoryFall. 4 credits. Next offered 2008-2009. J. Frank.

Introduces students to several contemporary approaches to political theorizing, with an emphasis placed on different modes of interpretation. Authors read may include: Althusser, Arendt, Butler, Foucault, Habermas, Kristeva, MacIntyre, Skinner, Strauss, Taylor, Wolin, and Zizek. (PT)]

## [GOVT 664(6645) Democratic Theory

 (also AM ST 664[6645])Fall. 4 credits. Next offered 2008-2009. J. Frank.

In contemporary political contexts "democracy" is often invoked as the very ground of political legitimacy. There is very little agreement, however, on what democracy means or how it is best embodied in state institutions and law. This seminar will introduce students to select debates in contemporary democratic theory over the normative meaning of democracy and the limitations of contemporary democratic practice. Beginning with the work of Rousseau and ending with debates over "radical democracy," we will explore the following themes: How do democratic theorists and democratic actors negotiate the paradoxes of collective self-rule? What is the relationship between liberalism and democracy? Do rights suspend democracy or establish its preconditions? What are the best procedures for democratic decision-making? How does democracy deal with difference? Is democracy best understood as a form of government or a practice of resistance to domination? (PT)]

## [GOVT 666(6665) Media Theory: Flim and

 Photograph (also VISST 666[8466])Spring. 4 credits. Next offered 2009-2010.

## D. Rubenstein.]

## COVT 668(6685) Normative Political Theory

Fall. 4 credits. B. Hendrix.
This course will focus on normative approaches to political theory, beginning with the questions of what morality consists in and why (or whether) it might be binding on us. Authors read in this part of the course include Plato, Hume, and Kant. The course will then consider specific topics within normative theory, such as the question of whether individuals have obligations to obey political authority and what the moral status of property ownership and economic inequality might be. Authors read in this portion of the course include John Simmons, Michael Walzer, and G.A. Cohen.

## [GOVT 669(6695) Modern Soclal Theory I <br> Spring. 4 credits. Next offered 2008-2009.

S. Buck-Morss.

Topics vary. (PT)]

GOVT 670(6705) Modern Social Theory II
Fall. 4 credits. S. Buck-Morss
In fall 2007, we will read Walter Benjamin's Arcades Project. We will approach the text as a materialist philosophy of history with a political intent, paying special attention to the work of social theorists whom he cites in the project: Karl Marx (dreamworlds), Georg Simmel (urban life), Charles Fourier (communism), St-Simonians (industrial utopia) Bakunin (revolution) and Claire Démar (feminism).Advanced seminar, not recommended for undergraduates.

## [OOVT 677(6775) Language and Politics

Spring. 4 credits. Next offered 2008-2009. J. Frank.

This course explores the "linguistic turn" of recent political theory alongside canonical debates over the political and epistemological consequences of different philosophies of language. Writers examined will include Locke, Rousseau, Nietzsche, Wittgenstein, Austin, Derrida, Butler, and Cavell.]

## COVT 678(6786) Theorles of Empire (also GOVT 464[4646]) <br> For description, see GOVT 464

## [GOVT 681(6817) Politics of Transnationalism (also SOC 680[6800])

Spring. 4 credits. Next offered 2008-2009.
M. Evangelista and S. Tarrow.

Globalization and internationalization are giving rise to a new area of international studies that examines the interactions of civil society actors with one another, with states, and with international institutions. This course traces the development of this area of research from its origins in the "old" transnational politics; examines the contributions of constructivism, liberal internationalism, and state-centered realism, and focuses on four areas of transnational politics: norm formation, the construction of transnational coalitions, the effects of transnational advocacy networks, and whether there is a growing fusion between international and domestic contention. (IR)]

## OOYT 682(6827) Unifying While

 Integrating: China and the World (also GOVT 4824827])Spring. 4 credits. A. Carlson.
For description, see GOVT 482.

## QOYT 685(6857) International Political

 EconomyFall. 4 credits. P. Katzenstein. Exploration into a range of contemporary theories and research topics in the field of international political economy. The seminar covers different theoretical perspectives and a number of substantive problems. (IR)

## GOVT 887(8877) Asian Security

For description, see GOVT 487

## [GOVT G88(6887) Political Economy and Mational security

Spring. 4 credits. Next offered 2009-2010. J. Kirshner.

This seminar considers the relationship between economics and national security Specific topics will change from year to year, but will typically include the following: the economic foundations of power, economic coercion, the economic roots of conflict, and the ways in which structural changes in the international economy shape and limit state authority. (IR)]
[COVT 689(6897) International Security Polltics
Spring, 4 credits. Next offered 2008-2009. C. Way.

Examines a variety of international relations theories in studying a broad range of security issues, including the causes of war, alliance formation, balance-of-power politics, security regimes, nuclear and conventional deterrence, the democratic peace, military strategy, international terrorism, and domestic constraints on the use of force. Uses a variety of theoretical perspective to investigate these and other issues, paying particular attention to evaluating the theoretical arguments with both historical and systematic evidence. (IR)]

## GOVT 691(6917) Normative Issues in IR

Fall. H. Shue.
Examines selected normative elements of international affairs, divided into three interlocking clusters. First are issues about conflict, including both low-intensity military intervention and nuclear weapons. Second are questions about cooperation, especially between rich nations and poor nations. Third are debates about the authority and status of the major players in the international system: individual persons, nation-states, and international regimes. Questions considered include: is the retention by some nations of nuclear weapons morally justified? Is the world economy unjust? Should national governments be pressured to respect individual human rights? (IR)

## GOVT 692(6927) Administration of Agriculture and Rural Development (also IARD 603[6060])

Spring. 4 credits. N. Uphoff and
T. W. Tucker.

For description, see IARD 603.

## COVT 699(6999) CPAs Weokly Colloquium

Fall, spring. 1 credit. S-U grades only. Staff. Colloquium is the weekly seminar series hosted by the Cornell Institute for Public Affairs (CIPA). It is also a required, 1 -credit course for all CIPA Fellows and is graded S-U based on attendance. The colloquium series is a collaborative effort between the CIPA Colloquium Committee and the faculty and staff of CIPA.

## [GOVT 703(7035) Polifical Economy

Fall. 4 credits. Next offered 2008-2009.
J. Kirshner.

This course will undertake a general survey of the classical and modern theories of political economy. The works of Smith, Keynes, Shumpeter, and Hayek, among others, will be studied and placed within the context of the history and evolution of the thought, practice, and method of the field. Issues pertaining to the politics of macroeconomics and money will be of prominent (but not exclusive) interest in the course. (PT)]

## COVT 706(7083) Labor in Global Clites

 (also ILRCB 706[7060])Fall. 4 credits. L. Turner.
For description, see ILRCB 706. (CO)

## GOVT 728(7281) Government and Public

 Policy (also AM ST 628[6281])Fall. 4 credits. T. J. Lowi.
For description, see GOVT 428. (AM)
[COVT 735(7353) Polltics of South Asia (also GOVT 351[3513])
Spring, 4 credits. Next offered 2009-2010. R. Herring.

For description, see GOVT 351. (CO)]

## [GOVT 760(7605) Theoretical

 Approaches to IdeologyFall. 4 credits. Next offered 2008-2009. A. M. Smith. Investigation of what is casually referred to as the "politics of meaning" is of course central to political theory and political science as a whole. However, profound controversies revolve around the definition of "ideology," its relationship to the interests of dominant groups, the means by which it is circulated throughout diverse social sites, the ability of political agents to interrupt institutionalized ideologies, and the processes by which ideology penetrates and reconstructs the worldviews of the dominated. The groundwork for the seminar is laid by examining key texts on ideology by Marx. Students trace the multiple meanings of the term in his work and their various implications. Next they explore the ways in which the study of gendered and racial discourse has transformed our understanding of ideology. Students address the Freudian and Lacanian interventions in ideology studies with respect to the concepts of the unconscious and misidentification. They discuss the ways in which Adorno,
Horkheimer, and Habermas have re-articulated Marx's formulations. The structuralist and poststructuralist schools are studied with reference to Saussure, Levi-Strauss, Barthes, and Althusser. Finally, students explore the problem of institutional analysis with reference to texts from the science and technology studies and state theory traditions. (PT)]

## GOVT 762(7625) Sexuality and the Law (also GOVT 462[4625], Fass 461/762[4610/7620])

Spring. 4 credits. A. M. Smith
For description, see GOVT 462.

## QOVT 799(7999) Independent 8tudy

Fall or spring. 4 credits. Not open to undergraduates. Undergraduates wishing to conduct supervised study should register for GOVT 499.
Individualized readings and research for graduate students. Topics, readings, and writing requirements are designed through consultation between the student and the instructor. Graduate students in government who are looking to use this as an option to fulfill their course requirements should check with their chairs to be certain that the program of study is acceptable for this purpose. Applications must be completed and signed by the instructor and by the chairs of their special committees. They are available from, and must be returned to, the graduate assistant in 212 White Hall.

## GREEK

See "Department of Classics."

## HEBREW

See "Department of Near Eastern Studies."

HINDI-URDU
See "Department of Near Eastern Studies."

## HISTORY

J. V. Koschmann, chair; F. Logevall, director of graduate studies; M. B. Norton, director of undergraduate studies; E. Baptist, S. Blumin, V. Caron, H. Case, D. Chang, J. Chen, Z. Chen, S. Cochran, D. Corpis, R. Craib, P. Dear, O. Falk, M. C. Garcia, D. Ghosh, S. Greene, T. J. Hinrichs, K. Hirano, I. Hull, P. Hyams, C. Kammen, M. Kammen, S. Kaplan, D. Lacapra, F. Logevall, T. Loos, D. Magaziner, R. Moore, J. Najemy, M. B. Norton,
J. Parmenter, R. Polenberg, W. Provine,
H. Rawlings, E. Rebillard, C. Robcis,
M. Roldan, A. Sachs, B. Strauss, E. Tagliacozzo, T. R. Travers, M. Washington, R. Weil, J. Weiss. Emeritus: D. Baugh, J. John, W. LaFeher, C. Peterson, W. Pinter, J. Silbey, F. Somkin, B. Tierney

The popularity of history among Cornell students is due to its usefulness as preparation for graduate, professional, or law school and for any career that requires critical thinking and good writing; the reputation of the faculty for scholarship, teaching, and advising; and most of all, the intrinsic interest of the discipline. A wide variety of introductory and advanced courses is offered. The department is particularly strong in ancient, medieval, and modern European history; in American, Latin American, and Asian history; and in the history of science.

## Advanced Placement

Students who pass the AP American and/or European History exam with a score of 4 or 5 have two options: (1) use the AP credits to fulfill the Arts and Sciences course credit requirements for graduation, or (2) take introductory American and/or European history courses.

## The Major

To complete the history major, a student must fulfill the requirements listed below:
Entry requirement: completion of any two history courses excluding first-year writing seminars.

1. Take nine history department courses (for either 3 or 4 credits each), completing all of them with a grade of C or better. (Courses taken for entry may count toward fulfilling the major.)
2. Of the total nine courses:
a. four must be in courses designated as outside U.S. history and
b. three must be in courses designated as history before 1800 .
Courses used to fulfill requirement (1) above may also be used to fulfill requirement (2), in respect both to (a) and (b) if applicable. A course in American history before 1800 may be used to fulfill requirement (2b). A course before 1800 in a field other than American history can be used toward fulfillment of both requirements (2a) and (2b).
A list of those courses that fulfill the "outside U.S." and "pre-1800" requirements is maintained by the History Department.

Only courses from that list fulfill these requirements.
3. Two of the nine courses must be seminars, of which one must be a 400 level seminar. HIST 400 may be used to fulfill this requirement.

## Honors

The history department offers an honors program for students who wish to research and write a thesis during their senior year. In addition to writing the thesis, honors students must maintain a 3.5 average in their history courses, take HIST 400 Honors Proseminar during their junior year plus an additional 400level seminar, preferably during their junior year, and complete 10 courses in history (for 3 or 4 credits each). During the second semester of the sophomore year or early in the junior year, interested students should speak to a faculty member or faculty advisor about the honors program.
Before the beginning of the senior year, the candidate presents, in conversation or in writing, a thesis proposal to an appropriate member of the faculty. The faculty member who approves the proposal ordinarily becomes the thesis supervisor. If for any reason it is necessary to change supervisors, this arrangement should be confirmed no later than the fourth week after the beginning of the candidate's senior year.
Honors candidates should register in HIST 401, a seminar course in honors research. Any exceptions to this must be approved by the Honors Committee. HIST 401 is a 4 -credit course that permits honors candidates to conduct research and to begin writing the honors essay in a seminar environment. At the end of the first semester of the senior year, as part of the requirements for HIST 401, the student submits to the supervisor a 10 - to 15 page overview, or, alternatively, a preliminary draft of some part of the thesis along with an outline of the whole to the instructor of 401 and to the student's supervisor. HIST 402 is a 4 -credit seminar course that permits honors candidates to complete the honors essay and to demonstrate their understanding of the ways in which the themes explored in the thesis fit into a larger historical context.
The completed thesis is evaluated by three readers, including the supervisor and a first reader selected by the student, in consultation with his or her supervisor.
The text of the honors essay may not exceed 60 pages except by permission of the chair of the Honors Committee and the student's supervisor. Three copies are due during the third or fourth week of April. In May, each honors candidate is given an oral exam administered by the supervisor; exam focuses on the essay as well as the specific subfiek of history in which the student has conducted research (e.g., Periclean Athens, 17th-century science, 19 th-century American politics).
To qualify for a bachelor of arts degree with honors in history, a student must (1) sustain at least a 3.5 cumulative average in all history courses and (2) earn at least a cum laude grade on the honors essay and on the oral exam.
Cornell in Washington Program. History majors may apply to the Cornell in Washington program to take courses and
undertake a closely supervised externship during a fall or spring semester.
Category Key: Courses in History are broken into different categories. To determine which category(s) a course falls in, please note the reference at the end of each course description. The key is as follows: $\mathrm{AF}=$ African History, $\mathrm{AM}=$ American History, $\mathrm{AS}=$ Asian History, $\mathrm{CO}=$ Comparative History, EA = Ancient European History, ER = Renaissance \& Medieval History, EM = Modern European History, HS = History of Science, LA = Latin American History, NE = Near Eastern History, and $\mathrm{HR}=$ Honors, Reading, and Research.

## First-Year Writing Seminars

HIST 101(1101) First-Year Writing Seminar: The Blues and American Culture
Fall. 3 credits. llease register for this course through the FWS Program. R. Polenberg.

Bessie Smith, Gertrude "Ma" Rainey, Billie Holiday, "Blind Lemon" Jefferson, Robert Johnson, and "Muddy" Waters-their names have become familiar as interest in the blues has increased. But what do their lives and their music-and that of other blues musicians-reveal about American culture in the first half of the 20th century? Topics include the origins of the blues; the social structure of the Mississippi Delta; religion and social protest; gender and sexuality; law, crime, and justice; migration and urbanization; the 1960 s revival. Readings include works by Steven C. Tracy, Angela Y. Davis, and Paul Garon. Classic blues recordings will be made available, and videos of historical performances will be screened. (AM)

## [HIST 103|1103) First-Year Writing

 Seminar: Immigrant ExperiencesSpring. 3 credits. Next offered 2008-2009. D. Chang.]

HIST 114(1141) First-Year Writing Seminar: Witchcraft in the Early Modern Atlantic World
Fall. 3 credits. Please register for this course through FWS Program. D. Corpis. This seminar examines how European beliefs about witchcraft and magic were exported to Africa and the Americas in the period $1500-$ 1800. We will explore how non-European concepts of the supernatural and magical intersected with European ideas during the initial stages of European colonial expansion. We will read a range of documents, including transcripts from witch trials, treatises about witchcraft, and books written by historians that interpret the historical meaning of witchcraft. Students will write a range of papers that aim to answer the following types of questions: Were witches figments of the European imagination? Why were the people accused of witchcraft more often women than men? Why did Europeans believe that Native Americans or Africans were likely to be involved in witchcraft? (EM)

## [HIST 119(1190) First-Year Writing

 Seminar: Gandhi and the Politics of Non-ViolenceFall. 3 credits. Students should register through First-Year Writing Seminar
Program. Next offered 2009-2010.
D. Ghosh.]
(HIST 130(1300) First-Year Writing Seminar: History of the Writing of History
Fall. 3 credits. Next offered 2008-2009 A. Sachs.]

HIST 140(1400) First-Year Writing Seminar: Kipling's Indla: Literature, Culture, History
Fall. 3 credits. Please register for this course through the FWS Program. T. R. Travers.

This seminar uses the novels, stories, and poems of Rudyard Kipling to explore the history of the British Empire in India in the 19th century. We will ask what Kipling's fictional works can tell us about the British project of governing India, and also consider the broader question of the uses of fiction as a historical source. (EM)

## Introductory Courses

HIST 151(1510) Introduction to Western Civilization \# (HA-AS)
Summer and fall. 4 credits. O. Falk. The West and its relations with the rest of the world are central topics today, but just what is the West and what is its history? This course surveys the history of the West from remote antiquity to the 16 th century. We will consider developments in technology, economy, politics, religious institutions and faiths, cultural media and social ideals. Together, these themes add up to civilization in the west. We will acquaint ourselves with these dimensions of the past while seeking to acquire the basic skills professional historians use to learn about this past. (ER) (EM)

## HIST 152(1520) Intro to Western

 Civillization Part II \# (HA-AS)Summer and spring. 4 credits. R. Weil. This course introduces students to the major social, intellectual, political, cultural, artistic, and literary events and movements that emerged in Europe since the Protestant Reformation. Readings will offer a variety of perspectives on topics such as: modernity and its meaning, revolution (industrial, social, political, cultural, artistic), imperialism, war, and the emergence of modern ideologies (capitalism, communism, liberalism, fascism). (ER) (EM)

## HIST 153(1530) Introduction to American

 Hlstory (also AM ST 103[1530]) \# (HA-AS)Summer and fall. 4 credits. HIST 153 is not a prerequisite for HIST 154. J. Parmenter. A survey of American history from the beginnings through the Civil War. Topics include cultural encounters in the age of Columbus, European colonization, the American Revolution, the early republic, westward expansion, and the origins and outcome of the Civil War. (AM)

## HIST 154(1531) Introduction to American

 History (also AM ST 104[1531]) (HAAS)Summer and spring. 4 credits. HIST 153 is not a prerequisite for HIST 154. D. Chang. An introductory survey of the development of the United States since the Civil War. (AM)

HIST 190(1900) Introduction to Asian Civilizations © (HA-AS)
Spring. 4 credits. T. J. Hinrichs and K. Hirano.

Survey of East Asian history from antiquity to around 1800 . The primary purpose is to provide students with a basic literacy in East Asian history and cultures. Emphasis on comparison of phenomena between China and Japan, including state formation,
barbarians and empire, roles of Confucianism and Buddhism, the emergence of new ruling classes, family and gender, peasant uprisings, urbanization and popular culture, and outlaws (AS)
HIST 191(1910) Introduction to Modern Asian History (also ASIAN 191[1191]) © (HA-AS)
Fall. 4 credits. J. V. Koschmann and
T. Loos.

The history of Asia-Pacific from the 19th century to the present, focusing on relations of India and Southeast Asia with each other and with the west. (AS)

## HIST 195(1950) Colonial Latin America (also LAT A/AIS 195[1950]) \# @ (HAAS)

Fall. 4 credits. Staff.
This course examines the colonial "encounter" of Iberia, Africa and the New World, which began in 1492 . Topics include economic and social organization of the colonies; the cultural hybridity that preceded as well as developed within colonialism; the production of ethnicity and race; slavery, forced labor and economic stratification; intellectual currents and daily life; indigenous and slave resistance and rebellion; and independence. (LA)
[HIST 196(1960) Modern Latin America (also LAT A 196[1960]) © (HA-AS) Spring. 4 credits. Next offered 2008-2009. M. Roldan.]

## HIST 201(2001) Supervised Reading

Fall or spring. 2 credits. Prerequisite: junior or senior standing. Permission of instructor required. Staff. (HR)

## Sophomore Seminars

## HIST 202(2020) The Court, Crime, and

 the Constitution (also AM ST 204[2022]) (HA-AS)Fall. 4 credits. Limited to 15 students. Designed for sophomores but open to others as space permits. Permission of instructor required. R. Polenberg.
A seminar designed for sophomores but open to others as space permits. An examination of 20th-century Supreme Court decisions on such issues as the "third degree," illegal search-and seizure, the exclusionary rule, and the right against self-incrimination. Special attention will be given to events leading up to Miranda v. Arizona in 1966, and to the ways the Court has modified that holding. (AM)
[HIST 203(2030) Wilderness in North American History and Culture (also AM ST 203[2033]) \# (HA-AS)
Fall. 4 credits. Limited to 15 students. Priority given to sophomores. Students must commit to a weekend-long field trip in Sept. Next offered 2008-2009. A. Sachs.]

## [HIST 205(2050) The French

 Enlightenment: Methods, Ambitions, Contradictions \# (HA-AS)Fall. 4 credits. Limited to 15 students. Next offered 2008-2009. S. Kaplan.]

HIST 206(2061) Small Wars in Greece and Rome (also CLASS 216[2616]) \# (H'A-AS)
Fall. 4 credits. Limited to 15 students. B. Strauss.

A study of insurgencies, guerrillas, banditry, unconventional warfare, and low-intensity conflict in the ancient world. Topics include piracy; raiding and economic warfare; urban combat; peltasts and other light-armed troops; uprisings against Rome in Spain, Asia Minor, and North Africa; slave revolts and the Spartacus rebellion. Readings in ancient sources in translation and in modern scholarship. (EA)
[HIST 207(2070) The Occidental Tourist; Travel Writing and Orientalism in Southeast Asia (also HIST 507[5070], ASIAN 206[2660]) © (CA-AS)
Spring. 4 credits. Limited to 15 students. Prefer (but not required) that students have taken HIIST 191 or 396 . Letter grades only. Next offered 2008-2009. T. Loos.]
[HIST 208(2081) Microhistory and the Margins of Early Modern European \# (HA-AS)
Spring. 4 credits. Limited to 15 students. Next offered 2009-2010. D. Corpis.]
[HIST 209(2090) Seminar in Early American History (also AM ST/FGSS 209[2090]) \# (HA-AS)
Fall. 4 credits. Limited to 20 students. Next offered 2008-2009. M. B. Norton.]
[HIST 210(2100) The Government of God \# (HA-AS)
Spring. 4 credits. Limited to 15 students. Next offered 2008-2009. O. Falk.]
HIST 211 (2110) Black Religious Traditions: Sacred and Secular (also AM ST 251[2110], RELST 211[2110]) (HA-AS)
Spring. 4 credits. Limited to 15 students. Letter grades only. M. Washington. A survey on the black religious and spiritual traditions during bondage and the early years of freedom. This course will examine slave religion, the rise of black churches in the North, the formation of black churches after the Civil War, the independent church movement and the church's role in social protest. (AM)
This is a special seminar sponsored by the John S. Knight Institute's Sophomore Seminars Program. Seminars offer discipline-intensive study within an interdisciplinary context. While not restricted to sophomores, the seminars aim at initiating students into the discipline's outlook, discourse community, modes of knowledge, and ways of articulating that knowledge. Enrollment is limited to 15 . Special emphasis is given to strong thinking and writing and to personalized instruction with top university professors.
[HIST 212(2120) African-American Women in the 20th Century (also AM ST/FGSS 212[2120]) (HA-AS)
Spring. 4 credits. Limited to 15 students. Next offered 2008-2009. M. Washington.]
[HIST 214(2141) Crusade, Heresy, and Inquisition in the Medieval Mediterranean (also RELST 215[2150]) \# (HA-AS)
Spring. 4 credits. Limited to 15 students.
Next offered 2009-2010. P. Hyams.]
[HIST 215(2150) Middle Ages on Film \# (HA-AS)
Spring. 4 credits. Limited to 15 students. Next offered 2008-2009. P. Hyams.]

HIST 216(2160) Gender and Colonization in Latin America (also LAT A 216[2161], FGSS 216[2160]) © (HA-AS)
Spring. 4 credits. Limited to 15 students. Staff,
This sophomore seminar examines questions of gender and sexuality in the conquest and colonization of Latin America, 1492-1820
Topics will include: Iberian masculinity, men and women and the conquest; changes in indigenous gender roles as a result of colonization; gender in a society with slavery; honor and sexuality across classes and ethnic groups; nations, nationalism and gender in the 19th century. (LA)

HIST 217(2171) Classic Works of American Cultural Criticism (also AM ST 217[21711) (HA-AS)
Fall. 4 credits. M. Kammen.
The purpose of this seminar is to read and reflect upon major works of American cultural criticism, from Mark Twain's Innocents Abroad (1869) and Thorstein Veblen's Theory of the Leisure Class (1899) to recent critiques of consumerism, multiculturalism, and the media. There will also be an opportunity to examine what important European critics have said about American culture. Many of the texts are rich in humorous satire yet serve as
benchmarks of cultural change for more than a century in the U.S. Several short essays and one longer one required. No exams. (AM)

## [HIST 218(2180) Seminar on Genoclde (HA-AS)

Fall. 4 credits. Limited to 15 students. Next offered 2008-2009. I. Hull.]
[HIST 219(2190) Women and Gender in South Asia: State and Society from Pre-colonial to Post-colonial \{also ASIAN 219[2219], FGSS 219[2190]) © (HA-AS)
Fall. 4 credits. Limited to 15 students. Next offered 2008-2009. D. Ghosh.]
HIST 220(2200) Travel in American History and Culture (also AM ST 218[2200]) (HA-AS)
Spring. 4 credits. Limited to 15 students. A. Sachs.

Gertrude Stein, describing America, said, "Conceive a space that is filled with moving.
"This sophomore seminar journeys through U.S. history, from Puritan captivity narratives to the movie Thelma and Louise, to explore the many meanings of motion and mobility in American culture. Why is the road trip such an enduring trope in America? Do we live in a particularly unsettled nation? If mobility frees some people, does it trap others? What's the difference between trips taken at the speed of nature (by river power or leg power, for instance) and trips taken at the speed of machines (by planes, trains, or automobiles)? Have road trips ever changed American history? Has American history changed the nature of road trips? We'll read exploration narratives, novels of the high seas, tourist guides, histories of transportation, and theories of travel. (AM)
[HIST 221(2211) Seminar: The Blues and American Culture (also AM ST 205[2211]) (HA-AS)
Fall. 4 credits. Limited to 15 students. Permission of instructor required. Next offered 2009-2010. R. Polenberg.
[HIST 223(2230) International Law (HAAS)
Spring. 4 credits. Limited to 15 students. Next offered 2009-2010. I. Hull.]
[HIST 224(2240) Art and Politics in 20thCentury Latin History © (HA-AS)
Spring. 4 credits. Limited to 15 students. Next offered 2009-2010. M. Roldan.]
[HIST 226(2261) Society and Religion in China (also ASIAN 226[2226]) © * (HA-AS)
Fall. 4 credits. Limited to 15 students. Next offered 2008-2009. T. J. Hinrichs.]
[HIST 227(2271) Family Life in Renaissance Italy (also ITAL 227[2270]) \# (HA-AS)
Spring. 4 credits. Limited to 15 students. Next offered 2008-2009. J. Najemy.]

## [HIST 228(2280) Indian Ocean World

 (also ASIAN 228[2228]) © (HA-AS) Spring. 4 credits. Limited to 15 students. Next offered 2008-2009. E. Tagliacozzo.][HIST 229(2290) Jefferson and Lincoln: American Ideas about Freedom (also AM ST 229[2290]) (HA-AS)
Spring. 4 credits. Limited to 15 students. Priority given to underclassmen. Next offered 2007-2008. E. Baptist.]
[HIST 230(2300) Seminar in History and Memory (HA-AS)
Fall. 4 credits. Limited to 15 students. Next offered 2008-2009. J. V. Koschmann.]
[HIST 234(2340) Seminar: Gender in Early Modern Europe \# (CA-AS) Fall. 4 credits. Limited to 15 students. Designed for underclassmen but open to all students. Permission of instructor required. Next offered 2008-2009. R. Weil.]
HIST 235(2350) Antisemitism and the Crisis of Modernity (also JWST 254[2350]) (HA-AS)
Fall. 4 credits. Limited to 15 students. V. Caron.

This course will examine the role of antisemitism in 19th- and 20th-century European ideological, political and socioeconomic developments. Attention will be paid to the way in which antisemitism illuminates the underside of European history, allowing us to see how anti-Jewish intolerance and prejudice becomes embedded in the world views of significant sectors of the European populations, culminating in the Holocaust. Topics will include: the Christian roots of antisemitism and the extent to which modern antisemitism marks a break with the medieval past; the politicization of antisemitism by both Left and Right; the role of antisemitism in socioeconomic conflicts linked to the rise of capitalism; Jewish responses to antisemitism; antisemitism in the Nazi and Fascist revolutions; and contemporary interpretations of antisemitism. (EM)
HIST 236[2360) Native Peoples of the Northeast (also AM ST 236[2360]) \# (HA-AS)
Spring. 4 credits. Limited to 15 students.
J. Parmenter.

This seminar examines the history and culture of the indigenous peoples of northeastern North America, from ancient times through the era of contact with Europeans to the present day. The course emphasizes the fascinating and clramatic series of transformations and adaptations (undertaken) by the Native peoples of the Northeast which have contributed to their survival in the 21st century. Readings and discussions will be drawn from a variety of sources, including historical documents, traditional narratives, archaeological reports, ethnography, literature, online resources, and museum exhibits of material culture. (AM)
[HIST 238(2431) Families in China since the 17 th Century falso ASIAN 238[2238]) ( (HA-AS)
Spring. 4 credits. Limited to 15 students.
Next offered 2008-2009. S. Cochran.]
HIST 239(2390) Seminar in Iroquois History (also AM ST 238[2390], AIS 239[2390]) \# (HA-AS)
Fall. 4 credits. Limited to 15 students. J. Parmenter.

This seminar explores the history and culture of Iroquois people from ancient times, through their initial contacts with European settlers, to their present-day struggles and achievements under colonial circumstances in North America. Adopting an interdisciplinary perspective, students will be exposed to a variety of methodologies and approaches to reconstructing the Iroquois past. Readings and discussions will be drawn from a range of sources, with special emphasis on historical documents. In addition to these texts, we will read traditional narratives, archaeological reports, ethnography, contemporary Iroquois literature; online resources, and museum exhibits of material culture. (AM)
[HIST 241(2410) Riot and Revolution in 19th-Century Africa: The Birth of the Modern © " (HA-AS)
Fall. 4 credits. Limited to 15 students. Next offered 2008-2009. S. Greene.]
[HIST 242(2420) Religion and Politics in American History: From J. Winthrop to R. Reed (also AM ST/RELST 242[2420]) (HA-AS)
Spring. 4 credits. Limited to 15 students. Permission of instructor required. Next offered 2008-2009. R. L. Moore.]

## [HIST $\mathbf{2 4 3 ( 2 4 3 0 )}$ History of Things (HA-

 AS)Fall. 4 credits. Limited to 15 students. Next offered 2008-2009. E. Tagliacozzo.]

## [HIST 244(2440) The United States in Vietnam (HA-AS)

Fall. 4 credits. Limited to 15 students. Next offered 2009-2010. F. Logevall.]
HIST 245(2450) Drugs: People, Policies, Politics (also LAT A 245[2450]) © (HA-AS)
Spring. 4 credits. Limited to 15 students. Recommended: previous course in Latin American history. M. Roldan.
This seminar uses the narcotics trade to examine a variety of issues in historical perspective: migration, human rights, smuggling, international trade and foreign policy. The temporal focus is the period between the 1920 s and the present. (LA)

## [HIST 247(2470) The Age of

 Charlemagne (HA-AS)Spring. 4 credits. Limited to 15 students. Next offered 2008-2009. P. Hyams.]

HIST 248(2480) Ghosts and Legacies: The Construction of Public Memory (HA-AS)
Fall. 4 credits. Limited to 15 students
J. Weiss.

Focusing principally on instances of guilty and divisive pasts produced by genocide, civil war, or colonial struggles, this course will investigate how contemporary politics, in Europe and America, shaped the perception of past events; how strategies of forgetting succeeded in repressing the memory of guilty pasts and what happened when they failed; and how the public memory of traumatic events was shaped in films, literature, and other cultural locations. (EM)
[HIST 249(2491) French Social Thought from Rousseau to Foucault (HA-AS)
Spring. 4 credits. Limited to 15 students. Next offered 2008-2009. C. Robcis.]

## Lecture Courses

## HIST 250(2500) Technolagy in Saciety (also ENGRG/ECE 250[2500], S\&TS 250[2501]) (HA-AS)

Fall. 3 credits. R. Kline
For description, see ENGRG 250. (I IS)

## HIST 251(2510) Race and Popular Culture (also AM ST 250[2501])

 (HA-AS)Spring. 4 credits. M. Washington.
This course examines the intersection of race and popular culture in America, historically and thematically, focusing primarily on the black-white experience, Genres of minstrelsy, radio, film, and music provided forms of entertainment that were also mediums through which the racial "other" (black in this case) was often ridiculed and denigrated in order to promote and sustain "whiteness." However some appropriation of the "other" might involve genuine regard/appreciation of diverse cultural forms. This course explores the intersection of racial imagery, racial stereotypes, cultural borrowing and the cultural diffusion in 19th- and 20th-century America. (AM)

## [HIST 252(2520) Modern East-Central

 Europe (HA-AS)Fall. 4 credits. Next offered 2008-2009. H. Case.]
[HIST 255(2550) The Past and Present of Pre-Colonial Africa (also AS\&RC 256[2303]) (HA-AS)
Spring. 4 credits. Next offered 2008-2009. S. Greene.]
[HIST 256(2560) War and Peace in Greece and Rome (also CLASS 229[2650]) \# (HA-AS)
Spring. 4 credits. Next offered 2008-2009. B. Strauss.]

HIST 257(2571) China Encounters the World (also ASIAN 257[2257], CAPS 257[2570]) © (HA-AS)
Spring. 4 credits. J. Chen.
This is a lecture and discussion course focusing on how China has encountered the world since the 17 th century, with an emphasis on the late 19th and 20th centuries. In particular, it will analyze the age-old
Chinese "Central Kingdom" conception and
how the conception was challenged during modern times as the result of Western and Japanese incursion and China's inability to deal with the consequences of the incursion It will further analyze the impact of the Chinese "victim mentality" in order to pursue a deeper understanding of why radical revolutions have dominated China's modern history. While the emphasis of this course is China's external relations, foreign policy issues will be examined in the context of Chinas political, economic and social developments in broader terms. The course's purpose is not just to impart information but also to cultivate a basic understanding of the significance of the Chinese experience in the age of worldwide modernization. Grade in this class will be calculated on the basis of class participation, quizzes, midterm and final exams, and one essay assignment. (AS)
[HIST 259(2590) The Crusades \# © (HA-AS)
Spring. 4 credits. Next offered 2008-2009. P. Hyams.]

HIST 260(2600) Latinos in the United States: Colonial to 1898 (also LSP 260[2600], AM ST 259[2599]) " (HA-AS)
Fall. 4 credits. M. C. Garcia
This course examines the history of Latino populations in the United States from the Colonial period to 1898: how Mexican American, Puerto Ricans, Cubans, and other Latino populations emerged, and how they responded to and reshaped the societies in which they lived. Much of the course focuses on the "facts" of history (e.g. the Latino experience during key moments in American History such as the Texas revolution, the conquest of the West, the Spanish-American evidence and conflicting interpretations). Readings will draw from political, social and cultural history. (AM)
HIST 261(2610) Latinos in the United States: 1898 to the Present (also AM ST/LSP 261[2610]) \# (HA-AS)
Spring. 4 credits. M. C. Garcia.
This course examines the history of various Latino populations in the United States since 1898. Some of the topics we will discuss include: immigration as a product of U.S. hemispheric policies; the civil rights struggles of the 20th century and the evolution of a distinct "Latino" identity; the "new" migration from Latin America; the transnational influence of immigrant communities on their homelands. (AM)

## HIST 262(2620) The Middle Ages:

 Introduction and Sampler \# (CA-AS)Summer and fall. 4 credits. P. Hyams This single-semester alternative to HISTORY 263-4 targets the intelligent student seeking an accelerated entrance to the formative period of Western Civilization cluring the Middle Ages. It therefore aims to convey what was significant in that area of the "West" that became Europe, between the end of the Roman Empire in the West and the Renaissance, say 395-1450. Students may expect to gain a basic knowledge of the events and institutions of Medieval Christendom. The real and more ambitious goal is, however to introduce some of the choicer aspects of the medieval world, those judged most likely to intrigue, delight and satisfy. This Medieval Sampler is like a classic French hors doeuvre, in that it presents for the discriminating palate some of the very
best dishes known to the chef. Among these dishes figure Beliefs, Gender and Power Relations, Economics (Greed and Subsistence), Arts and Entertainments (Architecture, Literature, Music, Painting), even some Deviance and Protest. There are some interesting assignments, too. (ER)

HIST 264(2640) Introduction to Asian American History (also AAS 213[2130], AM ST 213[2610]) (HA-AS)
Spring. 4 credits. D. Chang.
An introductory history of Chinese, Japanese, Asian Indians, Filipinos, and Koreans in the United States from the mid-19th century to the 1990s. Major themes include racism and resistance, labor migration, community formation, imperialism, and struggles for equality. (AS)

## HIST 265(2650) Ancient Greece from

 Homer to Alexander the Great (also CLASS 265[2650]) \# (HA-AS)Fall. 4 credits. Open to freshmen.
B. Strauss.

A survey of Greece from the earliest times to the end of the Classical period in the late fourth century B.C. The course focuses on the Greek genius: its causes, its greatness, its defects, and its legacy. The Heroic Age, the city-state, ancient democracy, and the intellectual ferment of the Greek Enlightenment are the main topics of study. Readings in translation from Homer, Aristophanes, Sophocles, Herodotus, Thucydides, Plato, Aristotle, and from the evidence of ancient inscriptions, coins, art, and architecture. (EA)

## HIST 266(2660) Introduction to Native American History (also AM ST/AIS 266[2660]) (HA-AS)

Spring. 4 credits. J. Parmenter.
With the abandonment of earlier perspectives grounded in romantic and evolutionary stereorypes, Native American history represents today one of the most exciting, dynamic, and contentious fields of inquiry into America's past. This course introduces students to the key themes and trends of the history of North America's indigenous peoples by taking an issues-oriented approach. We will cover material ranging from the debate over the Native American population at the time of first European contact to contemporary social and political struggles over casino gambling and land claims. The course stresses the ongoing complexity and change in Native American societies and will emphasize the theme of Native peoples' creative adaptations to historical change. (AM)
[HIST 267(2670) History of Rome I (also CLASS 267[2683]) \# (HA-AS)
Fall. 4 credits. Next offered 2009-2010. E. Rebillard.]
[HIST 268(2671) History of Rome II (also CLASS 268[2684]) \# (HA-AS)
Spring. 4 credits. HIST 267 is not a prerequisite for HIST 268. Next offered 2009-2010. E. Rebillard.]
HIST 269(2691) Holy War, Crusade, and Jihad in Judaism, Christianity, and Islam (also NES/JWST/RELST 251[2651], COM L 231[2310]) © \# (HA-AS)
Fall. 3 credits. R. Brann
For description, see NES 251. (NE)

HIST 270(2700) The French Experience (CA-AS)
Fall. 4 credits. Next offered 2009-2010. Staff.]
[HIST 271(2711) Politics of Violence in 20th-Century Europe (HA-AS)
Spring, 4 credits. Next offered 2008-2009. H. Case.]

## [HIST 272(2720) The Atlantic World from Conquest to Revolution (also AM ST 272[2720]) \# (e (HA-AS)

Spring. 4 credits. Next offered 2008-2009.
R. Weil and M. B. Norton.]

HIST 273(2730) Women in American Soclety, Past and Present (also AM ST/FGSS 273[2730]) " (HA-AS)
Spring. 4 credits. M. B. Norton
A survey of women's experiences in America from the 17 th century to the present. Among the topics to be discussed are women's familial roles, the changing nature of household work, the women's rights movement, employment of women outside the home, racial and ethnic differences in women's experiences, and contemporary feminism. (AM)

## [HIST 274(2740) Foodways: A Social

 History of Food and Eating \# (HA-AS)Summer and fall. 4 credits. Next offered 2008-2009. S. Kaplan.]

HIST 275(2750) History of Modern South Asia (also ASIAN 275[2275]) © \# (HA-AS)
Fall. 4 credits. D. Ghosh.
This introductory course is a broad survey of the history of the Indian subcontinent from the end of the Mughal empire around 1700 to the present. This course is framed by two major transitions: from a Mughal government to British colonial government, and from colonialism to several postcolonial states. Prominent themes in the course include the emergence of religious and regional identities, ethnic violence, social reform and the "woman question," deindustrialization, and nationalism. Using primary sources and scholarly articles by a varied group of scholars, this course questions whether there is such a thing as one history of South Asia. (AS)

HIST 276(2674) History of the Middle East in the 20th Century (also NES/ JWST 274[2674], GOVT 274[2747]) © \# (HA-AS)
Fall. 4 credits. Z. Fahmy.
For description, see NES 274. (NE)
[HIST 277(2771) Getting Medieval I: The Early Middle Ages \# (HA-AS)
Fall. 4 credits. This course fulfills the prerequisite for HIST 278. Next offered 2008-2009. O. Falk.]
[HIST 278(2772) Getting Medieval II: The Later Middle Ages \# (HA-AS)
Spring. 4 credits. Prerequisite: HIST 262/
HIST 277 or permission of instructor. Next offered 2008-2009. O. Falk.]

## [HIST 279(2790) International

 Humanitarianism © (HA-AS)Spring. 4 credits. Next offered 2009-2010. J. Weiss.l

## HIST 280(2800) Introduction to Korea (also ASIAN 21B[2218]) © (CA-AS) <br> Spring. 3 credits. M. Shin

For description, see ASIAN 218. (AS)

HIST 281(2810) Science in Western Civilization: Medieval and Early Modern Europe up to Isaac Newton (also S\&TS 281[2811]) \# (HA-AS)
Fall. 4 credits. HIST 281 in not a
prerequisite for HIST 282. P. Dear
This course aims to make comprehensible both to science majors and to students of the humanities the historical structure and development of modern science and to show sciences as a cultural phenomenon. Changing perceptions of nature and human knowledge from Greek Antiquity to the 20th century form the framework for current Western views of the world, while the roots of the present-day dominance of "science" as a symbol of progress of modernity lie in an alliance between knowledge of nature and power over nature that took shape in the 19th century after a long period of emergence. HIST 281 runs chronologically up to the death of Isaac Newton and focuses on the cultural traditions of Christian Europe and its selective appropriation of a Greek heritage. (HS)

HIST 282(2820) Science in Western Civilization: Newton to Darwin; Darwin to Einstein (also S\&TS 282[2821]] \# (HA-AS)
Spring. 4 credits. HIST 281 in not a prerequisite for HIST 282. S. Seth. This course aims to make comprehensible both to science majors and to students of the humanities the historical structure and development of modern science and to show sciences as cultural phenomena. Changing perceptions of nature and human knowledge from Greek Antiquity to the 20th century form the framework for current Western views of the world, while the roots of the present-day dominance of "science" as a symbol of progress and modernity lie in an alliance between knowledge of nature and power over nature that took shape in the 19 th century after a long period of emergence. This course covers the 18th, 19th, and early 20th centuries. (HS)
[HIST 285(2850) From Medievalism to Modernity: The History of Jews in Early Modern Europe, 1492 to 1789 \# (HA-AS)
Fall. 4 credits. Next offered 2008-2009.
V. Caron.]

HIST 286(2861) History of Zionism and the Birth of Israel 유 (HA-AS)
Spring. 4 credits. Next offered 2008-2009. V. Caron.]

HIST 287(2870) Evolution (also BIOEE 207[2070], S\&TS 287[2871]) (PBS)
Fall. 3 credits. W. Provine
For description, see BIOEE 207. (HS)
HIST 289(2890) The U.S.-Vietnam War (also ASIAN 298[2298]) © (HA-AS)
Fall. 3 credits. K. Taylor.
For description, see ASIAN 298. (AS)
HIST 291(2910) Modern European Jewish History, 1789 to 1948 (HA-AS)
Fall. 4 credits. V. Caron.
Jewish life in Europe experienced a profound transformation as a result of the process of Jewish emancipation which began at the end of the 18 th century. While emancipation offered Jews unprecedented social, economic and political opportunities, it also posed serious challenges to traditional Jewish life and values by making available new avenues of integration. This course will examine the ways in which Jewish and non-Jewish society
responded to these new developments from the 18th-century Enlightenment to the postWorld War II era. Topics will include Jewish responses to emancipation, including assimilation and new varieties of religious accommodation; the development of modern antisemitism; the rise of Zionism and the creation of the state of Israel; the modernization of Eastern European Jewry; the impact of mass immigration; and the Nazi era. (EM)

## [HIST 292(2920) Inventing an Information

 Society (also ENGRG/ECE 298[2980], S\&TS 292[2921]) (HA-AS)Spring. 3 credits. Next offered 2008-2009. R. Kline.]

HIST 294(2940) History of China in Modern Times (also ASIAN 294[2294]) © (HA-AS)
Fall. 4 credits. S. Cochran.
A survey that concentrates on the rise of the last imperial dynasty in the 17 th and 18 th centuries, the upheavals resulting from domestic rebellions and foreign imperialism in the 19 th century, and the 20 th-century efforts to achieve social mobilization, political unity, and commercial expansion. (AS)
[HIST 295(2950) Introduction to the History, Language, and Culture of the Balkans (HA-AS)
Spring. 4 credits. Next offered 2009-2010.
J. Weiss.]

HIST 297(2971) Politics, Culture, and Society in Early Modern Europe, 1450-1789 \# (HA-AS)
Fall. 4 credits. D. Corpis.
This course offers an overview of the "early modern" period of European history (c. 15001800 ) by charting the shifts and changes in religion, culture, politics, and economics during the $16 \mathrm{th}, 17 \mathrm{th}$, and 18 th centuries. Specific topics explored in weekly lectures will include the Reformation and Counter Reformation, political centralization,
intellectual fragmentation, the institutionalization of science, the Enlightenment, and political rebellion and revolution. In addition to focusing on some of the key developments in European history during this period, the design of the course recognizes the necessity of locating European history within a broader geographic workd, so we will also explore the question of European contacts with other cultures, colonial expansion, and Atlantic slavery. (EM)

## HIST 302(3002) Supervised Research

Fall and spring. 3 or 4 credits. Prerequisite: junior or senior standing. Permission of instructor required. Staff. (HR)

HIST 303(3030) African-American Women in Slavery and Freedom (also FGSS 307[3070], AM ST 303[3030]) \# (HA-AS)
Fall. 4 credits. Letter grades only.
M. Washington.

Historical exploration of African-American
women from a sociopolitical perspective.
Topics include women in Africa, slavery and freedom, labor, the family, gender crossracially that begins with the African background and ends at 1900. (AM)

## [HIST 305(3050) Britain, 1660 to 1815 \#

 (HA-AS)Fall. 4 credits. Next offered 2008-2009. R. Weil.]
[HIST 306/3060) Modern Mexico: From Independence to the Zapatistas (also LAT A 306[3060]) 랄 (HA-AS)
Spring. 4 credits. Next offered 2009-2010. R. Craib.]

HIST 307(3070) British History, 17601870 \# (HA-AS)
Fall. 4 credits. T. R. Travers
An introduction to British history from the accession of George III to Gladstone's first administration, with particular attention to political and social change. Major topics include: war and national identity, industrial development, gender and class-relations, and Britain's relationship with its colonies. Sources include writings by Burke, Paine,
Wollestoncraft, Dickens, and Florence Nightingale. (EM)

## HIST 308(3080) Mistory of Post-War Germany (1945 to Present) (HA-AS)

Fall. 4 credits. I. Hull
This course examines modern Germany in the aftermath of World War II. It compares the experiences of East and West Germany, their state forms and cultures. It explores the collapse of East Germany and the continuing effects of the hurried reunification. The course poses many questions, among them: How did the victorious allies try to administer the defeated land? How did Germans, East and West, try to come to grips with the Nazi past and its crimes? How does one reconstitute civil society after dictatorship and war? How did the communist regime function? Why did it fall? What are the main challenges Germany now faces in building a unified society and in regaining its place as a power in Europe? (EM)

## [HIST 309(3090) History and Ceographical Imagination © \# (HA-AS)

Fall. 4 credits. Next offered 2008-2009 R. Craib.]

HIST 310(3101) British History, 1870 Present (HA-AS)
Spring. 4 credits. T. R. Travers.
An introduction to British history from Gladstone to Tony Blair, with particular attention to political and social change. Topics will include: the growth of mass politics, democracy and the welfare states; the impact of world wars, imperialism and decolonization; and Britain's changing relations with Europe and the U. S. (EM)

## HIST 311(3110) Andean History and Ethnohistory (also LAT A 311[3110])

 © \# (HA-AS)Spring. 4 credits. Staff
The Andean region of South America-comprising the modern nations of Peru, Ecuador and Bolivia-has a rich documentary history going back thousands of years, from major prehispanic civilizations (most famously the Incas) to its role as an important center in the Spanish colonial empire to modern revolutions and movements for indigenous rights. Through critical readings of historical texts as well as archaeological artefacts, we will examine key junctures in Andean history, especially from the perspectives of indigenous peoples. (LA)

## [HIST 312/3120) Forging Nations:

 Experlments in Latin American Nation-Building and Reform (also LAT A 312[3211]) (CA-AS)Fall. 4 credits. Next offered 2008-2009. M. Roldan.

HIST 313(3130) U.S. Foreign Relations, 1750-1912 (also AM ST 318[3130]) \# (HA-AS)
Fall. 4 credits. F. Logevall.
Examines the development of the U.S. continental and global empires by analyzing policy and policy makers from Benjamin Franklin to Willard Straight. Emphasis is placed on domestic events that shaped foreign policy. In conjunction with HIST 313, a special 2-hour course, 201, for discussion and guided research will be offered. (AM)
HIST 314(3140) History of American Foreign Pollcy, 1912 to the Present (also AM ST 312[3140], CAPS 314[3140]) (HA-AS)
Spring. 4 credits. F. Logevall.
Students examine the emergence of the United States as a world power in the 20th century. The course focuses on the domestic sources of foreign policy and the assumptions of the major policy makers (Wilson through Clinton). Important themes include the American response to a revolutionary world since 1912, the role of American racial views in the making of foreign policy, and the increasingly dominant role of the president in the making of U.S. foreign policy. (AM)
[HIST 315(3150) Environmental History: The United States and Beyond (also AM ST 349[3510]) \# (HA-AS)
Spring. 4 credits. Next offered 2008-2009. A. Sachs.]
[HIST 316(3160) American Political Thought: From Madison to Malcolm X (also AM ST 376[3665], GOVT 366[3665]) \# (HA-AS
Fall. 4 credits. Next offered 2009-2010. I. Kramnick.]
[HIST 318(3180) American Constitutional Development (also AM ST 317[3180]) (HA-AS)
Fall. 4 credits. Not open to freshmen. Next offered 2008-2009. R. Polenberg.]
[HIST 319(3191) Martial Arts and Society and Religion (also ASIAN 391[3391]) © (HA-AS)
Fall. 4 credits. Next offered 2009-2010. T. J. Hinrichs.]

HIST 320(3200) The Viking Age \# (HAAS)
Spring, 4 credits. O. Falk.
This course aims to familiarize students with the history of Scandinavia, ca. 800-1100 AD. Although well-known as a dramatic chapter in medieval history, this period remains enigmatic and often misunderstood. Our goal will be to set Norse history within its European context, observing similarities with processes elsewhere in the medieval world, the better to perceive what makes the Norse unique. We will examine the social, economic and political activities of the Norsemen in continental Scandinavia, in Western and Eastern Europe, and in the North Atlantic (ER)
[HIST 321(3210) Colonial North America to 1763 (AM ST 321[3210]) \# (HA-AS)
Fall. 4 credits. Next offered 2008-2009. M. B. Norton.]

## HIST 323(3231) Race and Politics in 20th-Century America (also AM ST 325[3231]) (HA-AS)

Fall. 4 credits. J. Sokol.
This course picks up the tale after the Populist revolt of the 1890 s, and moves through the

20th century. It focuses initially on the Jint Crow South. and later expands its geographic scope to cover the entire nation. The course acquaints students with characters as disparate as Huey Long, Fannie Lou Hamer. George Wallace, Martin Luther King, Jr., and Malcolm X , while it explores the New Deall, the Dixiecrat walkout, the civil rights movement. the "white backlash," and a variety of recent presidencies. Throughout, the American experience intimately bound politics with race relations. We will pursue many topics within this larger rubric-from national politicians and famous figures to local movements. 'This course places special emphasis on the years after World War II. the advent of the civil rights movement, and its lasting impact on liberalism. conservatism, and American society. (AM)
[HIST 324(3240) Varieties of American Dissent, 1880-1900 (also AM ST 324[3240]) (HA-AS)
Fall. 4 credits. Next offered 2008-2009. N. Salvatore.]
[HIST 325(3250] Age of the American Revolution, 1754 to 1815 (also AM ST 322[3250]) \# (HA-AS)
Spring. 4 credits. Next offered 2008-2009. M. B. Norton.]

## [HIST 326(3260) History of the Modern

 British Empire (HA-AS)Fall. 4 credits. Next offered 2008-2009. T. R. Travers.]
[HIST 327(3270) The Old South \# (HA-AS) Spring. 4 credits. Next offered 2008-2009. E. Baptist.]
[HIST 328(3280) Construction of Modern Japan (also ASIAN 328[3328]) © \# (HA-AS)
Spring. 4 credits. Next offered 2008-2009. J. V. Koschmann.]

HIST 329(3290) Making Modern Science (also S\&TS 330[3301]) (HA-AS)
Fall. 4 credits. Next offered 2008-2009. S. Seth.]
[HIST 330(3300) Japan from War to Prosperity (also ASIAN 335[3335]) © (HA-AS)
Spring. 4 credits. Next offered 2009-2010. J. V. Koschmann.]

HIST 331(3310) Causes of the American Civil War, 1815 to 1860 (also AM ST 331[3310]) \# (HA-AS)
Fall. 4 credits. E. Baptist.
A study of the simultaneous growth and growing-apart of the United States in the years from the end of the War of 1812 to the beginning of the Civil War. We will examine the political, social, economic, and cultural history of this era in order to understand why the United States became a vast, successful. transcontinental republic. We will also try the same history to understand why it simultaneously split apart and plunged into a civil war that would ultimately cost over 600,000 lives. (AM)

HIST 333(3331) Latin American Studies: Issues in Interdisciplinary Perspective (also LAT A 330[3300])
Fall. 4 credits. M. Roldan and J. Henderson Introductory course recommended for those concentrating in Latin American Studies. Topics will vary by semester, but readings always focus on current research in various disciplines and regions of Latin America. The range of issues addressed include the
economic, social, cultural, and political trends and transitions in the area. In the weekly meetings, instructors and guest lecturers facilitate student discussions. Students taking the course are required to participate in all class discussions and write one research paper in their chosen focus area. (LA)

## [HIST 338(3644) Sages and Saints/

 Anclent World (also CLASS/RELST 332[3644]) \# (HA-AS)Spring. 4 credits. Next offered 2009-2010
E. Rebillard.]

HIST 339(3391) Seminar on American Relations with China (also CAPS 300[3000])
Fall. 4 credits. Offered in the Comell in Washington Program. R. Bush.
For description, see CAPS 300. (AM) (AS)
[HIST 340(3400) Recent American History, 1925 to 1965 (also AM ST 340[3400]) (HA-AS)
Fall. 4 credits. Not open to freshman. Next offered 2009-2010. R. Polenberg.]

## [HIST 341(3410) Recent American History, 1965 to the Present falso AM ST 341[3410]) (HA-AS)

Spring. 4 credits. Next offered 2008-2009 R. Polenberg.]

## [HIST 342(3420) Hlstory of Modern South

 Asia, 1700 to 1947: From the Mughals to Midnight (also ASIAN 342[3342]) © (HA-AS)Fall. 4 credits. Next offered 2008-2009 D. Ghosh.]

HIST 343(3430) American Civll War and Reconstruction, 1860 to 1877 (also AM ST 343[3430]) " (HA-AS)
Spring. 4 credits. E. Baptist.
A survey of the turning point of U.S, history: The Civil War (1861-1865) and its aftermath, Reconstruction (1865-1877). We will look at the causes, the coming, and the conduct, of the war, and the way in which it became a war for freedom. We will then follow the cause of freedom through the greatest slave rebellion in American history, and the attempts by formerly enslaved people to make freedom real in Reconstruction. And we will see how Reconstruction's tragic ending left questions open that are still not answered in U.S. society and politics. (AM)

## [HIST 344|3440) South Asia and the Early Modern World (also ASIAN 369[3391]) 룽 (HA-AS)

Spring. 4 credits. Next offered 2009-2010 D. Ghosh.]

HIST 345(3450) Cultural and Intellectual Llfe of 19th-Century Americans (also AM ST 345[3450]) " (HA-AS)
Fall. 4 credits. A. Sachs.
An examination of the development of cultural and intellectual diversity in the United States. Topics covered include: slavery and abolition; landscape and environment; religion;
Darwinism; professionalization; literature; and the women's movement. (AM)

MIST 346(3460) The Modernization of the American Mind (also AM ST 346[3460]) (HA-AS)
Fall. 4 credits. R. L. Moore
American thought and culture from 1890 to the present. Emphasizes the intellectual impact of major political and economic events and the adaptation of social ideas and values to new conditions. (AM)
[HIST 347(3470) Asian American Women's History (also AAS/FGSS 347[3470], AM ST 351[3470]) (CA-AS)
Spring. 4 credits. Next offered 2009-2010. D. Chang.]
[HIST 348(3481) Modern France: 1870 to the Present (HA-AS)
Spring. 4 credits. Next offered 2009-2010. C. Robcis.]

## HIST 349(3490) Renaissance England, 1485 to 1660 \# (HA-AS)

Fall. 4 credits. R. Weil.
This course will explore the crises of political, religious, and epistemological authority that plagued England in the 16th and 17th centuries. We will examine the political and cultural impact of the Protestant Reformation, the nature of Tudor despotism and Stuart absolutism, the construction of a rhetoric of political dissent around issues of sexuality and corruption, competing understandings of the social order and social control, the Puritan Revolution and the invention of liberalism. Emphasis on close reading of contemporary sources, from autobiography and drama to political theory. (EM)
[HIST 350(3500) The Italian Renalssance (also ITAL 221[2210]) " (HA-AS)
Spring. 4 credits. Next offered 2008-2009. J. Najemy.]
[HIST 351(3510) Machiavelli \# (HA-AS) Fall. 4 credits. Next offered 2008-2009. J. Najemy.]
[HIST 352(3520) 20th-Century East Asian-American Relations (also CAPS 352[3520]) © (HA-AS)
Spring. 4 credits. Next offered 2008-2009 J. Chen.]
[HIST 356(3560) The Era of the French Revolution and Napoleon " (HA-AS) Fall. 4 credits. Next offered 2009-2010. S. Kaplan.]
[HIST 357(3570) Engineering in American Culture (also ENGRG 357[3570], S\&TS 357[3571], AM ST 356[3570]) Fall. 4 credits. Next offered 2008-2009. R. Kline.]
[HISt 358(3580) Survey of German History, 1890 to the Present (HA-AS) Fall. 4 credits. For freshman, permission of instructor required. Next offered 2008 2009. I. Hull.]

HIST 361(3611) Bakumatsu-Ishin: Conflicts and Transformations in Early Modern Japan, 1700-1890 (also ASIAN 361[3361]) (HA-AS)
Fall. 4 credits. K. Hirano.
This course explores Japan's tumultuous transformation from a samurai military government to a modern nation-state and its political and cultural implications for the present. It has been debated among both Japanese and American historians whether or not Japan's modern transformation is best understood as a "restoration (of imperial rule)" or as a "revolution." The choice of word as a descriptive category matters to the extent that it reveals one's perspective on this event. "Restoration" expresses the view that Japan's metamorphosis into a modern society was a relatively uneventful and smooth "transition" carried out by a handful leaders whereas "revolution" recognizes Japan's experience as one of the great transformations in which people from different segments of society
participated for various reasons and motives In this class, we will examine this event as a revolution, thus paying close attention to a wide range of ideas, activisms, and practices such as samurai loyalism, peasant uprisings, popular culture, millenarianism, the exploration of western forms of knowledge and power, nation-state building and new ideologies of time (progress) and space (national identity). In other words, we seek to understand Japan's transformation as a fairly long, multifaceted and widely participated process of intense intellectual and cultural criticism as well as social and political activism. In addition to primary and secondary texts, we will read a few important theoretical works on revolution/social transformation for the purpose of critically examining the history of the fall of the Tokugawa samurai regime and creation of a modern social order, called bakumatsu-ishin in Japan. (AS)

## HIST 363(3631) History of Battle (also CLASS 362[3662]) (HA-AS)

Spring. 4 credits. B. Strauss and E. Baptist. A study, of battle and its changing character from the ancient world to the present day Topics include the soldier's experience, command and control, tactics; technology, organization, and the nation; logistics and supply, battle and military strategy, battle and civilians, memory, historiography. (EA) (AM)

## HIST 364(3640) The Culture of the

 Renaissance II (also COM LTFREN/ RELST 362[3620], ENGL 325[3250], MUSIC 390[3242]) (CA-AS)Fall. 4 credits. For freshman, permission of instructor required. Next offered 20082009. K. P. Long and W. Kennedy.]
[HIST 365(3650) West Africa and the West: 1450-1850 (also AsaRC 365[3302]) " (10 (HA-A8]
Fall. 4 credits. Next offered 2008-2009. S. Greene.]

## HIST 368(3661) Mistory of Southern

 Africa 0 (HA-AS)Fall. 4 credits. D. Magaziner. This course traces the history of Southern Africa (South Africa and surrounding countries) from the early second millennium to the present day. Beginning with the geography and early history of farming and trade in the region, it moves quickly to explore the impact of the European colonialism in the 17th and 18th century, the often violent conflicts and conquest of the 19th century, and especially industrialization and social change at the turn of the 20th. The second half of the course focuses intently on the rise of segregation and apartheid during the 20th century and the slow process of decolonization after World War II. The final week looks at the present-day challenges facing the region, including AIDS, violence and continued poverty, within the context of global economies. (EM)

## HIST 367(3671) Survey of Cerman

 History, 1648-1870 (HA-AS)Fall. 4 credits. For freshman, permission of instructor required. Next offered 20082009. I. Hull.]

〔HIST 368(3680) Marriage and Sexuality in Medieval Europe (also RELST/ FOSs 368[3680]) " (HA-AS)
Fall. 4 credits. Recommended: some prior knowledge of medieval European history. Next offered 2008-2009. P. Hyams.]

HIST 369(3690) The History of Florence In the Time of the Republic, 1250 to 1530 " (HA-AS)
Spring. 4 credits. J. Najemy
Florentine politics and society from the communal period through the age of Dante, the rise and decline of the guild republic, the age of civic humanism, and the rise of the Medici, to the crisis of the republic in the time of Machiavelli. Social classes and conflicts, the elite families, economic structures, the working classes, guilds, family history, women and the political and historical ideas are considered in the context of the emergence and transformation of republican government. (ER)

## HIST 370(3700) History of the Holocaust (also JWST 353[3700]) (NA-AS)

Spring. 4 credits. V. Caron.
This course will analyze the meaning of the Holocaust from three vantage points: that of European history; that of Jewish history; and that of those states and religious institutions that shared responsibility by having stood by in silence. Topics include: the evolution of modern anti-Semitism, the role of antiSemitism in the Nazi ideology and program; the bureaucratization of death; Jewish life in ghettos and concentration camps; the fate of Jews in occupied Europe and the question collaboration; Jewish political behavior under duress; the responses of the Western allies and the Churches; contemporary interpretations of the Holocaust and the meaning of evil. (EM)

## HIST 371(3710) World War II in Europe (HA-AS)

Summer and fall. 4 credits. J. Weiss. The Second World War remains the single most important set of events shaping the contemporary world. The course deals with both the events of World War II as they shaped European and world history and the way those events were remembered and commemorated in postwar years. Lectures, screenings, and readings will examine: the role of wartime political leaders and military commanders; the experience of war and occupation for soldiers and civilians, including Resistance movements and collaborators; Nazi genocide; intellectual and cultural changes during the war, including the impact on literature and philosophy; strategic questions about the origins and conduct of the war; the concluding phases involving the Nuremberg Trials, the Yalta and Potsdam conferences, and the launching of the Cold War; and the representation of the war in subsequent films, literature, and political culture. (EM)

## [HIST 373(3730) Law, Crime, and Soclety

 in Early Modern Europe (HA-AS)Spring. 4 credits. Next offered 2008-2009 D. Corpis.]
[Hist 375(3750) The African American Workers, 1865 to 1910: The Rural and Urban Experience (also ILRCB 385[3850]) " (HA-As]
Fall. 3 credits. Junior or senior standing or permission of instructor. Next offered 2008-2009. N. Salvatore.]
[H18T 376(3760) The African-American Workers, 1910 to the Present: Race, Work, and the City (also ILRCB 386[3860])
Fall. 3 credits. Next offered 2009-2010. N. Salvatore.]
[MIST 378(3780) Topice in U.8. Women's History [also AM ST 378[3780]]
Fall. 4 credits. Prerequisite: HIST/FGSS 273,
303 , or 238 or permission of instructor. Next offered 2008-2009. M. B. Norton.]

## HIST 379(3790) The First World Wart

 Causes, Conduct, Consequences (HA-AS)Spring. 4 credits. For freshmen, permission of instructor required. I. Hull
This course examines the long-term and immediate political, social, and cultural causes of World War I, its catastrophic prosecution, and its revolutionary consequences. Recurring themes are: the building of nation-states, the diplomatic and military systems of the 19th and 20 th centuries, mass mobilization, the development of mass violence, and the emergence of millenarian visions of the future (EM)
[HIST 388(3880) History of Vietnam (also HIST 688[6880], ASIAN
385/685[3385/6685]) © (HA-AS)
Fall. 3 credits. Next offered 2008-2009. K. Taylor.]
[HIST 395(3950) Premodorn Southeast Asla (also HIST 695[6950], ASIAN 397[3397]) ㄹ (HA-A8)
Fall. 4 credits. Open to undergraduates, and to graduate students, although with separate requirements. Next offered 20092010. E. Tagliacozzo.]

Hist 396(3960) Southeast Aslan Mistory from the 18th Century Ialso HIST 696[6960], ASIAN 396/696[3396/6696]) © (HA-A8)
Spring. 4 credits. Graduate students must enroll in HIST 696. T. Loos
Surveys the modern history of Southeast Asia with special attentions to colonialism, the Chinese diaspora, and socio-culture institutions. Considers global transformations that brought "the West" into people's lives in Southeast Asia. Focuses on the development of the modern nation-state, but also questions the narrative by incorporating groups that are typically excluded. Assigns primary texts in translation. (AS)

## Honors Courses

## HIST 400/4000) Monors Proseminar

Fall and spring. 4 credits. Limited to 15 students. For prospective honors candidates in history. Permission of member of Honors Committee required. Fall, R. Weil; spring, F. Logevall. An exploration of major contemporary approaches to historical inquiry, analysis, and presentation. Ways of thinking about history along with research methods and organization of the results will be considered by reading and discussing a variety of historical works. (HR)

## MIST 401(4001) Monors Quldance

Fall. 4 credits. Prerequisite: HIST 400
Permission of instructor required.
D. Ghosh. (HR)

HIST 402(4002) Honors Research
Spring. 4 credits. Prerequisite: HIST 400. Permission of instructor required. D. Ghosh. (HR)

## Undergraduate Seminars

MIST 403(4030) History of the U.S. Senate in the 20th Century (also GOVT 400 (HA-AS)
Fall and spring. 4 credits. Offered in
Cornell in Washington Program. B. Koed. This course will offer students an opportunity to view the process of shaping national debates from the perspective of the United States Senate. The modern Senate will serve as the point of reference for an inquiry into the development of the institution's powers under the Constitution during the past 200 years Class readings, lectures and discussions will focus on the themes of continuity and change the role of individual senators, and the institutional evolution of the Senate. In addition to general class reading and written examinations, each student will write a short paper and participate in an oral presentation. (AM)
[HIST 404(4041) Ethnicity, Race, and Indigeneity In Latin Amorica (also HIST 607[6041], AIS 401) (HA-AS)
Fall. 4 credits. Limited to 15 students. Prerequisite: a previous course in Latin American history. Next offered 2008-2009. Staff.]

HIST 405(4050) U.S.-Cuba Relations [also hist 60s[6050], LAT A/LSP/AM ST 405/605[4050/6050]) (HA-AS)
Spring. 4 credits. M. C. García
The course examines the political, cultural, and economic relations between the United States and Cuba since the 18th century Special attention is given to the transnational role of exiles and immigrants in shaping policy in both countries and across the region (AM) (LA)

## [MIST 406(4061) The New Cold War

 History (also HIST 606[6061]) © (HA-AS)Spring. 4 credits. Limited to 15 students. Next offered 2009-2010. J. Chen.]

HIST 408(4080) Feudalism and Chivalry: Secular Culture in Medieval France, 1000 to 1300 (HA-AS)
Fall. 4 credits. Recommended: HIST 262, 263, or 264. P. Hyams.
An upper-level semtnar on the main currents of noble lay culture in France, which led European fashions in love, warfare, entertainment, and environment through most of the period. There will be heavy emphasis on contemporary sources (in English), including lively and complete readings from epic literature (the Song of Roland), lives, and chronicles. (EM)

HIST 409(4091) Contesting Identitles in Modern Egypt [also NEs 405[4605]]
Fall. 4 credits. Z. Fahmy.
This seminar examines the dynamics of modern collective identities which dominated the Egyptian public sphere in the long 20th century. We will explore the underpinnings and formation of territorial Egyptian nationalism, pan-Arabism and Islamism through close readings and class discussions of important theoretical, historiographical and primary texts. (NE)
[HIST 410(4100) Archipelago: Worlds of Indonesia (also HIST 617[6100], ASIAN 409/617[4409/6617]) (2) (HA-AS)
Spring. 4 credits. Open to undergraduates and graduate students, though with separate requirements. Limited to 15 students. Next offered 2008-2009. E. Tagliacozzo.]

HIST 411(4111) Undergraduate Seminar: History of the American South (also AM ST 430[4302]) (HA-AS)
Fall. 4 credits. E. Baptist
This seminar will study the development of ideas about masculinity, femininity, blackness, . and whiteness in the U.S. South from early settlement to the U.S. Civil War, We will discuss illicit sexuality, the origins of racism, interracial sex, violence, resistance, power, exploitation, and how the ideas and structures of power these phenomena helped generate shaped the everyday lives of African and European settlers and their descendants, even to the present day. (AM)
HIST 415(4150) Seminar in the History of Biology (also BIOEE 467[4670], BaSOC/S\&TS 447[4471]) (PBS)
Summer or fall. 4 credits. Limited to 18 students. W. Provine.
For description, see BIOEE 467. (HS)
HIST 416(4160) Undergraduate Seminar on Cender and Sexuality In Southeast Asla (also HIST 616[6160], FGSS 416/616[4160/6160], ASIAN 416/618[4416/6618]) © (CA-AS)
Fall. 4 credits. Letter grades only. T. Loos. Students consider the relationships among colonialism and gender and sexual identity formation in Southeast Asia. Using material from a wide range of fields including anthropology and literature, the course complicates the simplistic East/West and male/ female binary: (AS)

HIST 417(4170) History of Jews in Modern France lalso FREN 413[4130]) (HA-AS)
Spring. 4 credits. Permission of instructor required. V. Caron.
This course will explore the integration of Jews into French society from the French Revolution to the present. Topics will include the debate over Jewish emancipation during the Enlightenment, the French Revolution, and the Napoleonic era; the processes of religious and social assimilation; the rise of antisemitism and the Dreyfus Affair; Jewish responses to antisemitism; the immigrant challenge and refugee crisis of the 1930s; the Vichy era and Jewish resistance during World War II; and the reconstruction of the French Jewish
community since 1945. (EM)
HIST 419(4190) Seminar in American Social History (also AM ST 419[4190]) (HA-AS)
Fall. 4 credits. Offered in Cornell in
Washington Program. S. Blumin. (AM)
HIST 420(4200) Asian American Communitles (also AM ST 420[4200], AAS 424[4240]) (HA-AS)
Spring. 4 credits. Limited to 15 students. D. Chang.

This seminar offers in-depth analysis of Asian American communities. Beginning in the mid19th century and ending with the late 20th century, this course uses the community study as a lens to explore the development of Asian America. It focuses on themes of collective strategies of resistance to discrimination as
well as tensions within Asian American populations. Course materials include some of the most significant monographs recently published as well as primary documents. (AM)
HIST 421(4210) Undergraduate Seminar in Cultural History (also AM ST 421[4120], ART H 421[4021])
Fall. 4 credits. Limited to 15 students.
M. Kammen.

Topic for Fall 2007: Tocqueville's Democracy in America. This seminar will undertake a close reading of the most astute and influential inquiry ever made concerning politics and society in the United States, Alexis de Tocqueville's Democracy in America (2 vols. $1835-40$ ). In addition, we will read Tocqueville's correspondence concerning the United States; some major secondary sources about Tocqueville and his companion Beaumont; two works by "moderns" who have done the "Tocqueville thing" (1982 and 2005); and assess the uses and abuses of Tocqueville's insights in recent American political discourse. How prophetic was this French political philosopher? (AM)
HIST 422(4221) British in India, 1750 1830 : (HA-AS)
Spring. 4 credits. Next offered 2008-2009. T. R. Travers.]

HIST 423(4230) Chronicles of the Conquest of Latin America (also LAT A 425[4250]) © (HA-AS)
Spring. 4 credits. Staff.
In this seminar we will examine the writings of participants in the conquest of colonization of Latin America. Readings include writings by European conquistadors, Amerindian elites, and non-alphabetic materials from the early colonial period. In particular we investigate how the history of the conquest itself and of the societies that existed prior to this contact were produced by its participants, with special attention to questions of ethnicity, gender, and class. (LA)
[HIST 424(4240) Art and Politics in 20thCentury Latin America (CA-AS)
Fall. 4 credits. Limited to 15 students. Permission of instructor required. HIST 296 or other Latin American course suggested. Next offered 2009-2010. M. Roldan.]

HIST 425(4251) Ethics, Race, Religion, and Health Policy (HA-AS)
Fall. 4 credits. Offered in Cornell in Washington Program. A. Kraut.
[HIST 426(4260) The West and Beyond: Frontlers and Borders In Amerlcan History and Culture (also AM ST 426[4260]) (HA-AS)
Spring. 4 credits. Limited to 15 students. Priority given to junior and senior majors in History and American Studies. Next offered 2008-2009. A. Sachs.]
[HIST 428(4261) Commodification in Historical Perspective: Sex, Rugs, Salt, and Coal (also AM ST 427[4261]) © (HA-AS)
Spring. 4 credits. Priority given to juniors and seniors majoring in History and American Studies. Next offered 2008-2009. A. Sachs.]

HIST 429(4290) The Mediterranean and Cervantes (also S HUM 424; COM L 411[4110], SPAN 434[4340], NES 449[4490])
Spring. 4 credits. Limited to 15 students. Reading knowledge of Spanish is highly recommended. M. Garces.
For description, see S HUM 424. (EM)
[HIST 430(4300) America in the Camera's Eye (also AM ST 430[4302])
Fall. 4 credits. Limited to 15 students. Permission of instructor required. Next offered 2008-2009. R. L. Moore.]
HIST 431(4310) Farmworkers (also HIST 631[6310], LSP 431/631[4310/6310], CRP 395.72/679.72[3850/5850], ILRCB 402(4020]) (HA-AS)
Spring. 4 credits. V. Santiago-Irizarry.
For description, see LSP 431. (LA)
[HIST 432(4320) Toplcs in Ancient Greek History (also HIST 633[6330], CLASS 463[4320]) " (HA-AS)
Spring. 4 credits. Next offered 2008-2009. B. Strauss.]
[HIST 433(4330) History of Modern German Jewry: From Enlightenment to the Post-1945 Era (also JWST 453[4330]) (HA-AS)
Spring. 4 credits. Limited to 15 students. Next offered 2009-2010. V. Caron.]
[HIST 436(4360) Conflict Resolution In Medieval Europe \# (KCM-AS)
Spring. 4 credits. Next offered 2008-2009. P. Hyams.]

MIST 438(4381) Roman Soclal History |also CLASS 438[4683], MIST 638[6381])
Fall. 4 credits. E. Rebillard.
For description, see CLASS 437. (EA)
HIST 439(4390) Reconstruction and the New South (also AM ST 439[4039]) * (HA-AS)
Spring. 4 credits. Limited to 15 students. Limited to juniors and seniors. Next offered 2008-2009. M. Washington.
This course focuses on the American South in the 19th century as it made the transition from Reconstruction to new forms of social organization and patterns of race relations. Reconstruction will be considered from a sociopolitical perspective, concentrating on the experiences of the freed people. The New South emphasis will include topics on labor relations, economic and political changes, new cultural alliances, the rise of agrarianism, and legalization of Jim Crow. (AM)
[HIST 441(4411) Fourth Century and Early History of Oreece (also CLASS 441[4410]) ( (HA-AS)
Fall. 4 credits. Next offered 2009-2010. B. Strauss.]
[HIST 442(4421) To Be Enslaved Then and Now " (HA-AS)
Spring. 4 credits. Next offered 2008-2009. S. Greene.]
[HIST 444(4440) American Men (also AM ST/FGSS 444[4440]) (HA-AS)
Fall. 4 credits. Limited to 15 students. Next offered 2008-2009. E. Baptist.]
HIST 445(4451) Now York Women lalso S\&Ts 422[4221], FGSS 422[4220]) (HA-AS)
Fall. 4 credits. Limited to 15 students.
M. Rossiter.

For description, see S\&TS 422. (AM)

HIST 446(4460) Strategy in World War II (HA-AS)
Spring. 4 credits. Permission of instructor required. J. Weiss.
Strategic decision-making in World War II. The course will be organized into a "task force" addressing crucial problems faced by the European-American Allies in World War II: the invasion of northwest Europe, strategic bombing tactics, the rescue of European Jews, and coordination with the Soviet Union. Individual presentations/papers followed by meetings to draft group reports. (FM)

## [HIST 447(4470) Crusaders and

 Chroniclers © (HA-AS)Fall. 4 credits. Limited to 15 students. Next offered 2008-2009. P. Hyams.)
[HIST 452(4520) History of the New Europe (HA-AS)
Fall. 4 credits. Limited to 15 students. Next offered 2008-2009. H. Case.]
[HIST 456(4560) Topics in Medieval Historiography (also HIST 656[6560]) \# (HA-AS)
Spring. 4 credits. Permission of instructor required. Next offered 2009-2010. O. Falk.]
[HIST 457(4570) Seminar in European Fascism (HA-AS)
Fall. 4 credits. Permission of instructor required. Next offered 2008-2009. I. Hull.]

HIST 458(4581) Intelligibility In Science [also S\&TS 458[4581] (HA-AS)
Spring. 4 credits. Next offereḍ 2008-2009. P. Dear.]
[HIST 462(4620) Popular Culture in European History (CA-AS)
Fall. 4 credits. Next offered 2009-2010. S. Kaplan.]
[HIST 463(4630) War and Society in Eastern Europe (HA-AS)
Spring. 4 credits. Next offered 2009-2010.

> H. Case.]

HIST 465(4651) Special Toplcs: Chinese Historical Documents on Modern China (also CHIN 426/625[4426/6625])
Fall. 4 credits. Prerequisite: equivalent of three years Mandarin instruction.
Permission of instructor required. Z. Chen.
For description, see CHIN 426. (AS)
[HIST 466(4660) Iroquois History (also AM ST/AIS 466[4660]) \# (HA-AS)
Fall. 4 credits. Next offered 2008-2009.
J. Parmenter.]

HIST 468(4680) Love and Sex in the Itallan Renaissance (also ITAL 468[4680]) " (HA-AS)
Spring. 4 credits. J. Najemy.
An exploration of the representation of love, sex, and eros in Italian Renaissance literature, and the attempts by secular governments and the Church to manage, discipline, and punish sexual transgression. Primary texts include Boccaccio's Decameron, 15 th-century novella, plays by Machiavelli (Mandragola, Clizia) and Bibbiena (Calandria), and Aretino's Dialogues. Secondary readings include studies of sexual crime, love across social boundaries, prostitution, homosexuality, and lesbianism. (ER)
[HIST 469(4691) The OId English Laws and Their Politico-Cultural Context (also HIST 669[6691], ENGL 419[4190]) \# (CA-AS)
Fall. 4 credits. Next offered 2009-2010.
P. Hyams and T. Hill.]

HIST 473(4731) Politics and Protest in America: From Civil Rights to the New Conservatism (also AM ST 473[4731]) (HA-AS)
Spring. 4 credits. J. Sokol.
African-American struggles for civil rights in the mid-1950s and early 1960s defined an age of protest that culminated in the youthful radicalism of antiwar struggles, burgeoning gay rights and women's movements, and gave way to urban riots. Some Americans embraced struggles for civil rights; others perceived threats to their own welfare. Out of this, a white backlash emerged, and so did the roots of a new politics. In turn, politicians like George Wallace, Ronald Reagan, and Richard Nixon helped to inspire an ascendant conservative movement. From city streets to rural plantations and suburban living rooms, different visions of American freedom competed. (AM)
HIST 474(4740) Topics in Modern European Intellectual and Cultural History (also COM LJJWST 474[4740])
Spring. 4 credits. Limited to 15 students. D. LaCapra.

The Secular and the Sacred. The interaction between the secular and the sacred has often been analyzed in terms of the concept of secularization. The seminar will explore the various definitions, possibilities, and limitations of this concept in understanding the sacred, the secular, and their relations. Readings include Max Weber, Sigmund Freud, Soren Kierkegaard, Carl Schmitt, Georges Bataille, Mary Douglas, and René Girard. (EM)
HIST $\mathbf{4 7 6 ( 4 7 6 0 )}$ History and Story in the North Sagas (also HIST 676[6760], ENGL $412[4120]$ ) (HA-AS)
Spring. 4 credits. O. Falk and T. Hill. This course examines a selection of Icelandic sagas and related pieces as both works of literature and records of history. Can these medieval texts serve both literary and historical purposes? Did medieval Norsemen regard them as fact or fiction, or both? Readings will include some of the classic sagas, such as Njals saga and Laxdoela saga, as well as less well-known texts. Students will conduct independent research projects on the theme of the course. Reading knowledge of Old Norse is required; for exceptions, see the instructors. (ER)

## HIST 477(4771) Improvising Across the

 Disciplines (also COM L 477[4770], S HUM 477, HIST 677[6771])Fall. 4 credits. D. Lacapra.
Improvising Across the Disciplines. How does one best understand the concept and practice of improvisation? How is it related to processes of repetition, displacement, conversion, trauma, and radical change? How does one situate the notion of creation ex nihilo, and does it refer to an improvisational form? Is cliche the opposite of improvisation or does a crucial form of improvisation involve the recycling and possible renewal of cliche? What is the differential role of improvisation in religion, philosophy, politics, literature, and historiography? Is improvisation a specifically human capacity, serving as
another criterion to divide the human from the animal? How should one understand the recent turn to the "postsecular" as well as the more or less "creative" return of political theology? Readings include Flaubert, Nietzsche, Beckett, Heidegger, Woolf, Kristeva, Derrida, Agamben, Badiou, and Zizek. Some attention will also be paid to the music of Art Tatum. (EM)

## HIST 482(4821) Religious and Secular in American Culture (AM ST 482[4821]) [HA-AS)

Fall. 4 credits. Permission of instructor required. R. L. Moore.
This course probes American intellectual and cultural history by discounting a sharp division between what is secular and what is religious. In the United States the categories secular and religious have always interacted, allowing non-Americans to see Americans as at once the most religious of all people and the most conscious of worldly, practical matters. The readings and the writing assignments are aimed at rethinking classic debates, for example the role of religion in politics, the conflict between science and religion, and the alleged difference between religious and humanistic morality. The effort is not to convince students that Americans are unique in blending secular and religious but that key aspects of American history (the early separation of church and state, the importance of immigration and of non-European populations, the elaborate attempt to define American democracy as a moral system) have kept religion, and not just white Protestant evangelicalism, at the center of American culture. (AM)

## [HIST 483(4831) Christianization/Roman World (also CLASS 475[4625], RELST 475[4625]) " (HA-AS)

Fall. 4 credits. Next offered 2009-2010. E. Rebillard $]$

HIST 485(4850) Immigration: History, Theory, and Practice (also AM ST/ LSP 485[4850]) (HA-AS)
Fall. 4 credits. Permission of instructor required. M. C. Garcia.
This seminar focuses on immigration to the United States since 1965 . We will examine the various groups that have migrated to the United States; the immigration and refugee policy that has facilitated their entry; contemporary debates about immigration control; the transnational ties of immigrants to their homelands; guest workers programs; and the special needs of today's immigrant populations. Course requirements include participation in a service-learning project within the Ithaca/Tompkins County area that will be arranged in conjunction with the professor. Weekly sessions will feature presentations by different Cornell faculty and representatives from local social agencies and community organizations. (AM)

## HIST 486(4861) Classics and Early

 America (also CLASS 486[4861]) " (HA-AS)Fall. 4 credits. H. Rawlings.
For description, see CLASS 486. (EA)
HIST 487(4870) Seminar on Thailand (also HIST 687[6870], ASIAN 601[6601]) (HA-AS)
Spring. 4 credits. T. Loos and
T. Chaloemtiarana.

This seminar about modern Thailand tackles the issues that dominate the political,
sociocultural, economic and historic landscape of Thailand. It will ask, through critical readings about Thailand, where this noncolonized country "fits" in the scholarship on (post) coloniality, globalization, and development. We read both the classics and contemporary works on Thailand spanning the fields of the humanities and social sciences, including literature, politics, history, law, gender/sexuality studies, and anthropology. The seminar is created for upper level undergraduates and graduate students and will provide, through an in-depth look at Thailand, an important pivot point for comparativists and those in interdisciplinary studies examining countries in Asia and the developing work generally. (AS)

## [HIST 488|4880) Seminar in the Late 19th-Century European Imperialism (HA-AS)

Spring. 4 credits. Permission of instructor required. Next offered 2009-2010. I. Hull.]
[HIST 490(4900) New World Encounters, 1500 to 1800 (HA-AS)
Spring. 4 credits. Limited to 15 students. Next offered 2008-2009. J. Parmenter.]

HIST 491(4910) Approaches to Medieval Violence (also HIST 692[6920]) * (HA-AS)
Fall. 4 credits. Limited to 15 students. Permission of instructor required. O. Falk. "Violence" has become an unavoidable-and urgently troubling-buzzword in
contemporary Western culture. We worry about its manifestations and representations in our own civilization, we scan foreign societies with which we interact for any sign of it, we fantasize about consummating it or construct our utopias around its absence. This course is intended as an opportunity for students working on a variety of topics, periods and areas in medieval Europe to investigate its relevance to their own studies. Through an examination of readings on violence in particular historical contexts, from Late Antiquity to the Early Modern period, we will seek to elicit reflection on what is meant by the concept, to prompt consideration of distinctions among forms of violence, and to sample a variety of analytical approache's and tools. Graduate Students should sign up for. HIST 691. (EM)

## HIST 492(4921) India: Nation and

 Narration, History, and Literature (ASIAN 494[4494]) 요 (CA-AS)Spring. 4 credits. D. Ghosh and
A. Banerjee.

This course emerges from the history and literature of India in the 20th century. Taught by two scholars, one hased in the history department and one based in comparative literature. the readings and the films critically analyze some of the major cultural currents and political events of India by reading novels, political manifestoes, and viewing documentaries, films, visual images and architectural sites. This seminar begins with the premises of nationalism, how it is constructed, disseminated. challenged, and reassembled in the service of creating the idea of "India." It then turns to partition, the traumatic division of the Indian nation in 1947, and how this critical event has been represented in fiction, film, and history. The latter half of the course challenges ideas of Indian nationalism by using studies of space and the production of epics and history to imagine how Indian communities might be
constituted in the extended postcolonial moment we are in. (AS)

HIST 493(4930) Problems in Modern Chinese History (also HIST 693[6930], ASIAN 493/693[4493/6693]) © (HA-AS)
Fall. 4 credits. Prerequisite: HIST 294 or permission of instructor. S. Cochran. Conflicting interpretations of Chinese history during the late imperial period and the first half of the 20th century. (AS)
HIST 495(4950) Gender, Power, and Authorlity in England, 1600 to 1800 \# (CA-AS)
Spring. 4 credits. R. Weil.
It is a truism that early modern society was a 'patriarchal' one in which men had authoritybut how did that authority operate and what were its limits? How did the exercise of power between men and women intersect with religious, literary, legal and political institutions? We will approach these questions chronologically, examining the impact of the Reformation, the English Revolution, the Enlightenment, the rise of middte class and polite culture. We will also explore them methodologically and generically, with an eye to how different kids of evidence and sources can produce different kinds of conclusions. Historians' hypotheses will be tested by analysis of primary sources. (FM)
HIST 496(4961) History of Medicine and Healing in China (also ASIAN 469[4469], S\&TS/B\&SOC 496[4961]) 랑 (HA-AS)
Spring. 4 credits. T. J. Hinrichs.
An exploration of processes of change in medicine in China. Focuses on key transitions, such as the emergence of canonical medicine, of Daoist approaches to healing and longevity, of "Scholar Physicians," and of Traditional Chinese Medicine in modern China. Inquires into the emergence of new healing practices in relation to both popular and specialist views of the body and disease, "cultivating vitality" practices, modes of transmission of medical knowledge, and healer-patient relations. Course readings include primary texts in translation as well as secondary materials. (AS)
HIST 497(4970) Jim Crow and ExclusionEra America (also HIST 697[6970], AM ST 497/697[4970/6970], AAS 497[4970]) (HA-AS)
Spring. 4 credits. Limited to 15 students. D. Chang

This seminar examines America cluring the overlapping eras of segregation and immigration exclusion. Beginning with contests over the meaning of freedom during reconstruction and running through the institution of Jim Crow legislation and immigration exclusion, the course ends with an evaluation of mid-20th century movements for civil rights and equality. Themes inclucle the links between racial and economic oppression. legal and defacto restriction, everyday resistance, and struggles for equality. (AM)
[HIST 499(4990) Problems in Modern Chinese History (also HIST 694[6940], ASIAN 499/694[4499/6694]) © (HA-AS)
Spring. 4 credits. Prerequisite: HIST 294 or permission of instructor. Next offered $2008-$ 2009. S. Cochran.]

HIST 500(4997) Undergraduate Research Seminar (also AM ST 500[4997])
Fall and spring. 8 credits each semester
Offered in Cornell in Washington Program. S. Jackson.

Intensive research and writing experience using the extensive resources of Washington I).C. (AM)

## Graduate Seminars

[HIST 507(5070) Graduate Seminar: The Occidental Tourist (also HIST 207[2070], ASIAN 206[2660])
Fall. 4 credits. Next offered 2008-2009 T. Loos.]

## HIST 601(6010) European History

 ColloquiumFall and spring. 2 credits each semester. Limited to graduate students. Fall, O. Falk and D. Corpis; spring, O. Falk and
T. K. Travers.

A research colloquium designed for European history graduate students. The colloquium will offer a forum for students to present papers and to discuss the work of visiting scholars. (EM)
HIST 602(6020) East Asian Colloquium (also ASIAN 599[5599])
Fall and spring. 4 credits. K. Hirano. A forum for graduate students to present their work and discuss the work of others. (AS)

## [HIST 604(6040) Colloquium in American

 HistorySpring. 4 credits. Requirement for first- and second-year graduate students in U.S.
history. Next offered 2008-2009.
M. B. Norton.]

## HIST 605(6050) U.S.-Cuba Relations <br> (also HIST 405[4050], LAT A/SP/ <br> AM ST 405/605[4050/6050])

Spring. 4 credits. M. C. García
For description, see HIST 405. (AM) (LA)
[HIST 606(6061) The Now Cold War History (also HIST 406[4061])
Spring. 4 credits. Limited to 15 students.
Next offered 2009-2010. J. Chen.]
[HIST 607(6041) Race and Ethniclty in Latin America (also HIST 404[4041]) Fall. 4 credits. Next offered 2008-2009 Staff.]
[HIST 608(6051) Themes and Issues in Modern European History
Spring. 4 credits. Next offered 2009-2010. H. Case.]
[HIST 610(6101] Afro-American Historiography (also AM ST 610[6101])
Fall. 4 credits. Letter grades only. Next offered 2008-2009. M. Washington.]
[HIST 612(6120) Colonial Latin America (also LAT A 612[6120])
Fall. 4 credits. Next offered 2009-2010. Staff.]
HIST 614(6140) Readings in Cultural Materialism: Theory and Practice
Spring. 4 credits. K. Hirano.
The course is intended to be a forum where graduate students closely read and examine a set of scholarly works regarded collectively as the school of "Cultural Materialism." During the 1970 s and 80 s, a group of Marxism-
inspired scholars began to suggest a way to overcome the old Marxist model of economic
determinism by taking "culture" seriously as an integral part of materialist studies. This intellectual movement laid a foundation for what we currently call "Cultural Studies." By revisiting their works, we will discuss what insights we can draw from them for our contemporary scholarly agendas and projects. The readings include Lenin and Pbilosophy (Althusser), Prison Notebooks (Gramsci), Culture and Materialism (Williams), Marxism and Literature (Williams), Marxism and Pbilosophy of Language (Volosinov), Dialogic Imagination (Bakhtin), Postmodernism, or. The Cultural Logic of Late Capitalism (Jameson), and others. (AS)

## HIST 615(6150) The Past in the Present/

 The Present in the Past: Mistories of Tokugawa Japan (also ASIAN 615[6615])Fall. 4 credits. Next offered 2008-2009 K. Hirano.]

HIST 616(6160) Gender and Sexuality in Southeast Asia (also HIST 416[4160], ASIAN 416/618[4416/6618], FGSS 416[4160])
Fall. 4 credits. Limited to 15 students. Intended for graduate students. Letter grades only. T. Loos.
For description, see HIST 416. (AS)

## [HIST 617(6100) Archipelago: Worlds of

 Indonesia (also HIST 410[4100], ASIAN 409/617[4409/6617])Spring. 4 credits. Limited to 15 students. Open to undergraduates and graduate students, although with separate requirements. Next offered 2008-2009. E. Tagliacozzo.]
[HIST 618(6180) Readings in 20thContury U.S. Political, Intellectual, and Diplomatic History
Spring. 4 credits. Prerequisite: graduate standing. Next offered 2009-2010. F. Logevall.]
[HIST 619(6190) Seminar in the History of Technology (also S\&TS 626[6261])
Spring 4 credits. Open to graduate
students only. Next offered 2008-2009. R. Kline.]
[HIST 620(6200) Intelligibility in Science
Spring. 4 credits. Graduate seminar. Next offered 2009-2010. P. Dear
[HIST 623(6230) Nation, Empire, and Identity in 17 th-Century Historlography
Fall. 4 credits. Next offered 2008-2009 R. Weil.]

## [HIST 626(6260) Graduate Seminar in the

 History of American WomenFall. 4 credits. Next offered 2009-2010. M. B. Norton.]
[HIST 627(6270) Graduate Seminar in Early Amerlcan History
Spring. 4 credits. Prerequisite: graduate standing. Permission of instructor required. Next offered 2008-2009. J. Parmenter.]
[HIST 628!6280) Graduate Seminar: 19thCentury U.S. History
Fall. 4 credits. Next offered 2008-2009 E. Baptist.]
[HIST 630(6300) Topics in Ancient History (also CLASS 632[7682]) Fall. 4 credits. Next offered 2009-2010 E. Rebillard.]

HIST 631(6310) Farmworkers (also HIST 431[4310], LSP 431/631[4310/6310], CRP 395.72/679.72[3850/5850], ILRCB 402[4020])
Spring. 4 credits. V. Santiago-Irizarry.
For description, see LSP 431. (LA)
[HIST 633(6330) Topics in Ancient Greek History (also HIST 432[4320], CLASS 436/636[4360/7684])
Spring. 4 credits. Next offered 2008-2009.
B. Strauss.]
[HIST 636(6360) Ancient Warfare (also CLASS 638[7686])
Spring. 4 credits. Prerequisites: at least one course in ancient history and a reading knowledge of Greek and Latin. Permission of instructor required. Next offered 20092010. B. Strauss.]
[HIST 637(6370) Popular Culture in Europe from the Middle Ages through the 19th Century: Problems in Thinking about Cultural and Social History/Historiography
Fall. 4 credits. Next offered 2009-2010 S. Kaplan.]

HIST 638(6381) Roman Social History (also CLASS 438[4638], HIST 438[4381])
Fall. 4 credits. E. Rebillard
For description, see CLASS 437. (EA)
[HIST 639(6390) Mao and the Chinese Revolution
Spring. 4 credits. Next offered 2008-2009. J. Chen.]
[HIST 641(6410) Science, Technology, Gender: Historical Issues (also S\&TS 640[6401], FGSS 640[6400])
Spring. 4 credits. Next offered 2008-2009. S. Seth.J
[HIST 642(6420) The Politics of HistoryWriting: Historiography and Post-Colonial Criticism of South Asla Spring. 4 credits. Next offered 2009-2010. D. Ghosh.)
[MIST 648(6480) Historiography of Latin America
Fall. 4 credits. Next offered 2008-2009. R. Crail.]
[HIST 649(6481] Seminar In Latin American History
Fall. 4 credits. Next offered 2009-2010. M. Roldan.]
[HIST 654(6540) Topics in East-Contral European History
Fall. 4 credits. Next offered 2008-2009 H. Case.]

HIST 655(6550) Early Modern Atlantic World (also AM ST 655[6550])
Spring. 4 credits. M. B. Norton.
A graduate reading course. Will introduce students to the new burgeoning field of
Atlantic history in the early modern period. (AM)
[MIST 656(6560) Topics in Medieval Historiography (also HIST 456[4560]) Spring. 4 credits. Permission of instructor required. Next offered 2009-2010. O. Falk.]
[HIST 661(6610) Graduate Seminar in 20th-Century German History Fall. 4 credits. Permission of instructor required. Next offered 2008-2009. I. Hull.]
[HIST 663(6630) Graduate Seminar in Renaissance History
Fall. 4 credits. Next offered 2008-2009. J. Najemy.l

HIST 664(6641) Medieval Poverty
Fall. 4 credits. P. Hyams.
Poverty is one of those topics that historians all too often neglect. Yet it, and its corollary, wealth, are in a sense everybody's concern, in the past as well as present. How people define it and what they make of it are among the most important measures of a culture. Modern approaches to the subject have advanced rapidly in the past generation, mostly due to changed attitudes toward matters like economic development, famine, and natural disaster. The conceptualization and study of poverty in the medieval past has not kept pace with these changes. The classic work on the subject dates from 1978 and reflects the thought of the immediate post-War period. This seminar will explore the ways in which we might redefine poverty to better comprehend its economic and other consequences. (ER)
HIST 665(6651) Historical Documents on Modern China (also CHIN 426[4425], HIST 465[4651])
Fall. 4 credits. I'rerequisite: equivalent of
three years Mandarin instruction.
Permission of instructor required. Z. Chen. For description, see CHIN 426. (AS)

## HIST 667(6671) Spartacus (also CLASS

 667[7667])Spring. 4 credits. B. Strauss
A seminar on the causes, nature, course, and results of the Spartacus War against Rome, 7371 B.C. Readings in Latin and Greek as well as English. Open to grad students in History and Classics and to qualified seniors who receive permission of the instructor. (F.A)
[HIST 669(6691) The Old English Laws and Their Politico-Cultural Context (also HIST 469[4691], ENGL 419[4190])
Fall. 4 credits. Next offered 2009-2010. P. Hyams and T. Hill]
[HIST 672(6720) Seminar in European Intellectual History
Fall. 4 credits. Next offered 2008-2009. D. LaCapra.]

HIST 673(6730) Topics in Modern European Intellectual History (also COM L 673[6730], JWST 674[6740]) Spring. 4 credits. D. Lacapra.
HIST 676(6760) Mistory and Story in the North Sagas (also HIST 476[4760])
Spring. 4 credits. O. Falk and T. Hill
For description, see HIST 476.
HIST 677(6771) Improvising Across the Disciplines (also COM L 477[4770], S HUM 477, HIST 477[4771])
Fall. 4 credits. D. LaCapra.
For description, see HIST 477. (EM)
HIST 680(6800) Historical Approaches to Science (also S\&TS 680[6801])
Fall. 4 credits. P. Dear.
Examines philosophical, sociological. and methodological dimensions of recent historiography of science. (HS)

## HIST 681(6810) Intellectual History of

 Emplre (also ASIAN 681[6681])Spring. 4 credits. J. V. Koschmann and N. Sakoi.

What kinds of ideas, philosophies, or legitimating ideologies are associated with empires? What imperial roles are assumed by intellectuals and with what effect? By juxtaposing comparatively what are often thought to be radically different cases of imperial dominance-the Japanese and the American-this graduate seminar will attempt to generate new insights regarding the intellectual mobilization that accompanies empire in these, and other, places and times (AS)
[HIST 683(6830) Seminar in American Labor History (also ILRCB 783[7081])
Fall. 3 credits. Prerequisite: graduate standing. Next offered 2009-2010.
N. Salvatore.]

## [HIST 686(6861] Readings in Japanese Historlography (also ASIAN 686[6686])

Spring. 4 credits. Next offered 2008-2009 K. Hirano.]

HIST 687(6870) Seminar on Thailand (also HIST 487[4870], ASIAN 601[6601])
Spring. 4 credits. T. Loos and
T. Chaloemtiarana.

For description, see HIST 487. (AS)
HIST 688(6880) History of Vietnam (also HIST 388[3880], ASIAN 385/685[3385/6685])
Fall. 3 credits. K. Taylor.
For description, see ASIAN 385. (AS)

## HIST 692(6920) Approaches to Medieval

 Violence (also HIST 491[4910])Fall. 4 credits. O. Falk
For description, see HIST 491. (ER)
HIST 693(6930) Problems in Modern Chinese History (also HIST 493[4930], ASIAN 493/693[4493/6693])
Fall. 4 credits. S. Cochran.
For description, see HIST 493. (AS)
[HIST 694(6940) Problems in Modern Chinese History (also HIST 499[4990], ASIAN 499/694[4499/6694])
Fall. 4 credits. Prerequisite: HIST 294 or permission of instructor. Next offered 2008-2009. S. Cochran.]

HIST 696(6960) Southeast Asian Mistory from the 18th Century (also HIST 396[3960], ASIAN 396/696[3960/6696])
Spring. 4 credits. T. Loos.
For description, see HIST 396. (AS)
HIST 697(6970) Jim Crow and Exclusion. Era America (also HIST/AAS 497[4970], AM ST 497/697(4970/8970])
Fall. 4 credits. Limited to 15 students D. Chang.
[HIST 698(6980) Seminar in Japanese Thought (also ASIAN 698[6698])
Spring. 4 credits. Prerequisite: reading knowledge of Japanese. Next offered 2008-2009. J. V. Koschmann.]
HIST 709(7090) Introduction to the Graduate Study of History
Fall. 4 credits. Requirement for first-year
graduate students. I. Hull and
M. B. Norton.

This course is designed to introduce entering graduate students to crucial issues and
problems in historical methodology that cut across various areas of specialization. (HR)

HIST 711(7110) Introduction to Science and Technology Studies (also S\&TS 711[7111])
Fall. 4 credits. M. Lynch and S. Pritchard. For description, see S\&TS 711. (HS)
HIST 804-807(8004-8007) Supervised Reading
4 credits each semester. Prerequisite: graduate standing. Permission of instructor required. Staff. (HR)

## HISTORY OF ART

S. Samuels, chair; A. Alexandridis,
J. E. Bernstock, M. I. Dadi, M. Fernandez,
C. Finley, S. Hassan, C. Lazzaro, K. McGowan, L. L. Meixner, A. Pan, A. Ramage, J. Rickard, C. Kobinson, T. Tu

The Department of the History of Art provides a broad range of introductory and advanced courses in Western art (European and North American) and non-Western art (East and Southeast Asian, African), from antiquity to the present.

## The Major

Department majors acquire a broad understanding of the history of art in several chronological and geographical areas: ancient, medieval, Renaissance, modern (Europe and North America), Southeast Asia, China, Japan, and Africa. Additionally, majors practice a range of art historical methods and interpretive strategies, including connoisseurship, dendrochronology, feminism, iconography, semiotics, and social history. Majors are encouraged to locate the history of art within allied humanities fields and the applied arts by taking courses in history, literature, history of architecture, and fine arts. The study of foreign languages is strongly encouraged

## Requirements for the Major

Prospective majors should consult the director of undergraduate studies. Students wishing to declare a major in the history of art should have completed any two courses above the 100 level at Comell in the department by the end of their sophomore year and have received a grade of B - or above in both. Courses must be taken for a letter grade. These courses count toward the total 44 credits. The major in the history of art requires 44 credits, 30 at the 300 level or above. The core requirements are: proseminar; another seminar at the 400 level or above; two courses on art from the following time periods: Ancient Europe, Medieval/Islamic, or Renaissance/Baroque (one course per time period); two courses on art from the three following geographical areas: Africa, Asia, or Latin America (one course per region); and two courses on modern/contemporary art in Europe and North America, including art from outside the Anglo-American tradition. In addition to the 44 credits, majors are required to take two courses, approved by their advisors, in areas related to the history of art.

## Honors

To become a candidate for the degree of bachelor of arts with honors in the history of art, a student must have a cumulative average of A- for all courses taken in the department
and $\mathrm{B}+$ in all arts and sciences courses Application to write an honors thesis should be made to the director of undergraduate studies during the second semester of the junior year. Students are advised to enroll in ART H 497 Honors Research at this time. The application must include a summary of the proposed project, an endorsement by a faculty sponsor, and a copy of the student's transcript In the senior year the honors candidate will include ART H 498 and 499 in his or her course load. These courses address the research and writing of the senior thesis under the direction of the student's project advisor.

## Course Numbering System

100 -level courses are first-year writing seminars
200-level courses are introductions to the major subdivisions of Western art and art outside the West.
300 -level courses are intermediary courses addressing more specialized topics or epochs.
400 -level courses are seminars primarily for advanced undergraduates and graduate students.
500 -level courses are seminars primarily for professional level

600-level courses are seminars primarily for graduate students.

## First-Year Writing Seminars

For first-year writing seminar offerings in the history of art, consult the John S. Knight Institute brochure for times, instructors, and descriptions. These courses may not be used to satisfy the distribution requirement or the major.

## Courses

ART H 202(2100) Survey of European Art: Renaissance to Modern \# (CA-AS)
Summer only. 3 credits. D. Royce-Roll. The major traditions and movements in western European art from the Renaissance to the modern period. Painting, sculpture, and architecture with an emphasis on painting. Each Friday class meets at the Johnson Museum of Art with gallery talks and viewing of relevant works that supplement the previous four days of classroom lectures.
[ART H 209(2190) The Immigrant Imagination (also AM ST 227[2091]) (HA-AS)
4 credits. Limited to 15 students. Next offered 2008-2009. T. Tu.]
[ART H 219(2019) Thinking Surrealisms (also COM L 220[2200], VISST 219[2190]) (LA-AS)
Spring. 4 credits. Next offered 2008-2009. B. Maxwell.]

ART H 220(2200) Introduction to Art History: The Classical World \# (HAAS)
Fall. 3 credits. Staff.
The course is an overview of the art and archaeology of the Greek and Roman world, covering the sculpture, vase painting, and architecture of the ancient Greeks from the Geometric period through the Hellenistic, and the art of the Romans from the early Republic to the time of Constantine the Great

ART H 245(2400) Introduction to Art History: Renaissance and Baroque Art (also VISST 245[2645]) \# (HA-AS)
Fall. 4 credits. Each student must enroll in a sec. C. Lazzaro.
Surveys major works of European artists from 1400 to 1700 , including all arts, with an emphasis on painting and on analysis of the artworks. As a frame for interpreting these works, we will emphasize the social, religious, and political contexts in which artists worked and the role of patrons in the creative process. The course will also serve as an introduction to the art historical approaches through which we interpret these works today.

## ART H 250(2350) Introduction to Art History: Islamic Art and Culture 훙 (HA-AS)

Fall. 4 credits. C. Robinson. Spanning the years between the advent of Islam as one of the world's great religions in the early 7 th century A.D. and the end of the 14 th century A.D., this course will place significant emphasis on, in addition to religious architecture and mobilier, the secular world, its built environments and its material culture (palaces, gardens, places of the imagination, Arts of the Book). Lectures and readings will attempt to situate these structures and objects in a framework or context which will enrich students' understanding of them and of the cultures which produced them. Two weekly slide lectures and occasional section meetings. Readings will include a textbook and limited selection of articles on e-reserve; assignments will include two in-class and two take-home exams plus two shorter writing assignments.

## ART H 255(2355) Introduction to Art History: Medieval Art and Culture \# (CA-AS)

Spring. 4 credits. C. Robinson. Survey lecture course covering the creation, encoding, and reception of Medieval (roughly AD 500-1500) European architecture, ornament, manuscripts, liturgical and luxury objects. The approach is thematic but chronologically grounded; attention is also given to cultural interaction in the Mediterranean basin.

## ART H 260(2600) Introduction to Art History: The Modern Era (CA-AS)

Spring. 4 credits. Not open to students who have taken ART H 261. Each student must enroll in a sec. J. Bemstock.
Considers modern art in a historical and cultural context, from painting associated with the French Revolution through American pop art. The emphasis is on major movements and artists: Neo-Classicism (David), Romanticism (Delacroix), Realism (Courhet), Impressionism (Monet), Post-Impressionism (Van Gogh), Cubism (Picasso), Fauvism (Matisse), Surrealism (Miro), Abstract Expressionism (Pollock), and Pop Art (Warhol). Different critical approaches are examined.

## ART H 272(2672) Art, Politics, and Social

 Imagination: Art of the Avant-Gardes Summer. 4 credits. J. Stojanovic. The course focuses on development of modern art in the first third of the 20th century. It introduces the main themes of art in the period and summarizes the political context in which art developed: the First World War, the Russian Revolution, and the subsequent consolidation of the European dictatorships. A series of case studies that illuminate the important idea of "expression"in art, related questions of Orientalism and the "primitive," aspects of Cubism, are examined along with the development of abstract art, and the radical avant-garde movementsDada, Soviet Constructivism, Surrealism

## [ART H 306(3600) Introduction to Art History: Contemporary Art: 1960 to Present (CA-AS)

4 credits. Prerequisite: ART H 260 or equivalent. Next offered 2008-2009. I. Dadi.]
[ART H 307(3607) Orientalism and Representation © (HA-AS)
4 credits. Next offered 2008-2009. I. Dadi.]
ART H 309(3250) Introduction to Dendrochronology (also CLASS 330[3750]) \# (HA-AS)
Fall. 4 credits. S. Manning.
For description, see CLASS 330.

## ART H 320(3210) The Archaeology of the City of Rome (also CLASS 336[3736])

Spring. 4 credits. A. Alexandridis.
This lecture is a history of Rome and its Empire from 700 BC to 400 AD through the urban image of the capital itself. Beside a chronological and topographical overview of the city's development main emphasis will be on five aspects of the urban space: 1 . The relationship of power, ritual and space (fora, the most important temples, the residences and funerary monuments of the emperors, finally the churches) 2. Entertainment and public spectacle (baths, the Colosseum, theatres). 3. Economy and trade (storehouses at the Tiber, Monte Testaccio, Rome's harbour Ostia). 4. Infrastructure (Cloaca maxima, aquaeducts, city quarters). 5. The boundaries of the city (the question of the pomerium, the city walls, roads leading into the city).

## ART H 322(3202) Arts of the Roman Empire (also CLASS 350[3740]) \# (HA-AS)

Fall. 4 credits. Prerequisite: permission of instructor. Staff.
The visual arts in the service of the first world state. Starts with the architecture, painting, and sculpture of the Etruscan and Republican period but concentrates on monuments of the Imperial era in Italy and the provinces until the time of Constantine. Art made for private patrons is considered, along with the official presentations of the emperors.

## ART H 324(3224) Hellenistic Culture (also CLASS 344[3744])

Fall. 4 credits. A. Alexandridis. Full title: Hellenistic Culture: The Age of Alexander-Globalization in the Ancient World? With Alexander the Great's conquest of the Near and Middle East Greek language, education and material culture was disseminated at one fell swoop in a vast area, from the Mediterranean to India. It left a long lasting imprint even on areas that had formerly not been under primary Greek influence like the Persian Empire. On the other side, the encounter with so many different people and cultures deeply transformed Greek language, religion and material culture itself while at the same time engendering a canonical idea of "Greekness". And it created a manifold amount of mixed and specifically local cultures. The lecture will analyze this process and try to understand whether it can be understood as a pre-modern example of "globalization." The class will deal with the period from the advent of Alexander
the Great ( $336-323 \mathrm{BC}$ ) until the end of the last Hellenistic kingdom, the Egypt of Cleopatra VII. ( $51-30 \mathrm{BC}$ ). We will focus on phenomena such as urbanization and the formation of civic identities; assimilation and conflict, especially in a Jewish context; the advent of new Eastern religions; economy and trade routes as well as gender relations. The period as a whole, has only recently become a focus of combined historical, philological and archaeological research. Therefore, current scholarly debates will form an integral part of the course.

## ART H 330(3230) Iconography of Greek Myth (also CLASS 337[3727])

Spring. 4 credits. A. Alexandridis.
Myths are traditional tales. Their authority becomes apparent in that they were constantly adapted to changing social, political, cultural etc. conditions. Although this seems to be a widely accepted definition so far, it is deeply influenced by Greek tradition. Not only is the term mythos (word, tale) Greek, but the ubiquity of Greek gods, heroes and their deeds in ancient literature and material culture has given myths an importance they might not have had in other cultures. This class will give an overview of the most important Greek myths and mythological figures as depicted in Greek and Roman times. The chronological frame will range from the 7 th century BC to the 3 rd century ad. We will discuss the iconography of the Olympian gods and their escorts; of myths such as the loves of the gods; the battles between the Olympian Gods and the Giants, between Greeks and Amazons as well as between Lapiths and Centaurs; the Trojan War; the adventures of Odysseus; the heroic deeds of Heracles, Theseus and Perseus among others. By analyzing where and when mythological images were on display it will become clear how myths were adapted to their specific context as well as why certain myths were more often depicted or more popular than others.

## [ART H 343/3443) Art and Society in

 Early Renaissance Italy " (HA-AS)4 credits. Next offered 2008-2009
C. Lazzaro.]

## ART H 344(3440) Leonardo,

 Michelangelo, and Raphael \# (HA-AS)Spring. 4 credits. C. Lazzaro.
This course examines each of the three great artists of the 16 th century, Leonardo, Michelangelo, and Raphael, as a thinker as well as an artist, through his own writings together with his works of painting, sculpture, and architecture. It also analyses the contemporary constructions of the artist as genius. Leonardo was an extraprdinarily innovative painter partly because of the breadth of his thinking. This course examines his treatises on anatomy, natural science, and engineering as well as artistic practice. Michelangelo conceived of grandiose artistic projects for his equally ambitious patrons, and his novel visual language has parallels with the verbal language in his poetry. Raphael was the consummate court artist, and also antiquarian and archaeologist, who produced a new classicism in the 16 th century.

## ART H 349(3149) Artistic Idently through Time: From Anonymous to Magnanlmous (HA-AS)

Fall. 4 credits. P. Morin.
Surveys the variety of roles artists/architects have assumed, constructed, or negotiated over time. The social economic status of the artists
has ranged from priestly demigod to slave, manual laborer to intellectual, bohemian to member of the bourgeoisie, craftsperson to visionary, activist to actor, spectator to hero Constructions of genius and personal negotiation of identity are explored through a variety of sources, including philosophical texts, biography, treatises, popular press, and film. We consider artistic identity through gender, ethnicity, nationality, and social economic status. Artistic productions including architecture, painting, sculpture, installation, and performance are examined from the time of the Pharaohs to the present day, from Imhotep to Warhol.

## ART H 350(3100) History of Photography

 (LA-AS)Spring and summer. 4 credits. I. Dadi Provides a survey of the history of photography over a course of two centuries. Starting with its invention in the 1830 s, this course covers the subject both topically and chronologically. During the 19 th century, it focuses on its technical development and on the complex relations that situate photography in relation to painting, portraiture, urban life, war, anthropology, exploration and travel, and science and industry. While these topics continue to be important during the 20 th century, photography has been enriched by new developments that include its use as a modernist and experimental art form, in social documentary and photojournalism, in propaganda, in advertising and fashion, and its centrality in the practice of conceptual art, postmodernism, and in the digital age.

## [ART H 355(3300) Romanesque and Early Cothic Art and Architecture: Europe and the Mediterranean, 900 to 1150 AD (LA-AS)

Fall. 4 credits. Next offered 2008-2009. C. Robinson.]
[ART H 353(3301) Gothic and the Medieval World \# (LA-AS)
Spring. 4 credits. Next offered 2008-2009. C. Robinson.]
[ART H 360(3740) Painting 19th-Century America (also AM 5T 360[3740]) \# (CA-AS)
4 credits. Recommended: ART H 245. Next offered 2008-2009. L. L. Meixner.]

## ART H 362(3760) Impressionism in

 Soclety (also VIS8T 3623660]) : (CA-AS)Spring. 4 credits. Not open to freshmen Recommended: ART H 245. L. L. Meixner. Discusses French Impressionist art as products of 19 th-century public life. By relating Impressionism to state culture, including Universal Expositions, the course traces subversive themes such as criminality, café and brothel societies, clandestine prostitution, and class-regulated leisure. Students consider images of Parisian spectacle and commodity culture (Manet, Cassatt, Degas, ToulouseLautrec) as well as French landscapes (Monet, Van Gogh, Pissarro). Special topics include artists' relationships to novelists (Zola), poets, and the avant-garde theater as well as the construction of the artist and courtesan in Puccini's La Boheme and Verdi's La Traviata. Images include postcards, playbills, medical photographs, and posters. Organizing our historical units is the theme of power and vision with attention to the female gaze, voyeurism, surveillance, and scopophilia.

ART H 365(3605) U.S. Art from FDR to Reagan (also AM ST 355[3605]] (LA-AS)
Fall. 4 credits. Each student must enroll in a sec. J. E. Bernstock.
Considers the contextual features of American art from the 1930s through the late 1980s. Examines art in relation to contemporary politics, society and literature. A few of the developments on which the course focuses are: Abstract Expressionism, Pop Art, Earth Art, and Feminist Art. Examines various critical approaches.

## ART H 366|3650) History and Theory of Digital Art (also VISST 366[3650]] (CA-AS)

Fall. 4 credits. M. Fernandez.
In this course students will examine the role of mechanical, electronic, and digital technologies in the arts of the late 20th and 21st centuries with emphasis on Europe and North America. Beginning with kinetic ant and the cybernetically inspired work of the late sixties, we will explore early uses of computer technology, including early work in synthetic video in the 1970 s. An overview of preInternet telematic experiments will lead to an investigation of net art. The ongoing development of behavioral art forms including interactive art and interactive installation will be a central theme. Critical evaluation of various attitudes concerning technology will be encouraged.

## ART H 368(3550) Modern and Contemporary Latin American Art (also LSP 368[3551], LAT A 368[3680]) (MA-AS)

Spring. 4 credits. M. Fernandez. This course is designed as a thematic survey of Latin American art from the early 20th century to the present. Attention is given to issues such as: the effect of colonialism on Latin America's visual arts, the creation of national artistic styles, the relation of Latin American art and artists to European and American culture centers, the interaction of high art and popular culture, the role of art criticism on popular perceptions of Latin American Art, and the contributions of Latin American women to various aspects of artistic practice. Special classes will examine border arts and Latin American artists' exploration of electronic technologies.

## ART H 371(3171) Architectural History of Washington, D.C. " (HA-AS)

Fall or spring. 4 credits. Prerequisite:
students in Cornell in Washington
program; nonarchitects. P. Scott.
Historical and critical survey of the architecture of Washington. Attention is given to the periods, styles, architects, and clientspublic and private-of the notable buildings and to the urbanscape of the nation's capital. The vocabulary of architectural analysis and criticism is taught. Field trips required.

## ART M 377(3500) African American Art

 (LA-AS)Spring. 3 credits. S. Hassan.
This course investigates the different forms of African-American visual artistic traditions in relation to their historical origins and sociocultural context from the early days of slavery to the present time. We start with an overview of African art and the experiences of the Middles Passage and slavery in relation to African-American traditions in the decorative arts including: pottery, architecture, ironwork, quilt making, and basketry. This is followed
by a fine-art survey starting with the 18 th and 19th centuries and continuing through the early-20th-century Harlem Renaissance up to the present. Certain issues related to AfricanAmerican arts and creativity such as improvisation, Black Aesthetic, and Pan Africanism also are explored. Slides, films, and filmstrips are used extensively to illustrate topics discussed. Visits to museums and relevant current exhibitions may be arranged.

## ART H 378(3510) Introduction to Afrlcan

 Art (also Ass RC 310[3501]) (2)
## (LA-AS)

Fall. 3 credits. S. Hassan. Survey of the visual art and material cultural traditions of sub-Saharan Africa. It aims at investigating the different forms of visual artistic traditions in relation to their historical and sociocultural context. The symbolism and complexity of traditional African art are explored through the analysis of myth, ritual, and cosmology. In-depth analysis of particular African societies is used to examine the relationship of the arts to indigenous concepts of time, space, color, form, and sociopolitical order. New and contemporary art forms associated with major socioeconomic changes and processes of assimilation and accumulation also are explored. These include tourist art, popular art, and elite art.

ART H 380(3800) Introduction to the Arts of China (also ARKEO 380[3880]) e: (LA-AS)
Fall. 4 credits. A. Pan.
This course offers a survey of the art and culture of China, from the Neolithic period to the 20th century. We begin with an inquiry into the meaning of national boundaries and the controversy of the Han Chinese people, which helps us identify the scope of Chinese culture. Pre-dynastic (or prehistoric) Chinese culture is presented through both legends about the origins of the Chinese, and scientifically excavated artifacts. Art of the dynastic and modem periods is presented in light of contemporaneous social, political, geographical, philosophical and religious contexts. Students work directly with objects in the Herbert F. Johnson Museum of Art.

## ART H 384(3820) Introduction to the Arts of Japan © (LA-AS)

Spring. 4 credits. A. Pan.
As an island nation east of the Asian continent, Japan developed a unique culture that reflects both continental and indigenous characteristics. This course examines pre-and post-contact with continental culture and the process of artistic acculturation and assimilation in successive periods of Japanese art history.

## ART H 38s(3005) Representation and

 Meaning in Chinese Painting © (CA-AS)Summer. 4 credits. A. Pan.
Using major monuments of art, this course introduces various genres of Chinese painting through sociopolitical and religious history. The focus is on understanding the aesthetic criteria, artistic movements, stylistic transformations, and agendas of different social classes. Weekly sections meet at the Herbert F. Johnson Museum so that students can gain first-hand experience examining and handling Chinese paintings.
[ART H 390(3520) African American Cinema (LA-AS)
Fall. 4 credits. Next offered 2008-2009. C. Finley.]

ART H 395(3855) The House and the World: Architecture of Asia (also VISST 394[3655]) © " (MA-AS)
Spring. 4 credits. K. McGowan.
ART H 396(3850) The Arts of Southeast Asla [also VISST 396[3696] 흉 (CA-AS]
Fall. 4 credits. K. McGowan.

## Seminars

Courses at the 400 to 600 level are open to juniors and seniors, majors, and graduate students unless otherwise stated. All seminars involve the writing and presentation of research papers. Enrollment is limited to 15 students, anid permission of the instructor is required. Students may repeat courses that cover a different topic each semester.

## ART H 400(4100) Proseminar (also VISst

 400[4200], ART H 600[6100]) (HA-AS)Fall and spring. 4 credits. Limited enrollment. Prerequisite: history of art majors. Grads should enroll in 600. M. Fernandez and I. Dadi.

Works of art have always engendered political, social, and cultural meanings. This seminar introduces the methods that art historians have engaged in, studying the objects and ideas that constitute the historiography of their discipline. Challenged and enlarged by cultural debates over issues of class, ethnicity, nationality, sexual orientation, and gender, the field of art history is expanding to incorporate problems of assessing quality of intention and reception along with authorship, of artistic production in place of artistic creation, and of Western-oriented attitudes to race in reference to orientalism and colonialism. Readings focus on historically situating methods and the implications of their cross-cultural application. Papers encourage students to put methods into practice, realizing in the process that subject matter is not an isolated choice to which methods are applied, but something that profoundly affects the approach the researcher brings to the writing of art history. In addition to the seminar meeting from 2:30 to $4: 30$, students are required to attend the Visual Culture Colloquium held on most Mondays from 5:00 to 6:30 P.M.

## ART H 401(4991) Independent Study

Fall or spring. 2-4 credits; may be repeated for credit. Prerequisite: permission of department faculty member.
Individual investigation and discussion of special topics not covered in the regular course offerings, by arrangement with a member of the department.
ART H 402(4992) Independent Study
Fall or spring. 2-4 credits; may be repeated for credit. Prerequisite: permission of department faculty member.
Individual investigation and discussion of special topics not covered in the regular course offerings, by arrangement with a member of the department.

## ART H 403(4003) Modernity and Critlque (also S HUM 426)

Spring. 4 credits. Limited to 15 students. B. Maxwell.

Modernity: the condition of life attendant on the massive dislocations commencing with the process defined by Marx as the "primitive
accumulation" of capital. As the psychogeographic regime of "transcendental homelessness" (Lukảcs), as an "exploded picture puzzle" (Bloch), modernity provoked critical examinations by Marxist and anarchist thinkers, extraordinary often in their insight and often enough in their blindness to the world beyond Europe. Surrealism arguably breached the self-enclosure of European radical thought and met a world of anger and analysis speaking its own languages of critique: Cèsaire, Fanon. The subsequent work of Debord, Vaneigem, and others of the Situationist International shows both the ruins of the earlier projects and important means for living critically in and against our moment. These matters are what we will study.

ART H 407(4107) The Museum and the Object (also VISST 407[4607]) (CAAS)
Fall. 4 credits. Prerequisite: history of art majors; freshmen and sophomores by permission of instructor. All classes meet in Johnson Art Museum study gallery. K. McGowan.

Gives advanced students the opportunity to work directly with original objects from the collection in the Herbert F. Johnson Museum. Focuses on art and connoisseurship by questioning the ways quality is determined in works of art. Topics include methods of attribution, fakes and forgeries, technique and media, restoration and conservation, art education and theories of perception. Session leaders include the curatorial staff of the art museum.

## [ART H 408(4508) Exhibiting Cultures: Museums, Monuments, Representation and Dispiay (also ART H 608[6508], AS\&RC 408/608[4504/6508], AM ST 408/608[4508/6508]) (CA-AS)

Fall. 4 credits. Grads should enroll in 608. Next offered 2008-2009. C. Finley.]

## ART H 409(4509) Black Arts Movement [also ART H 609[6509], AS\&RC 409/609[4505/6509], AM ST 409/609[4509/6509]]

## Fall. 4 credits. C. Finley.

This course examines the art, music, literature and film of the Black Arts Movement (19651972), an explosive cultural flourishing that emerged in the United States in the wake of African liberation and decolonization movements in the 1950s and 1960 s as well as the Civil Rights and Black Power movements of the same period. Visual art practices such as abstraction (Mel Edwards and Barbara Chase-Riboud), collage (Romare Bearden), performance (Faith Ringgold) and photography (Roy DeCarava, Dawoud Bey) will be examined alongside pioneering works of revolutionary theatre (Le Roi Jones), activist poetr̄y (Nikki Giovanni), jazz (John Coltrane, Thelonious Monk), soul (James Brown,
Marvin Gaye and Curtis Mayfield) and rock-nroll (B.B. King, Jimi Hendrix). The transition from race cinema to experimental film to Blaxploitation (Melvin Van Peebles and Pam Grier) also will be studied in this seminar There will be film screenings and guest lecturers.

## [ART H 410(4310) Methods in Medieval * (CA-AS)

4 credits. Next offered 2009-2010.
C. Robinson.]
(ART H 411(4311) The Multicultural Alhambra
4 credits. Next offered 2008-2009.
C. Robinson.]
[ART H 412(4312) The Late Medieval Art of Devotion \# (HA-As)
4 credits. Next offered 2008-2009.
C. Robinson.]
[ART H 413(4113) Race, Technology and Visuality (also AAS 413[4130], AM ST 412[4113]) (CA-AS]
4 credits. Next offered 2009-2010. T. Tu.]
[ART H 414(4114) Popular Culture and Visual Practice in Asian Amerlca (also AAS 414[4140], AM ST 414[4114]) (CA-AS)
4 credits. Next offered 2008-2009. T. Tu.]
ART H 415(4315) Visualizing the Sacred Iberia (also ART H 615[6315], NES 423/623[4523/6523])
Fall. 4 credits. Comfortable reading knowledge in Spanish required.
C. Robinson.

Full Title: Visualizing the Sacred in Late Medieval Iberia: Images and Image Devotion in a Multi-confessional Landscape. This seminar will examine the role of images, including "sacred" or "miraculous" ones, in the Christian, Jewish and Muslim Iberian devotional imaginaire during the final centuries of the Middle Ages. Readings will proceed from a diverse range of primary sources both in translation and in the original, as well as scholars such as Belting, Bynum, Echevarria, Hamburger, Hames, Lopez-Baralt, Narvaez-Cordoba, Pereda, Puerta Vilchez, Robinson, Surtz, and others. The class is, in part, conceived as part of the preparations for an exhibition to be held in the Johnson Museum in 2010 entitled "Constructions of Devotion," about which students will learn (a great deal...) more in the class.

## ART H 421(4021) Undergraduate Seminar in Cultural History (also HIST/AM ST 421[4120])

Fall. 4 credits. M. Kammen.
For description, see HIST 421.

## [ART H 422(4322) The Late Medieval

 Devotional Image in Iberia " (CA-AS) 4 credits. Next offered 2010-2011. C. Robinson.]ART H 425(4525) Rastafari, Race, and Resistance (also AS\&RC 426[4526], VISST 425[4625]I
Fall. 4 credits. P. Archer-Straw. Seminar focusing on Jamaican artists whose images stem from Rastafarianism. Examines how their cultural expression born out of a clash of European and African civilizations challenged western cultural values and posited new ways of talking about race and spirituality. Rastafarianism is viewed as an aberrant modern paradox, at once a vehicle for racial resistance and a belief system advocating universal equality.

## ART H 435(4235) Metamorphosis (also ART H 635[6235], CLASS 437/637[4737/7737])

Fall. 4 credits. A. Alexandridis.
The term metamorphosis is used according to discipline to designate (among others) physiological, psychical, textual or cultural transformations. This seminar focuses on Greek and Roman culture, so we will predominantly discuss body transformations of gods, humans, animals and plants as
represented in antiquity. We will explore the relationship between metamorphosis and concepts such as masquerade, fantasy, hybridity, plurality, alterity and transgression. We will also ask whether the idea of transformation developed by the Latin poet Ovid in his Metamorphoses, which stresses the discrepancy between old or unaltered mind and new body, can be applied to/help to understand Greek and Roman imagery. Given the rich variety of fields taught at Cornell as well as its interdisciplinary tradition, the (optional) goal of this class is to organize a conference on various aspects and uses of the concept of "metamorphosis" in different disciplines

## ART H 438(4938) Leon Battista Alberti: Architect as Orator <br> Fall. 4 credits. P. Morin.

Alberti's work reverberates with the voices of other texts and edifices. This class investigates the work of Alberti in relation to these literary and architectural precedents. The seminar combines weekly lectures on selected themes with student individual research projects. Themes include the construction of architectural identity, the quest for fame, aesthetic theory and its origins in classical rhetoric, the literary origins of artistic method, and society and space. The objective of the course is to familiarize the student with all of Alberti's primary works on the arts, both painting and architecture as well as some of his more important literary texts which position him in Renaissance literary culture. This course also examines the myth of Alberti created by scholars versus Alberti's selfconstructed persona. As a means of unpacking Renaissance aesthetic theory, students are introduced to Classical communications theory through the texts of Aristotle and Cicero.

## ART H 439(4939) The Architectural Treatise In the Renaissance: Tradition and Innovation

Spring. 4 credits. P. Morin.
One of the most inventive periods in Western architecture will be examined through architectural treatises. Vitruvius' Ten Books of Architecture, the only architectural treatise to have survived antiquity, was the foundation from which architectural theory was built in the Renaissance. Alberti's De re aedificatoria (1452), inaugurated a period of intense architectural treatise writing. This seminar examines Renaissance treatises, which include Filarete's Libro architettonico (1460), Francesco Colonna's Hypnerotomachia Poliphili (1499), Philibert De L'Orme's Le Premier tome de l'Architecture (1567), Sabastiniano Serlio's Architeltura (1584), and Palladio's Quattro Libri dell'Arcbitettura (1570). We will examine the myths and evolution of the architectural order, issues of authority, origins, imitation, invention and communication. Through our engagement with architectural texts we will study the impact of sciences, new technologies, politics, domesticity, and morality.

## ART H 444(4144) Responsive Environments (also ART H 644[6144]) (CA-AS) <br> Spring. 4 credits. M. Fernandez.

This seminar will examine notions of interactivity, immersion, and responsiveness in works of art and architecture from the 1950 s to present. Select historically significant works in traditional media, telematics, machine sculpture, interactive and digital installation
will be explored as well as more recent genres of artistic practice including interactive cinema, locative media and video games. Theorizations of interactivity, addressing narrativity, performativity, embodiment, 'liveliness" and the sensual and affective engagement of the user with the work will be discussed, as will the relation of art and surveillance, and the relation of "high art interactivity with popular techno-cultural forms. The relevance of these topics to architecture will be a recurrent theme.

## ART H $\mathbf{4 4 8}(\mathbf{4 4 4 0})$ Constructing the Self in

 the 16th Century " (HA-AS)Spring. 4 credits. C. Lazzaro.
This seminar examines the construction of the self through gender, class, and group identity in early modern Europe, especially Italy. Portraits, self-portraits, and autobiographies recorded "self-fashioning" in clothing, bearing, gesture, manners, and speech, while etiquette manuals instructed in "civility," the mark of class and education. The course considers some of the public and private settings in which the social self was performed, among them studies and banquets, as well as such socially constructed identities as the male adolescent and the artist.

## [ART H 450(4450) Women in Italian Renaissance Art (also FGSS 451[4510]) " (HA-AS)

4 credits. Prerequisite: permission of instructor required. Not open to freshmen or sophomores. Next offered 2008-2009. C. Lazzaro.]

ART H 451(4451) Prints and Visual Culture in Early Modern Europe (HA-AS)
Fall. 4 credits. C. Lazzaro
This seminar introduces students to prints and to the major printmakers of the period, including Marcantonio Raimondi, Dürer, and Rembrandt, while giving then first-hand experience with original prints in the Herbert F. Johnson Museum. Weekly readings consider the uses, appreciation, handling, and collecting of prints, as well as the social. cultural, and political issues raised in their subject matter and through their unique visual language. Among these issues are the social hierarchies of class and gender (including witches), moral concerns and religious devotion, the construction and transmission of notions of antiquity and classicism, and the representation of the urban and rural environment. Meets at the Johnson Museum.

## ART H 461(4761) Art and Social Histories (also AM ST 430.08[4306]) (CA-AS)

Spring. 4 credits. Prerequisite: permission of instructor. Auditing not permitted. L. Meixner.

Topic for spring 2008: American Art and the Machine. This seminar examines early modernism in America with a particular emphasis on the machine, mechanical reproduction, and moving images including film and television. Machine is defined in the broadest sense to mean the artist, the city, the camera, the department store, and consumer by-products including pictorial monthlies such as Life, advertisements, comic books, and political cartoons. Themes include the machine and the comic body, photography and social surveillance, early cinema and working class women, women and urban consumption, comic books and censorship, the construction of gender and the "American
family" in early T.V. sitcoms, T.V. ads and the American homemaker, and "women's films" of the 1940s. Key artists include the Astcan School, Lange, Evans, Steichen. Hine, Chaplin, Hitchcock, and Bette Davis. Films include Modern Times, Rear Windou; North by Northwest, Dark Victory, and Now Voyager.

## ART H 464(4600) Studies in Modern Art

 (LA-AS)Spring. 4 credits. Prerequisite: permission
of instructor. No auditors. J. E. Bernstock. Topic for spring 2008: U.S. Art in the Fifties. This class examines closely art that emerged in the United States as a creative reaction against consensus culture. Civil rights protests, the birth of rockn'roll, and the beat generation are some of the phenomena considered as essential to the development of avant-garde art during this period.

## ART H 466(4610) Women Artists (also FGSS 404[4040]) (LA-AS)

Fall. 4 credits. J. E. Bernstock.
This seminar examines both feminist art criticism and the work of women artists from antiquity to the present. We consider the works of the most prominent women artists from each period in relation to the changing roles of women in society. The artists covered include Jennifer Barlett, Artemisa Gentileschi, Elizabeth Vigee-Lebrun, Mary Cassatt, Kathe Kollwitz, Georgia O'Keefe, Louise Nevelson, Joan Mitchell, Judy Chicago, and Barbara Kruger.

## ART H 470(4150) Intro to Critical Theory

 (also ART H 670[6150])Fall. 4 credits. M. Fernandez.
This seminar will introduce students to theoretical texts relevant to multiple areas in the history of art and visual culture. Readings will include classic texts in post-structural. theory and more recent writings in new areas of theory and artistic practice including: digital art, cyberfeminism, glohalization, museums and museology, architecture in/ as visual space, biotechnology and artificial life as well as issues in cognitive science and human computer interaction centering on space and embodiment. Occasionally, the seminar will focus on a single topic of convergence for these diverse areas.

## ART H 473(4773) Photography and the Colonial Gaze

Spring. 4 credits. J. Rickard. Photography and the Colonial Gaze examines the role photography plays in the colonization of the Americas. This seminar balances 19 th century "master" narratives of erasure, savage, natural, and scientific images of Native
America with contemporary Indigenous media artists negotiating the issue of self representation.
[ART H 479(4979) Advanced Seminar in American Literature: Visual Culture in Women's Literature (also ENGL 479[4790], VISST 480[4800], FGSS 479[4790])
Fall. 4 credits. Next offered 2008-2009. S. Samuels.]

ART H 486(4816) Modern Chinese Art
Fall. 4 credits. A. Pan.
China, a cultural giant of East Asia, made a passive entrance into modernity. With the advent of Western and American colonialism and imperialism, coupled with recent successes in westernization by the Japanese, Chinese artists had to redefine their roles as well as their visions. This turmoil bore witness
to a vibrant beginning in modern Chinese art Interactions between the Chinese themselves, and Chinese interactions with foreigners in the major cities of Shanghai and Beijing, fostered new directions in Chinese ant and helped shape western visions of Chinese art history. Issues covered include: Chinese debates on western influence--their theoretical
foundations and rationales; New visions for the future of Chinese art in the late 19th and early 20th centuries; Pluralistic approaches and arguments on "Chinese identity" in the modern era; Collecting art and the vision of history; The identity of traditional literati painters in the modern era-their roles, artworks, and deeds; Foreigners in China-the formation of major European collections of Chinese art, and the formation of "Chinese art history" in the West

## [ART H 491(4690) Comparative Modernities (also ART H 691[6910]) 당 (CA-AS)

Spring. 4 credits. Next offered 2008-2009. I. Dadi.]

## ART H 497(4997) Honors Research

Fall or spring. 2 credits. Staff
The prospective honors student does rigorous independent readings supervised by a selected thesis advisor. By the end of the semester, an annotated bibliography and detailed outline of the thesis should be completed.

ART H 498(4998) Honors Work I
Fall or spring. 4 credits. Intended for senior art history majors who have been admitted to the honors program
Basic methods of art historical research are discussed and individual readings assigned, leading to selection of an appropriate thesis topic.

## ART H 499(4999) Honors Work II

Fall or spring. 4 credits. Prerequisite ART H 498.
The student under faculty direction prepares a senior thesis.

## ART H 506(5505) Contemporary African Diaspora Art (also AS\&RC 506[6500])

Spring. 4 credits. C. Finley.
Since the 1950's, projects of African
decolonization and Black liberation and empowerment have influenced the work of African Diaspora artists in the Black Atlantic. Pivotal historic events, such as the Civil Rights Movement, the dismantling of colonial rule in Africa and the Brixton race riots in England, have urged Black artists to reexamine issues of memory, identity, history and belonging This course considers those artists who trace a visual genealogy of the African Diaspora and Work in what has been identified as a practice of remembrance. We will focus on Artists working after 1960 , but also will study the roots of the 20th century and in earlier periods.

## [ART H 540(5440) Nature, Cultural

 Landscape, and Gardens in Early
## Modern Europe

4 credits. Prerequisite: permission of instructor. C. Lazzaro.]
ART H 571(5571) African Aesthetics (also AS\&RC 503[6506])
Spring. 4 credits. S. Hassan.
ART H 580(5850) Dancing the Stone: Body, Memory, and Architecture (also THETR 580[5800])
Spring. 4 credits. Prerequisite: permission of instructor. K. McGowan.
[ART H 585(5855) Threads of Consequence: Textiles in South and Southeast Asia
Spring. 4 credits. Next offered 2008-2009. K. McGowan.]

ART H 591-592(5991-5992) Supervised Reading
591, fall; 592, spring. 4 credits; may be repeated for credit. Prerequisite: graduate standing.
ART H 593-594(5993-5994) Supervised Study
593 , fall; 594 , spring. 4 credit; may be repeated for credit. Prerequisite: graduate standing.
ART H 600(6100) Proseminar (also ART H 400[4100], VIS5T 400[4200]]
Spring. 4 credits. Limited enrollment.
Undergraduates should enroll in 400. I. Dadi.

Works of art have always engendered political, social, and cultural meanings. This seminar presents an introduction to the methods which art historians have engaged in, studying the objects and ideas that constitute the historiography of their discipline. Challenged and enlarged by cultural debates over issues of class, ethnicity, nationality, sexual orientation, and gender, the field of art history is expanding to incorporate problems of assessing quality of intention and reception along with authorship, of artistic production in place of artistic creation, and of Western-oriented attitudes to race in reference to orientalism and colonialism. Readings will focus on historically situating methods and the implications of their cross-cultural application. Papers will encourage students to put methods into practice, realizing in the process that subject matter is not an isolated choice to which methods are applied, but something which profoundly affects the approach which the researcher brings to the writing of art history.
[ART H 608(6508) Exhibiting Cultures: Museums, Monuments, Representation and Display (also ART H 408[4508], AS\&RC 408/608[4504/6508], AM ST 408/608[4508/6508])
4 credits. Undergraduates should enroll in
408. Next offered 2008-2009 C. Finley.]

ART H 609(6509) Black Arts Movement Fall. 4 credits. C. Finley.
For description, see ART H 409.

## ART H 615(6315) Visualizing the Sacred

 Iberia (also ART H 415[4315])Fall. 4 credits. C. Robinson.
For description, see ART H 415.

## ART H 630(6250) Seminar in Classical Archaeology (also CLASS 630[7750], ARKEO 630[6300]) <br> Fall. 4 credits. Staff. <br> For description, see CLASS 630.

## ART H 635(6235) Metamorphosis

Fall. 4 credits. A. Alexandridis.
For description, see ART H 435.

## ART H 642(6252) Research Methods in

 Archaeology (also CLASS 642[7742])Spring. 4 credits. S. Manning
For description, see CLASS 642.

## ART H 644(6144) Responsive

 Environments (also ART H 444[4144])Fall. 4 credits. M. Fernandez.
This seminar will examine notions of
interactivity, immersion, and responsiveness in
works of art and architecture from the 1950s to present. Select historically, significant works in traditional media, telematics, machine sculpture, interactive and digital installation will be explored as well as more recent genres of artistic practice including interactive cinema, locative media and video games. Theorizations of interactivity, addressing narrativity, performativity, embodiment,
"liveliness" and the sensual and affective engagement of the user with the work will be discussed, as will the relation of art and surveillance, and the relation of 'high art' interactivity with popular techno-cultural forms. The relevance of these topics to architecture will be a recurrent theme.

## ART H 670(6170) Intro to Critical Theory

Fall. 4 credits. M. Fernandez.
For description, see ART H 470.

## [ART H 691(6690) Comparative

Modernities (also ART H 491 [4690])
4 credits. Next offered 2008-2009. I. Dadi. For description, see ART H 491.]

## HUMAN BIOLOGY PROGRAM

J. Haas, nutritional sciences, director ( 220 Savage Hall, 255-2665); A. Clark (molecular biology and genetics); P. Cassano (nutritional sciences); B. Finlay (psychology); J. Fortune (physiology/women's studies), E. Frongillo (nutritional sciences), R. Johnston (psychology), K. A. R. Kennedy (ecology and systematics/anthropology), D. Levitsky (nutritional sciences), D. L. Pelletier (nutritional sciences), W. Provine (ecology and systematics/history), S. Robertson (human development), R. Savin-Williams (human development), M. Small (anthropology)
Human biology integrates the methods and theories of many disciplines, such as biological anthropology, nutrition, neurobiology, physiology, psychology, demography, ecology, genetics, and paleontology into a comprehensive study of biological diversity in Homo sapiens. A central focus of this interdisciplinary approach to the study of the human organism is an understanding of evolutionary processes that explain our biological variation through space and time. The curriculum of study seeks to educate future biological scientists to address the concerns of a society that is becoming more demanding of the scientific community to place its specialized biological knowledge in a broad context. The human biology curriculum is of particular relevance to undergraduate students in premedical and predentistry programs, biological anthropology, nutrition, human development, ecology and evolutionary biology, psychology, physiology, genetics, and the health-related sciences. It serves to bring together students who have a common interest in humankind as defined from these diverse fields and to provide a forum for student-faculty interaction on various topics relating to human evolution and biological diversity. Human biology is not a major but a curriculum of study that provides majors in various departments and colleges with a program for selecting elective courses that deal with the biology of the human species. Students after their freshman year may develop a program of study in human biology while majoring in any one of a number of different departmental fields.

## Basic Requirements

The requirements for a program of study in human biology are designed to ensure sufficient background in physical sciences and mathematics to enable the student to pursue a wide range of interests in the fields of modern biological sciences, anthropology, and fields related to the evolution and biological diversity of the human species. Adjustments may be made in these requirements, depending on the student's academic background and affiliation with colleges and schools within the university.

The basic requirements are one year of introductory biology (BIO G 101-103 plus 102-104 or 105-106 or BIO G 107-108 offered during the eight-week Cornell Summer Session); one year of general chemistry (CHEM 207-208 or 215-216); one year of college mathematics (MATH 111-112 or 105106 or 111-105); one course in genetics (BIO G 280,281 , or 282 ); one course in biochemistry (BIO G 330, 331, 332, or 333 or NS 320). It is recommended that students planning graduate study in biological anthropology, psychology, and related fields in the medical and nutritional sciences take a course in statistics. Students should consult their faculty advisor in human biology for help in selecting appropriate courses.
Elective courses should be taken that enable the student to acquire breadth in the subject matter of human biology outside of their departmental major. Therefore only 6 of the 15 human biology elective credits may also fulfill requirements for the major. Courses should be selected that also provide sufficient exposure to the integration of basic anatomical and physiological sciences with the behavior of inclividuals and groups within the context of evolutionary theory and ecology. The courses listed below are representative of the offerings in human biology and are included to assist the student in organizing a curriculum of study. They are organized into three groups that reflect the three levels of integration noted above: (1) human anatomy and physiology, (2) human behavior, and (3) human evolution and ecology. Students should choose at least one course from each of these areas of integration. It is anticipated that the student will include in a program of study at least one of the laboratory. courses offered. It is expected that a student will take a minimum of 15 credits from among these courses.
There is no foreign language requirement for human biology beyond what is dictated by specific departments and colleges. The requirements for the human biology curriculum are set alongside requirements of the undergraduate majors as these are defined by different departments. Students with independent majors may design their own programs of study under the guidelines provided by their college. Although a student may indicate an interest in human biology in the freshman year and be able to obtain early guidance from a faculty advisor representing the curriculum of study, it is more usual for students to establish their course programs in the first semester of the junior year. The student may request one of the faculty advisors in his or her department who is listed as faculty in human biology to be their principal advisor, or he or she may have an advisor in the department of the major and seek the advice of a human biology faculty advisor in matters pertaining to satisfaction of the requirements. In certain cases a faculty
advisor may represent both the major and the curriculum of study in human biology.

## Courses

## Human Anatomy and Physiology

AN SC 410(4100) Nutritional Physiology and Metabolism
Fall. 3 credits.
BIOAP 214(2140) Biological Basis of Sex Differences (also B\&SOC 214[2141], FGSS 214[2140)
Spring. 3 credits.
BIOAP 311(3110) Introductory Animal Physiology, Lectures (also VETPH 346[3460])
Fall. 3 credits.
BIOAP 319(3190) Animal Physiology Experimentation
Fall. 4 credits.
BIOAP 427(4270) Fundamentals of Endocrínology
Fall. 3 credits.
BIOAP 458(4580) Mammalian Physiology Spring. 3 credits.

BIOBM 434(4340) Applications of Molecular Biology to Medicine, Agriculture, and Industry
Fall 3 credits
BIOBM 439(4390) Molecular Basis of Human Disease (also BIOGD 439[4390]]
Fall. 3 credits.
BIOEE 274(2740) The Vertebrates: Structure, Function, and Evolution Spring. 4 credits.
BIOGD 487(4870) Human Genomics Fall. 3 credits.

BIOMI 417(4170) Medical Parasitology (also VETMI 431[4310])
Fall. 2 credits
NS 115(1150) Nutrition, Health, and Society
Fall. 3 credits
NS 315(3150) Obesity and the Regulation of Body Weight (also PSYCH 613[3150])
Spring. 3 credits.
NS 331(3310) Physiological and Biochemical Bases of Human Nutrition
Spring. 4 credits.
NS 341(3410) Human Anatomy and Physiology
Spring. 4 credits.
NS 361(3610) Blology of Normal and Abnormal Behavior (also PSYCH 361[3610])
Fall. 3 credits.
NS 421(4210) Nutrition and Exercise Spring: 3 credits.
NS 431(4310) Mineral Nutrition and Chronic Disease
Fall. 3 credits.
NS 441(4410) Nutrition and Disease Fall. 4 credits.

NS 475(4750) Mechanisms Underlying Mammalian Developmental Defects (also BIOAP 475[4750])
Spring. 3 credits.
NS 614(6140) Topics in Maternal and Child Nutrition
Fall. 3 credits.
PSYCH 322(3220) Hormones and Behavior (also BIONB 322[3220])
Fall. 3 or 4 credits.
PSYCH 425(4250) Cognitive Neuroscience
Fall. 4 credits.
PSYCH 460(4600) Human Neuroanatomy Spring. 3 credits.

## Human Behavior

ANTHR 208(3308) Anthropology of Human Mating (also BIONB 208[2080])
Spring. 3 credits.
ANTHR 390(3390) Primate Behavior and Ecology
Spring. 4 credits.
ANTHR 490(4930) Topics in Biological Anthropology
Spring. 4 credits.
BIONB 327(3270) Evolutionary
Perspectives on Human Behavior Fall. 3 credits.
BIONB 331(3310) Human Sociobiology Spring. 3 credits.

BIONB 392(3920) Drugs and the Brain Fall. 4 credits.
BIONB 421(4210) Effects of Aging on Sensory and Perceptual Systems (also PSYCH 431/631[4310/6310]) Fall. 3 or 4 credits.
BIONB 422(4220) Modeling Behavioral Evolution
Spring. 4 credits.
BIONB 424(4240) Neuroethology (also PSYCH 424[4240])
Spring. 3 credits.
BIONB 427(4270) Animal Social Behavior Fall. 4 credits.
BIONB 428(4280) Clinical Neurobiology Fall. 3 credits.

BIONB $431(4310)$ Genes and Behavior Spring. 3 credits.
BIONB 496(4960) Bioacoustic Signals in Animals and Man
Fall. 3 credits.
BIOPL 247(2470) Ethnobiology Fall. 3 credits.
BIOPL 348(3480) The Healing Forest Spring. 2 credits.
BIOPL 442(4420) Current Topics in Ethnobiology
Fall. 3 credits.
DEA 325(3250) Human Factors: Ergonomics-Anthropometrics Fall. 3 credits.

DEA 350(3500) Human Factors: The Ambient Environment
Spring. 3 credits.

HD 220(2200) The Human Brain and Mind: Biological Issues in Human Development (also COGST 220[2200])
Fall. 3 credits.
HD 266(2660) Emotional Functions of the Brain
Spring. 3 credits.
HD 320(3200) Human Developmental Neuropsychology
Spring. 3 credits.
HD 344(3440) Infant Behavior and Development
Fall. 3 credits.
HD 366[3660) Psychobiology of Temperament and Personality Fall. 3 credits.

HD 433(4330) Developmental Cognitive Neurosciences (also COGST 433[4330])
Spring. 3 credits.
NS 245(2450) Social Science
Perspectives on Food and Nutrition Fall. 3 credits.

NS 347(3470) Human Growth and Development: Blological and Behavioral Interactions (also HD/ B\&SOC 347[3470])
Spring. 3 credits.
NS 361(3610) Biopsychology of Normal and Abnormal Behavior (also PSYCH 361[3610])
Fall. 3 credits
PAM 380|3800) Human Sexuality Spring. 4 credits.

PSYCH 223|2230) Introduction to Biopsychology
Fall. 3 credits.
PSYCH 332(3320) Biopsychology of Learning and Memory (also BIONB 328[3280])
Spring. 3 credits.
PSYCH 326(3260) Evolution of Human Behavior
Spring. 4 credits.
PSYCH 422(4220) Developmental Biopsychology
Fall. 4 credits.
PSYCH 425(4250) Cognitive Neuroscience (also BIONB 423[4230])
Fall. 4 credits.
PSYCH 427(4270) Evolution of Language (also COGST 427[4270])
Fall. 3 credits.
PSYCH 440(4400) The Brain and Sleep Fall. 4 credits.

Human Evolution and Ecology
ANTHR 101(1300) Introduction to Anthropology: Biological Perspectives on the Evolution of Humankind
Fall. 3 credits.
ANTHR 203(2200) Early People: The Archaeological and Fossil Record (also ARKEO 203[2200])
Spring. 3 credits.

ANTHR 375(3375) Evolutionary Theory and Human Behavior
Spring. 4 credits.
ANTHR 390(3390) Primate Behavior and Ecology
Spring. 4 credits.
ANTHR 490(4390) Topics in Biological Anthropology
Spring. 4 credits.
BIOEE 261(2610) Ecology and the Environment
Fall or summer. 4 credits
BIOEE 278(2780) Evolutionary Biology Fall or spring. 3 or 4 credits.
BIOEE 371(3710) Human Paleontology Fall. 4 credits.

BIOEE 464(4640) Macroevolution Spring. 4 credits.
BIOEE 469(4690) Food, Agriculture, and Society Spring. 3 credits.
BIOEE 671(6710) Paleoanthropology of South Asia (also ANTHR 671[6671], ASIAN 671[6731])

BIOEE 673(6730) Human Evolution: Concepts, History, and Theory (also ANTHR 673[6373])
Spring. 3 credits.
BIOGD 481 (4810) Population Genetics Fall. 4 credits

BIOGD 482(4820) Human Genetics and Society
Fall. 4 credits
BIOGD 484(4840) Molecular Evolution Spring. 3 credits.

BIOGD 487(4870) Human Genomics Fall. 3 credits.
BaSOC 447(4471) Seminar in the History of Biology (also HIST 415[4150], S8:TS 447[4471])
Summer. 4 credits
D SOC 201(2010) Population Dynamics (also SOC 202[2202]) Spring. 3 credits.
D SOC 410(4100) Health and Survival Inequalities (also SOC 410[4100]) Fall. 4 credits.
NS 275(2750) Human Biology and Evolution (also ANTHR 275[2750]) Fall. 3 credits
NS 306(3060) Nutritional Problems of Developing Nations Spring. 3 credits.
NS 450(4500) Public Health Nutrition Spring. 3 credits.

NS 457(4570) Economics of Hunger and Malnutrition (also ECON 474[4740]) Spring. 3 credits.

PAM 303(3030) Ecology and Epidemiology of Health Fall. 3 credits.

PSYCH 326(3260) Evolution of Human Behavior
Spring. 4 credits.
PSYCH 427(4720) Evolution of Language (also COGST 427[4270])
Fall. 3 credits.

VETMI 431(4310) Medical Parasitology (also BIOMI 417[4170])
Fall. 2 creclits.
VTPMD 664(6640) Introduction to Epidemiology
Fall. 3 credits.

## HUNGARIAN

See "Department of Linguistics" and "Russian."

## INDEPENDENT MAJOR PROGRAM

J. Finlay, director, 55 Goldwin Smith Hall, 255 5004
The Independent Major Program is described in the introxluctory section of "College of Arts and Sciences."
IM 351(3510) Independent Study
Fall or spring. $1-4$ credits. Prerequisite:
permission of program director.
IM 499(4990) Honors Research
Fall or spring. 1-8 credits; max. of 8 credits may be earned for honors research. Prerequisite: permission of program director. Each participant must submit brief proposal approved by Honors Committee.

## INDONESIAN

See "Department of Asian Studies."

## INEQUALITY CONCENTRATION

363 Uris Hall
www inequality.cornell edu
254-8674
The study of inequality lies at the heart of - current debates about segregation, affirmative action, the "glass ceiling," globalization, and any number of other contemporary policy issues. In recent years, public and scholarly interest in issues of inequality has intensified, not merely because of historic increases in income inequality in the United States and other advanced industrial countries, but also because inequalities of race, ethnicity, and gender are evolving in equally dramatic and complicated ways.
The inequality concentration allows undergraduate students to supplement their studies for their major with a coherent program of courses oriented toward the study of inequality. Although Cornell University is a leading center of scholarship on poverty and inequality, this strength is necessarily distributed across many departments and colleges; an interdisciplinary concentration thus allows students to combine these resources into an integrated program of study. The institutional home for the inequality concentration is the Center for the Study of Inequality (located at 363 Uris Hall and at www.ínequality.cornell.edu).
The inequality concentration is appropriate for students interested in government service, policy work, and related jobs in nongovernmental organizations (NGOs) as well as students who wish to pursue post-graduate education in such fields as public policy,
economics, government, law, history, psychology, sociology, anthropology, literature, and philosophy. In many of these fields, the study of inequality is becoming increasingly central and fundamental, and the inequality concentration can therefore provide students with a valuable and unique foundation for further study.
The inequality concentration is not a major but rather is an interdisciplinary program that should be completed in conjunction with a major. The concentration is open to students enrolled in any of the seven Cornell undergraduate colleges. When the requirements of the concentration are met, a certification is recorded on a student's transcript.

## Concentration Requirements

The inequality concentration exposes students to a breadth of approaches, methods, and topic areas while also allowing them to tailor a program to their particular interests. The requirements are as follows:

## 1. Overview Course

The required overview course may be selected from any of the eight courses listed below. When possible, the overview course should be completed early in the program, as it serves to define the field and to expose students to areas and topics that might be explored in future course work.

- Income Distribution (ILRLE 441)
- Inequality, Diversity, and Justice (PHIL 193, CRP/GOVT/SOC 293)
- Power and Poverty in America (GOVT 310)
- Social Inequality (SOC 208 and D SOC 209)
- Comparative Social Stratification (D SOC 370 and SOC 371)
- Organizations and Social Inequality (ILROB 626)
- Racial and Ethnic Differentiation (PAM/ SOC 337)


## 2. Controversies About Inequality

(PHIL 195, SOC/PAM/ILROB/D SOC/GOVT 222)

This 3-credit course introduces students to current controversies in the study of inequality while facilitating interdisciplinary dialogue between concentrators and faculty members at Cornell University. Students are exposed to research on inequality under way at Comell presented by guest lecturers and also participate in debates on pressing inequality-relevant issues (e.g., welfare reform, school vouchers, immigration policy, affirmative action).

## 3. Electives

In addition to the overview course and core course, students must select four electives from the list of qualified courses. This list can be viewed on the web site for the Center for the Study of Inequality, www.inequality. cornell.edu. Although students may tailor their programs to match their interests, the electives and overview course must be distributed across at least three departments (thereby ensuring breadth in the analytic approaches that are represented).

## 4. Lectures and Seminars

The Center for the Study of Inequality (CSI) hosts occasional lectures and symposia, and concentrators are expected to attend them when possible. These events will be announced via e-mail and are also listed on the center web site, www.inequality.cornell. edu.

## Enrolling in the Concentration

The web site for the Center for the Study of Inequality, www.inequality.cornell.edu, provides current information on the Inequality Concentration. For students considering the concentration, it may be useful to schedule a meeting with the assistant to the director (inequality@cornell.edu).

## Sample Programs

The inequality concentration allows students considerable flexibility in devising programs that reflect their interests. As examples of possible programs, we have listed below sample tracks, each comprising a different set of possible electives. The first program listed below is a general track that provides an overview of the field, while the remaining nine programs are more specialized and focus on particular issues within the field. This sampling of programs is obviously illustrative and does not cover the entire wide range of interests that may be addressed within the concentration.

## Globalization and Inequality

As a global economy takes hold, there has been increasing concern that economic inequalities will grow apace, especially NorthSouth inequalities between rich and poor countries. The countervailing "optimistic view" is that between-country disparities will in the long run wither away and render inequality an entirely internal, within-country affair. These and related lines of argumentation can be explored in courses that address such topics as trends in income inequality, theories of economic development, emerging patterns of international migration, and globalization and gender.

1. Overview Course (choose any one)
2. Controversies About Inequality (PHIL 195, SOC/PAM/ECON/ILROB/GOVT/D SOC 222)
3. Possible Electives (cboose any four):

International Development (D SOC 205, SOC 206)
Economic Development (ECON 371)
Labor Markets and Income Distribution in Developing Countries (ILRIC 635)
Contemporary Controversies in the Global Economy (AEM 200)
Environmental Aspects of International Urban Planning (CRP 453/683)
Gender and Globalization (FGSS 360 , CRP 3950)
Education, Inequality, and Development (D SOC 305)
Sex and Gender in Cross-Cultural Perspective (ANTHR 321/621, FGSS 321/621)
Rural Areas in Metropolitan Society (D SOC 336 )

Gender and International Development (FGSS/CRP 614)
Politics of Transnationalism (GOVT 681)

## Social Policy and Inequallty

In the modern period, inequalities generated in the market and through other social institutions are typically regarded as excessive, and the state is seen as the main tool for redistribution, discrimination abatement, equalization of life chances, and related forms of amelioration. The social policy and inequality track explores the role of the state in generating and reducing inequalities of various kinds.

1. Overview Course (choose any one)
2. Controversies About Inequality (PHIL 195, SOC/PAM/ILROB/D SOC/GOVT 222)
3. Possible Electives (choose any four):

Organizations and Social Inequality (SOC 322, ILROB 626)
Economic Security (ECON 451)
Employment Discrimination and the Law (ILRCB 684)
Human Resource Economics and Public Policy (ILRHR 360)
Diversity and Employee Relations (ILRHR 463)

Social Welfare as a Social Institution (PAM 383)
Economics of the Public Sector (PAM 204)

Introduction to Policy Analysis (PAM 230)
Introduction to Public Policy (GOVT 307)
Urban Politics (GOVT 311)
Demography and Family Policy (PAM 371)

Evolving Families: Challenges to Family Policy (PAM 336)
Low-Income Families: Qualitative and Policy Perspectives (PAM 335)
Risk and Opportunity Factors in Childhood and Adolescence (HD 353)
Social Policy (PAM 473)
Social Policy and Social Welfare (CRP 448/548)
Policy Analysis: Welfare Theory, Agriculture, and Trade (ECON 430, AEM 630)
Economic Analysis of the Welfare State (ILRLE 642, ECON 460)
Families and Social Policy (HD 456)
Health and Social Behavior (HD 457)
Public Policy and the African-American Utban Community (AS\&RC 420)
Beliefs, Attitudes, and Ideologies (PSYCH 489, FGSS 488)
Research on Education Reform and Human Resource Policy (ILRHR 653)

## The Ethics of Inequality

Charges of social injustice are often charges of excessive inequality. What are the political, philosophical, and legal debates that are relevant to such judgements? Under what conditions should rich countries assist poor ones? At what point should governments step
in and redistribute income? When should parents pass on their wealth to their children? The ethics of inequality track examines the conditions under which inequalities might be deemed legitimate or illegitimate, evaluates prevailing inequalities and social policy as against this yardstick, and explores the larger role of values in popular and scholarly judgments about inequality.

1. Overview Course: Inequality, Diversity, and Justice (PHIL 193, SOC/CRP/GOVT 293)
2. Controversies About Inequality (PHIL 195, SOC/PAM/ILROB/GOVT 222)
3. Possible Electives:

## A. Ethics Courses (choose two)

Values in Law, Economics, and Industrial Relations (ILRCB 607)
Contemporary Moral Issues (PHIL 145)
Global Thinking (GOVT 294)
Modern Political Philosophy (PHIL 346)
Feminism and Philosophy (PHIL/FGSS 249)
Marx: An Overview of His Thought (ANTHR 368)

## B. Social Sclence Classes (choose two)

Select courses in consultation with advisor (see list of electives below).

## Poverty and Economic Development

Over the past century, rich countries have of course become yet richer, while less developed countries remain burdened with massive poverty. The courses listed below examine the sources and causes of world poverty, the rise of global anti-inequality social movements, and the types of policy interventions that might stimulate economic development and reduce poverty.

1. Overview Course (choose any one)
2. Controversies About Inequality (PHIL 195, SOC/PAM/ILROB/D SOC/GOVT 222)
3. Possible Electives (cboose any four):

Economic Development (ECON 371)
Issues in African Development (CRP 477/677)
Labor Markets and Income Distribution in Developing Countries (ILRIC 635)
Health and Survival Inequalities (SOC 410)

Applied Economic Development (ECON 372)

Low-Income Families: Qualitative and Policy Perspectives (PAM 335)
Population, Environment, and Development in Sub-Saharan Africa (D SOC 495)
Gender and International Development (FGSS/CRP 614)
Politics of Transnationalism (GOVT 681)
Economics of Hunger and Malnutrition (NS 457, ECON 474)

## Social Movements and Inequallty

The history of modern society may be seen in large part as a history of anti-inequality social movements (e.g., the Enlightenment, socialism, the union movement, the civil rights movement, feminism) interspersed with
occasional inequality-inducing reactions (e.g., the post-socialist transition). The social movements track examines the causes, effects, and likely future of such social movements and the reactions they spawn.

1. Overview Course (choose any one)
2. Controversies About Inequality (PHIL 195, SOC/PAM/ILROB/GOVT 222)
3. Possible Electives (choose any four):

Utopia in Theory and Practice (SOC 115)
Social Movements (SOC 280)
Social Movements in American Politics (GOVT/AM ST 302)
States and Social Movements (SOC/ GOVT 660)
Politics of Transnationalism (GOVT 681)
Feminism Movements and the State (GOVT/FGSS 353)
Comparative Labor Movements in Latin America (ILRIC 631)
Union Organizing (ILRCB 400)
Theories of Industrial Relations Systems (ILRCB 606)
Revitalizing the Labor Movement: A Comparative Perspective (ILRIC 632)
Women and Unions (ILRCB/FGSS 384)
Latina Activism Feminist Theory (LSP 300) Prisons (GOVT 314)

## Education and the Reproduction of Inequality

In the contemporary period, the study of inequality has increasingly turned on the study of formal education, as schools have become the main institutional locus for training and credentialing workers and for signaling potential employers about (putative) worker quality. The inequality and education track examines educational institutions and how they are organized, how they generate equality and inequality, and how possible institutional changes (e.g., vouchers, required testing) might affect the reproduction of inequalities.

1. Overview Course (choose any one)
2. Controversies About Inequality (PHIL 195, SOC/PAM/ILROB/D SOC/GOVT 222)
3. Possible Electives (choose any four):

Social and Political Context of American Education (EDUC 271)
Education, Inequality, and Development (D SOC 305)
Schooling, Racial Inequality, and Public Policy in America (SOC 357)
Research on Education Reform and Human Resource Policy (ILRHR 653)
Education, Technology, and Productivity (ILRHR 695)
Educational Innovations in Africa and the Diaspora (AS\&RC/EDUC 459)
Education and Development in Africa (AS\&RC 502)

## Race and Ethnicity in Comparative Perspective

This program of study examines the many forms of racial and ethnic inequality as revealed across different times and places. When race and ethnicity are examined from
an explicitly comparative perspective, it becomes possible to identify regularities and better understand the forces of competition, conflict, and subordination among ethnic and racial groups. The courses listed below address such issues as the causes of discrimination, the implications of residential segregation for inequality, the sources of ethnic and racial differences in income, the effects of anti-inequality reform efforts (e.g., affirmative action), and the possible futures of ethnic and racial stratification.

1. Overview Course (choose any one)
2. Controversies About Inequality (PHIL 195, SOC/PAM/ILROB/D SOC/GOVT 222)
3. Possible Electives (choose any four):

## A. General Courses

Introduction to American Studies: New Approaches to Understanding American Diversity, the 20th Century (AM ST/LSP 110)
Racial and Ethnic Politics (GOVT 319)
Health and Survival Inequalities (SOC 410)
Sociology of Health and Ethnic Minorities (LSP/D SOC 220)

## Prisons (GOVT 314)

Minority Politics in the United States (GOVT/ LSP 319)
Racial and Ethnic Differentiation (SOC 337)
Race, Gender, and Organization (FGSS 415)
Employee Relations and Diversity (ILRHR 463)
Ethnicity and Identity Politics: An Anthropological Perspective (ANTHR 479)
Political Identity: Race, Ethnicity, and Nationalism (GOVT/LSP 610)

## B. Immigration and Ethnicity

Comparative Migration to the Americas (LSP 203, HIST 202)
Strangers and Citizens: Immigration and Labor in U.S. History (ILRCB 302)
Immigration and Ethnic Identity (AAS 438)
The Immigrant City: 1900 to 2000 (LSP/S HUM/AM ST 406, HIST 412)
Immigration and the American Labor Force (ILRHR 469)
Immigration and Ethnicity in 20th-Century United States (HIST 201)
Immigrants, Migrants, and Metro Governance (GOVT 422)

## C. Case Studies

African-American Social and Political Thought (AS\&RC 231)
African-American Women: 20th Century (HIST/AM ST/FGSS 212)
African-American History from Slavery to Freedom (HIST 335)
African-American Social History, 1865 to 1910: The Rural and Urban Experience (HIST 375, ILRCB 385)
African-American Social History, 1910 to The Present: Race, Work, and the City (HIST 376, ILRCB 386)
African-American Women in Slavery and Freedom (HIST/AM ST 303, FGSS 307)

Public Policy and the African-American Urban Community (AS\&RC 420)
Politics and Social Change in Southern Africa (AS\&RC 484)
Afro-American Historiography (HIST 610)
African-American Women (HIST 608)
Latinos in the United States (SOC/D SOC 265 , LSP 201)
Latinos in the United States: Colonial Period to 1898 (LSP/HIST 260, AM ST 259)
Latinos in the United States: 1898 to the Present (LSP/HIST/AM ST 261)
Latina Activism Feminist Theory (LSP 300)
Latino Politics in the United States (LSP 306)
Introduction to Asian American Studies (AAS 110)

Asian American History (AAS/HIST 213)
Asians in the Americas: A Comparative Perspective (AAS/ANTHR 303)
Introduction to American Indian Studies (AIS/D SOC 100)
Indian America in the 20th Century (AIS 175) Indians, Settlers, and Slaves in the Early South (AIS/HIST 329)
Antisemitism and the Crisis of Modernity: From the Enlightenment to the Holocaust (HIST/JWST 459)

## The Family and Inequality

Although workers in modern labor markets are often analytically treated as independent individuals, they of course typically belong to families that pool the labor supply of their members, consume goods jointly, and serve in some circumstances as units of collective production. It might therefore be asked how the modern labor market has adapted to and evolved in the context of the family (and, obversely, how the family has responded to the market). The courses within this track explore such issues as the causes and consequences of the intrafamilial division of labor, the effects of marriage and family structure on careers, and the transmission of socioeconomic advantage from one generation to the next.

1. Overview Course (choose any one)
2. Controversies About Inequality (PHIL 195, SOC/PAM/ILROB/D SOC/GOVT 222)
3. Possible Electives (choose any four): Work and Family in Comparative Perspective (SOC 203)
Demography and Family Policy (PAM 371)

Families and Social Policy (HD 456)
Families and the Life Course (SOC 251 , HD 250)
Parent-Child Development in AfricanAmerican Families (HD 458)
Economics of Family Policy (PAM 605) Politics and Culture SOC 248/GOVT 363
Inequality, Diversity, and Justice SOC 293/GOVT 293/CRP 293/PHIL 193

## INFORMATION SCIENCE

C. Cardie, director; J. Abowd, W. Y. Arms,
G. Bailey, K. Bala, L. Blume, R. Caruana, R. Constable, D. Easley, S. Edelman, E. Friedman, G. Gay, J. Gehrke, T. Gillespie, P. Ginsparg, C. Gomes, J. Halpern, J. Hancock, A. Hedge, D. Huttenlocher, T. Joachims,
J. Kleinberg, C. Layoze, L. Lee, A. Leiponen,
B. Lust, M. Macy, P. Martin, T. Pinch,
R. Prentice, M. Rooth, B. Selman, P. Sengers,
D. Shmoys, M. Spivey, D. Strang, E. Tardos,
E. Wagner, S. Wicker, D. Williamson, C. Yuan.

## The Major

Information Science (IS) is an interdisciplinary field that explores the design and use of information systems in a social context: the field studies the creation, representation, organization, application, and analysis of information in digital form. The focus of Information Science is on systems and their use rather than on the computing and communication technologies that underlie and sustain them. Moreover, Information Science examines the social, cultural, economic, historical, legal, and political contexts in which information systems are employed, both to inform the design of such systems and to understand their impact on individuals, social groups, and institutions.
Courses in the Information Science (IS) major are assigned to three area-based tracks:
Human-Centered Systems This area examines the relationship berween humans and information, drawing from humancomputer interaction and cognitive science.
Information Systems This area examines the computer science problems of representing, organizing, storing, manipulating, and accessing digital information.
Social Systems This area studies the cultural, economic, historical, legal, political, and social contexts in which digital information is a major factor.
Students must complete a set of 11 core courses: one introductory course, four courses in mathematics and statistics, and two courses from each of the three IS area-based tracks. Students must also obtain depth in two tracks-a primary and a secondary track-that together best represent their interests. In particular, completion of the major requires four advanced courses from the selected primary track and three advanced courses from the secondary track.

## Requirements

Core (11 courses)

1. Introductory (one course):

INFO 130 Introductory Design and Programming for the Web
2. Math and Statistics (four courses):

MATH 111 Calculus I
either MATH 231 Linear Algebra with Applications or MATH 221 Linear Algebra and Differential Equations
INFO 295 Mathematical Methods for Information Science
One of the following:
MATH 171 Statistical Theory and Application in the Real World
H ADM 201 Hospitality Quantitative Analysis

AEM 210 Introductory Statistics
PAM 210 Introduction to Statistics
ENGRD 270 Basic Engineering Probability and Statistics
BTRY 301 Statistical Methods I
SOC 301 Evaluating Statistical Evidence
CEE 304 Uncertainty Analysis in Engineering
ILRST 312 Applied Regression Methods
ECON 319 Introduction to Statistics and Probability

## PSYCH 350 Statistics and Research Design

3. Human-Centered Systems (two courses):

INFO 214 Cognitive Psychology
INFO 245 Psychology of Social Computing
4. Information Systems (two courses):

CS 211 Computers and Programming
INFO 230 Intermediate Design and Programming for the Web
5. Social Systems (two courses);
either ECON 301 Microeconomics or ECON 313 Intermediate Microeconomic Theory
one of the following: INFO 292 Inventing
an Information Society, INFO 320 New Media and Society, INFO 355 Computers: From the 17th Century to the Dot.com Boom, INFO 356 Computing Cultures, INFO 320 New Media and Society
Where options in the core courses exist, the choice will depend on the student's interests and planned advanced courses for the selected primary and secondary tracks.

## Tracks

Students must complete four advanced courses in their primary track and three advanced courses in their secondary track, selected from those listed below.
Courses taken to satisfy the core course requirements may not be used to fulfill the track requirements.
Additional information on Information Science courses can be found below and in the "Computing and Information Science (CIS)" section of Courses of Study. Course information for all other courses in the major can be found in the relevant departments (e.g., AEM, CS, S\&TS).

## Human-Centered Systems

PSYCH 342 Human Perception: Applications to Computer Graphics, Art, and Visual Display*
INFO 345 Human-Computer Interaction Design
PSYCH 347 Psychology of Visual Communications
PSYCH 380 Social Cognition*
PSYCH 413 Information Processing: Conscious and Unconscious
PSYCH 416 Modeling Perception and Cognition
INFO 440 Advanced Human-Computer Interaction Design
INFO 445 Seminar in Computer-Mediated Communication
INFO 450 Language and Technology
DEA 470 Applied Ergonomic Methods

* Students who take PSYCH 342 may also count its prerequisite, PSYCH 205, toward the Human-Centered Systems primary or secondary track requirements. Similarly, students who take PSYCH 380 may also count PSYCH 280 toward the Human-Centered Systems primary or secondary track requirements. At most, one of PSYCH 205 or PSYCH 280 can be counted toward the primary or secondary track requirements.


## Information Systems

INFO 330 Data-Driven Web Applications
CS 419 Computer Networks
LING 424 Computational Linguistics
INFO 430 Information Retrieval
INFO 431 Web Information Systems
CS 432 Introduction to Database Systems
CS 465 Introduction to Computer Graphics
CS 472 Foundations of Artificial Intelligence
LING 474 Introduction to Natural Language Processing
OR\&IE 474 Statistical Data Mining
CS 478 Machine Learning
OR\&IE 480 Information Technology
CS 501 Software Engineering
CS 513 System Security
INFO 530 Architecture of Large-Scale Information Systems

OR\&IE 574 Statistical Data Mining
CS 578 Empirical Methods in Machine Learning and Data Mining

## Social Systems

INFO 204 Networks
SOC 304 Social Networks and Social Processes INFO 320 New Media and Society
AEM 322 Technology, Information, and Business Strategy**
INFO 349 Media Technologies
INFO 355 Computers: From the 17th Century to the Dot.com Boom

INFO 356 Computing Cultures
INFO 366 History and Theory of Digital Art
ECON 368 Game Theory (formerly ECON 467)*

INFO 387 The Automatic Lifestyle: Consumer Culture and Technology
S\&TS 411 Knowledge, Technology, and Property
INFO 415 Environmental Interventions
ECON 419 Economic Decisions under Uncertainty
INFO 429 Copyright in a Digital Age
INFO 435 Seminar on Applications of Information Science
OR\&IE 435 Introduction to Game Theory*
S\&TS 438 Minds, Machines, and Intelligence INFO 444 Responsive Environments INFO 447 Social and Economic Data H ADM 474 Strategic Information Systems* ECON 476/477 Decision Theory I and II
H ADM 489 The Law of the Internet and ECommerce

INFO 515 Culture, Law, and Politics of the Internet
*Only one of OR\&IE 435 and ECON 368 may be taken for IS credit. Only one of AEM 322 and H ADM 474 may be taken for IS credit

## Admission

All potential affiliates are reviewed on a case-by-case basis relative to the following criteria:

- Completion of four core courses, one in each of the core course areas listed above (i. e., Math and Statistics, Human-Centered systems, Information Systems, and Social Systems). Courses must be taken for a letter grade.
- A grade of C or better in each of the completed core courses with an overall GPA for these courses of 2.5 or more.

Courses used in the affiliation GPA computations may be repeated if the original course grade was below a C . The most recent grade will be used for all repeated courses.
Qualifying courses must be taken at Comell.

## Honors

To qualify for departmental honors, a student must have:

- maintained a cumulative GPA greater than or equal to 3.5 ;
- completed INFO 435 Seminar on Applications of Information Science;
- completed 3 additional credits of IS course work at or above the 500 level (graded courses only; no seminars or 2 credit project courses; these courses are in addition to the primary and secondary track requirements);
- completed 6 credits of INFO 490 Independent Study and Research with an IS faculty member, spread over at least two semesters and with grades of A- or better. It is expected that the research pursued in INFO 490 will result in a project report


## The Concentration

A concentration in Information Science is also available to students in the College of Arts and Sciences, CALS, AAP (Architecture and Planning students only), Engineering, Human Ecology, Hotel, and ILR. The concentration has been designed to ensure that students have substantial grounding in all three tracks: Human-Centered Systems, Information Systems, and Social Systems. Detailed information about the concentration can be found in the CIS section of Courses of Study Students are also referred to www.infosci cornell.edu/ugrad/concentrations.himl for the most up-to-date description of the concentration and its requirements.

## Courses

For complete course descriptions, see the Information Science listings under Computing and Information Science (CIS).

## INFO 130/1300) Introductory Design and

 Programming for the Web (also Cs 130[1300])Fall. 3 credits.
For description, see INFO 130 in CIS section.
[INFO 172(1700) Computation, Information, and intelligence (also

## COGST 172, CS 172[1700], ENGRI

 172[1700]) (MQR)Fall. 3 credits. Prerequisites: some
knowledge of differentiation; permission of instructor for students who have completed equivalent of CS 100. Next offered 20082009.

For description, see CS 172 in CIS section.]
INFO 204(2040) Networks (also ECON 204[2040], SOC 209[2120]) (SBA-AS)
Spring. 4 credits.
For description, see ECON 204.
INFO 214(2140) Cognitive Psychology (also COGST 214[2140], PSYCH 214[2140]) (KCM-AS)
Fall. 4 credits. Limited to 175 students.
Prerequisite: sophomore standing.
Graduate students, see INFO/PSYCH 61.4
For description, see PSYCH 214.
INFO 230(2300) Intermediate Design and Programming for the Web (also CS 230[2300])
Spring. 3 credits. Prerequisite: CS/INFO 130 or equivalent.
For description, see INFO 230 in CIS section.
INFO 245(2450) Psychology of Social Computing (also COMM 245[2450])
Fall. 3 credits.
For description, see COMM 245.
[INFO 292(2921) Inventing an
Information Society (also AM ST 29\%2980], ECE/ENGRG 298[2980], HIST 292[2920], S\&TS 292[2921]) (HA-AS)
Spring. 3 credits; may not be taken for credit after ECE/ENGRG 198. Next offered 2008-2009.
For description, see ENGRG 298.]
INFO 295(2950) Mathematical Methods for Information Science
Fall. 4 credits. Corequisite: MATH 231 or equivalent
For description, see INFO 295 in CIS section.
INFO 320(3200) New Media and Society [also COMM 320[3200])
Spring. 3 credits.
For description, see COMM 320
INFO 330(3300) Data-Driven Web Applications (also CS 330[3300])
Fall. 3 credits. Prerequisite: CS/ENGRD 211
For description, see INFO 330 in CIS section.
INFO 345(3450) Human-Computer Interaction Design (also COMM 345[3450])
Spring. 3 credits.
For description, see COMM 345.
INFO 349(3491) Media Technologies (also COMM 349[3490], S\&TS 349[3491]) (HA-AS)
Spring. 3 credits.
For description, see COMM 349.
INFO 355(3551) Computers: From the 17th Century to the Dot.com Boom (also S\&TS 355[3551]) (HA-AS)
Fall. 4 credits.
For description, see S\&TS 355.
[INFO 356(3561) Computing Cultures [also S\&T8 356[3561]) (CA-AS)]

INFO 366(3650) History and Theory of Digltal Art (also ART H 366[3650]) (CA-AS)
Fall. 4 credits.
For description, see ART H 366.

INFO 372(3720) Explorations in Artificial Intelligence (also CS 372[3700])
Spring. 3 credits. Prerequisites: MATH 111 or equivalent, an information science approved statistics course, and CS 211 or permission of instructor.
For description, see INFO 372 in CIS section.

## [INFO 387(3871) The Automatic

Lifestyle: Consumer Culture and Technology (also S\&TS 387[3871]) (CA-AS)
Spring. 4 credits. Next offered 2008-2009. For description, see S\&TS 387.]

## INFO 415(4150) Environmental

 Interventions (also S HUM 415)Fall. 4 creclits.
For description, see S HUM 415
INFO 429(4290) Copyright in the Digital Age (also COMM 429[4290])
Fall. 3 credits
INFO 430(4300) Information Retrieval (also CS 430[4300])
Fall. 3 credits. Prerequisite: CS/ENGRD 211 or equivalent.
For description, see INFO 430 in CIS section

## INFO 431(4302) Web Information Systems (also CS 431[4302])

Spring. 3 credits. Prerequisites: CS 211 and
some familiarity with web site technology.
For description, see CS 431 in CIS section.
INFO 435(4390) Seminar on Applications of Information Sclence (also INFO 635[6390])
Spring. 3 credits. Prerequisites: background in computing, data structures, and programming at level of CS 211 or equivalent, and experience in using information systems.
For description, see INFO 435 in CIS section
INFO 440(4400) Advanced HumanComputer Interaction Design lalso COMM 440[4400]
Fall. 3 credits. Prerequisite: COMM/INFO 245.

For description, see COMM 440

## INFO 444(4144) Responsive

 Environments (also ART H444[4144]) (CA-AS)
Spring. 4 credits
For description, see ART H 444.
[INFO 445(4450) Seminar in ComputerMediated Communication
Fall. 3 credits. Prerequisites: COMM/INFO
245. Next offered 2009-2010.

For description, see COMM 445.]

## INFO 447(4470) Social and Economic

 Data (also ILRLE 447[4470])Spring 4 credits. Prerequisites: one
semester of calculus, IS statistics
requirement, at least one upper-level social
science course, or permission of instructor.
For description, see INFO 447 in CIS section.
INFO 450(4500) Language and Technology (also COMM 450[4500])
Spring. 3 crectits. Prerequisite: COMM 240 or COMM/INFO 245 or permission of instructor.
For description, see COMM 450.

## INFO 490(4999) Independent Reading

 and ResearchFall, spring. 1-4 credits.
Independent reading and research for undergraduates.

INFO $491(4910)$ Teaching in Information Science, Systems, and Technology
Fall, spring. Variable credit.
Involves working as a TA in a course in the information science, systems, and technology major.

INFO 515(5150) Culture, Law, and Politics of the Internet
Fall. 4 credits.
For description, see INFO 515 in CIS section.
INFO 530(5300) The Architecture of Large-Scale Information Systems (also CS 530[5300])
Spring. 4 credits. Prerequisite: CS/INFO 330 or CS. 432.
For description, see INFO 530 in CIS section.
INFO 614(6140) Cognitive Psychology (also PSYCH 614[6140])
Fall. 4 credits.
For description, see PSYCH 614.
INFO 630(6300) Advanced Language Technologles (also CS 674[6740])
Fall or spring. In 2007-2008, offered in fall. 3 credits. Prerequisites: permission of instructor. Neither INFO/CS 430 nor CS 474 are prerequisites.
For description, see CS 674 in CIS section.
INFO 635(6390) Seminar on Applications of Information Sclence (also INFO 435[4390])
Spring. 3 credits. Prerequisites: background in computing, data structures, and programming at level of CS 211 or equivalent, and experience using information systems. Undergraduates and master's students should register for INFO 435; Ph.D. students should register for INFO 635.
For description, see INFO 635 in CIS section.

## INFO 640(6400) Human-Computer Interaction Design (also COMM 640[6400])

Fall. 3 credits. Prerequisite: graduate standing or permission of instructor.
For description, see COMM 640
INFO 645(6450) Seminar in ComputerMediated Communication (also COMM 645[6450])
Spring. 3 credits. Prerequisite: graduate standing or permission of instructor. For description, see COMM 645

## INFO 648(6648) Speech Synthesis by

 Rule (also LING 648[6648])Spring. 4 credits. Prerequisite: LING 401, 419 , or permission of instructor.
For description, see LING 648
INFO 650(6500) Language and Technology (also COMM 650[6500])
Spring. 3 credits. Prerequisite: graduate standing or permission of instructor.
For description, see COMM 650.
[INFO 651(6002) Critical Technical Practices]

INFO 685(6850) The Structure of Information Networks (also CS 685[6850])
Fall or spring. 4 credits. Prerequisite: CS 482.
For description, see INFO 685 in CIS section.
INFO 709(7090) IS Colloqulum
Fall, spring. 1 credit. For staff, visitors, and graduate students interested in information science.

INFO 747(7400) Social and Economic Data (also ILRLE 740[7400])
Spring. 4 credits. Prerequisites: open to
Ph.D. and research master's students only.
For description, see INFO 747 in CIS section.
INFO 790(7900) Independent Research
Fall, spring. Variable credit. Prerequisite:
permission of an information science
faculty member.
Independent research for M.Eng. students and pre-A exam Ph.D. students.

## INFO 990(9900) Thesis Researeh

Fall, spring. Variable credit. Prerequisite: permission of an information science
faculty member.
Thesis research for post-A exam $\mathrm{Ph} . \mathrm{D}$. students.

## INTERNATIONAL RELATIONS CONCENTRATION

Office: 152 Uris Hall, 254-5004, www.einaudi. cornell.edu/initiatives/itc.asp, D. R. Lee (AEM), director

## Objective

The International Relations (IR) Concentration is an interdisciplinary program for undergraduate students enrolled in any of the seven Cornell undergraduate colleges. The IR Concentration provides a structured yet flexible program for undergraduates to take advantage of the vast resources available at the university for studying the politics, economics, history, languages, and cultures of the countries and regions of the world.
Graduates of the program have gone on to pursue further education in fields such as political science and anthropology and to successful careers in international law, economics, agriculture, trade, finance, international development, and government service, among others. They have gone on to work in international and nongovernmental organizations, in cross-cultural affairs, in journalism, and in education.
The International Relations Concentration is not a major or a department, but rather a program offering a selection of courses reaching across colleges and departments. Students pursue the IR Concentration in addition to their regular degree. Students concentrating in international relations have majored in fields ranging from anthropology, city and regional planning, communications, economics, government, and history to natural resources, industrial and labor relations, and computer science. International course work and language study add a global and crosscultural dimension to those majors. Some students even design an independent major in some aspect of international relations or comparative social or cultural studies Spending a semester or year of study abroad can contribute to meeting the course requirements of the IR Concentration, including the language requirement.

## Course Requirements

These requirements are designed to expose students to a broad range of perspectives in international relations while allowing them to tailor their course selections to specific interests. Courses throughout the university are grouped into four subject areas, including:

1. International Economics and Development
2. World Politics and Foreign Policy
3. Transnational Processes and Policies

Cultural Studies
Within these four subject areas, courses are also identified as "core" or "elective." Students must complete altogether eight courses from the four groups according to one of two options. Option A emphasizes the politics and economics of international relations. Option B puts greater stress on culture. In choosing either option, students should ensure that they acquire familiarity with more than one geographic region or country. All courses used to fulfill the concentration requirements must be taken for a letter grade. Courses can count both toward a major and the International Relations Concentration.
Option A: One core course from each of Groups 1, 2, 3, and 4; one elective from each of Groups 1, 2, 3, and 4
Option B: One core course from each of Groups 1, 2, 3, and 4; One elective from either Group 1 or Group 2-One elective from Group 3 and 4, and one additional elective from either Group 3. and Group 4
Before pre-registration a course list for the following semester (as well as lists for the current and previous semesters) can be obtained from the administrative coordinator in 152 Uris Hall, as well as from the web site. Note: These lists are not necessarily complete Other courses throughout the university qualify for the IR Concentration by prior atrangement.

## Language Requirement

Students in the IR Concentration are expected to complete additional language study beyond the College of Arts and Sciences' degree requirement (for those in Arts and Sciences) This study can be accomplished in one of two ways: (1) two years of one foreign language (proficiency plus one course); (2) two languages at proficiency.

## Study Abroad

Students in the IR Concentration are encouraged to study abroad to bring a practical dimension to their expertise in international issues. Those who choose this option will find the requirements for the concentration highly compatible with courses taken abroad. Students are encouraged to contact the administrative coordinator before departure.

## Completion

Transcripts will reflect successful completion of the requirements for the Concentration. In addition, students will receive a special certificate and a letter of confirmation signed by the director of the IR Concentration and the director of the Mario Einaudi Center for International Studies.

## Enrollment

To obtain course lists, to enroll and for all further information, please contact the IR administrative coordinator, Mario Einaudi Center for International Studies, 152 Uris Hall, 254-5004.

## Course List for 2007-2008

Core course options and selected electives are listed below; other electives are possible. Most courses are offered one semester only.
Offerings may change, so see the administrative coordinator, course roster, and IR web site for updates and further details.

## Group 1: International Economics and Development

## Core:

ECON/AEM 230 International Trade and Finance
AEM 429 International Finance
AEM 430 International Trade Policy
ECON 361 International Trade Theory
ECON 362 International Monetary Theory and Policy

## Electives:

AEM 432 Business and Governments in Global Marketplace

## AEM 442 Emerging Markets

ECON 324 American Economic History
ECON 371 Economic Development
ECON/ILRIE 444 Evolution of Social Policy in Britain and America
ECON/AEM 450 Resource Economics
ECON/AEM 464 Economics of Agricultural Development
CRP 327 Regional Economic Impact Analysis CRP 371 Cuba: The Search for Development Alternatives
CRP 417 Economic Development: Firms, Industries, and Regions
GOVT 330/ILRIC 333 Politics of the Glolval North
GOVT 354 Capitalism, Competition, and Conflict
ANTHR 384 Africa in the Global Economy
Group 2: World Politics and Foreign Policy

## Core:

GOVT 181 Introduction to International Relations

## Electives:

GOVT 302 Social Movements in American Politics
GOVT 332 Modern European Politics
GOVT 400 Democracy in Latin America
GOVT 424 Contemporary American Politics
GOVT 482 Unifying While Integrating: China and the World

AS\&RC 311 Government and Politics in Africa
AS\&RC 451 Political and Social Change in Caribbean
HIST/AM ST 214 American Foreign Policy HIST 252 Modern Eastern Europe HIST 289/ASIAN 298 The U.S.-Vietnam War HIST/LAT A 306 Modern Mexico: From Independence to the Zapatistas
HIST 371 World War II in Europe
HIST 414 Motivations of U.S. Foreign Policy

## Group 3: Transnational Processes and Policies

## Core:

GOVT 393 Introduction to Peace Studies

## Electives:

AEM 432 Business and Governments in Global Marketplace
ECON/AEM 464 Economics of Agricultural Development
CRP 384 Green Cities
CRP 453 Environmental Aspect of International Planning
HD 483 Early Care and Education in Global Perspective
D SOC 275 Immigration and a Changing America
ILRCB 304 Seminar in American Labor and Social History

ILRHR 469 Immigration and the American Labor Force
IARD 300 Perspectives in International Agricultural and Rural Development

IARD/FD SC 402 Agriculture in the Developing Nations I
IARD 494 Special Topics in International Agriculture
NTRES 332 Ethics and the Environment
NTRES 494 History of the Environment Sciences

## Group 4: Cultural Studies

Core:
ANTHR 102 Introduction to Anthropology: The Comparison of Cultures
ANTHR 200 Cultural Diversity and
Contemporary Issues

## Electives:

ANTHR/AIS 230 Cultures of Native North America
ANTHR/AAS 303 Asians in the Americas
ANTHR 316 Power, Society, Culture in Southeast Asia

ANTHR/FGSS 321 Sex and Gender in CrossCultural Perspective
ANTHR 335 Situation of China's Minorities
ANTHR/AM ST 353 Anthropology of Colonialism
ANTHR/LSP/AM ST 377 The United States
ART H 245 Renaissance and Baroque
ART H 250/NES 247 Introduction to Art
History: Islamic Art and Culture
ART H 322/CLASS 350 Arts of the Roman Empire
ART H 365/AM ST 355 U.S. Art from FDR to Reagan

ART H 378/AS\&RC 310 Art in African Culture and Sociery
AS\&RC/ENGL 255 African Literature
AS\&RC 310/ART H 378 Introduction of African Art
AS\&RC 455 Caribbean Literature
AS\&RC/EDUC 459 Education in Africa
Diaspora

AS\&RC 478 Family and Sociery in Africa
ASIAN 191 Introduction to Modern Asian History
ASIAN 208 Introduction to Southeast Asia ASIAN 211 Introduction to Japan ASIAN/MUSIC 245 Gamelan in Indo Culture COM L 386 Literature and Film of South Asia COM L 387/AS\&RC 332 20th Black Culture Movement
COM L 489/ENGL 483/THETR 483 Comparative 20th-Century Anglophone Drama COM L/ITAL 495 Fascist Culture
ENGL 274 Scottish Literature and Culture
ENGL 333 The 18th-Century Novel
ENGL 340 The English Romantic Period FGSS/SPAN 246 Contemporary Narratives by Latina Writers
FILM 293/NES 293/JWST 291 Sophomore Seminar: Middle Eastern Cinema
FILM/GERST 396 German Film
FREN 221 Modern French Literature
FREN 224/HIST 270 The French Experience
FREN 321 Readings in Modern French Literature and Culture
FREN 323 Reading Francophone Literature and Culture

FREN 370 The French Enlightenment
HIST 151/AM ST 103 Introduction to Western Civilization
HIST 153 Introduction to American History
HIST/ASIAN 191 Introduction to Modern Asian History
HIST 195 Colonial Latin America
HIST 211/AM ST 251 Black Religious Traditions
HIST/FGSS/ASIAN 219 Women in South Asia
HIST 252 Modern Eastern Europe
HIST 291/JWST 252 Modern European Jewish History 1789 to 1948
HIST 305 Britain, 1660 to 1815
HIST 326 History of the British Empire
HIST/AM ST 345 19th-Century American Cultural History
HIST/ENGRG 357 Engineering in American Culture
HIST 360 Early Warfare, East and West
HIST 364/COM L 362/ENGL 325 Culture of the Renaissance II
HIST 388/ASIAN 385 Vietnamese Histories
HIST 395/ASIAN 397 Premodern Southeast
Asia
HIST/LAT A 404 Race and Ethnicity in Latin America
HIST 429/SPAN 448 Cervantes-Mediterranean World
HIST 452 History of the New Europe
HIST 453/NES 457/RELST 457 Formation of Islamic Law
HIST 483/CLASS 475/RELST 475
Christianization/Roman World
HIST/ASIAN 492 Medieval Chinese History

ILRCB/AM ST 306 Recent History of American Workers
ITAL 290 Perspectives in Italian Culture
ITAL 297 Introduction to Italian Literature ITAL 300 Italian Practicum
KRLIT 405 Readings in Korean Literature NES 254 Introduction to Near Eastern Civilizations
NES/JWST/RELST 275 Religions of Ancient Israel
NES 366/JWST 366 011-229 The History and Archaeology of the Ancient Near East
NES 447 Middle Eastern Music Ensemble RUSSL 369 Dostoevsky
RUSSL 499 The Avant-Garde in Russian Literature and the Arts
SOC/NES 332 Martyrdom in Contemporary Society
SOC 478 Family and Society in Africa
SIPAN 218 Introduction to IIspanic Literature
SPAN 301 Hispanic Theater Production
SPAN 319 Renaissance Hispanism
SPAN 323 Reading Latin American Civilization
THETR 242 Introduction to World Theatre III

## ITALIAN

See "Department of Romance Studies."

## JAPANESE

See "Department of Asian Studies."

## JAVANESE

See "Department of Asian Studies."

## PROGRAM OF JEWISH STUDIES

D. I. Owen, director (Ancient Near Eastern History and Archaeology; Assyriology; Biblical History and Archaeology), L. Adelson (German-Jewish Literature and Culture), D. Bathrick (Holocaust Film Studies), R. Brann (Judeo-Islamic Studies), V. Caron (Modern French and European-Jewish History), M. Diesing (Yiddish Language and Linguistics). Z. Fahmy (Modern Middle Fastern History), K. Haines-Eitzen (Early Judaism and Early Christianity), R. Hoffmann (Holocaust Studies), P. Hohendahl (German Literature), P. Hyams (Medieval Jewish History), D. LaCapra (Holocaust Studies), M. Migiel (Italian Literature), C. Monroe (Near Eastern Mediterranean Studies; Nautical Archaeology). L. Monroe (Hebrew Bible Studies), R. Polenberg (American-Jewish History), D. Powers (Islamic History and Law), E. Rebillard (Jews in the Roman Empire), N. Scharf (Hebrew Language), D. Schwarz (Anglo-Jewish Literature), G. Shapiro (RussianJewish Literature), S. Shoer (Hebrew Language), D. Starr (Modern Hebrew and Arabic Literature; Critical Theory; Middle Eastern Film), P. Stevens (curator),
S. M. Toorawa (Arabic Literature and Islamic Studies), J. Zorn (Biblical Archaeology). Emeritus: N. Furman, J. Porte, E. Rosenberg, Y. Szekely.

The Program of Jewish Studies was founded as an extension of the Department of Semitic Languages and Literatures, now the
Department of Near Eastern Studies, in 1973 and attained status as an intercollegiate program in 1976.
The program has grown out of the conviction that Judaic civilization merits its own comprehensive and thorough treatment and that proper understanding of any culture is inconceivable without adequate knowledge of the language, literature, and history of the people that created it. Accordingly, the offerings in the areas of Jewish languages and literatures have been considerably expanded, and courses in ancient, medieval, and especially modern Jewish history and culture have been added to the program.
It is a broadly based, interdisciplinary program, bringing together faculty from various Cornell departments and colleges.
The Program of Jewish Sucties supports teaching and research in the many areas of Jewish Studies. It is a secular, academic program, whose interests are diverse and cross-cultural. The program recognizes its special relationship to teaching and research in classical Judaica and Hebraica pursued by the members of the Department of Near Eastern Stuclies, with particular emphasis on the interrelationship between Judaism, Christianity, and Islam.
It presently enables students to obtain basic instruction and specialization in the fields of Semitic languages; the Hebrew lible; medieval and modern I Hebrew literature; ancient, medieval, and modern European and Middle Eastern Jewish history; and Holocaust studies. In some of these fields students may take courses on both graduate and undergraduate levels. Faculty throughout the university provide breadth to the program by offering courses in related areas of study.
For more information, please visit www.arts. cornell.edu/iwst/index.html.

## Courses Offered

JWST 101-102(1101-1102) Elementary Modern Hebrew I and II (also NES 101-102[1101-1102])
101, fall; 102, spring. 4 credits. Letter grades only. S. Shoer.
For description, see NES 101-102.
JWST 103(1103) Elementary Modern Hebrew III (also NES 103[1103])
Fall. 4 credits. N. Scharf.
For description, see NES 103.

## JWST 123(1111) Introduction to Biblical

 Hebrew (also NES/RELST 123[1111])Fall. 3 credits. L. Monroe.
For description, see NES 123.
JWST 200(2100) Intermediate Modern Hebrew (also NES 200[2100])
Spring. 4 credits. N. Scharf.
For description, see NES 200.
JWST 224(2724) Introduction to the Hebrew Bible-Prophecy (also NES/ RELST 224[2724])
Fall. 3 credits. L. Monroe.
For description, see NES 224.

JWST 251(2651) Holy War, Crusade, and Jihad in Judaism, Christianity, and Islam (also HIST 269[2691], COM L 231[2310], NES/RELST 251[2651])
Fall. 3 credits. R. Brann.
For description, see NES 251
JWST 252(2910) Modern European Jewish History 1789-1948 (also HIST 291[2910])
Fall. 4 credits. V. Caron.
For description, see HIST 291.
JWST 254(2350) Antisemitism and Crisis Modernity (also HIST 235[2350])
Fall. 4 credits. V. Caron
For description, see HIST 235
JWST 256(2556) Introduction to the Quran (also NES/RELST 256[2556])
Fall. 3 credits. S. M. Toorawa.
For description, see NES 256.
JWST 261(2661) Ships and SeafaringIntroduction to Nautical Archaeology (also NES 261[2661], ARKEO 275[2661])
Spring. 4 credits. C. Monroe
For description, see NES 261.
JWST 263(2663) Introduction to Biblical History and Archaeology [also ARKEO/RELST/NES 263[2663])
Fall. 3 credits. J. Zorn.
For description, see NES 263.
JWST 268(2668) Ancient Egyptian Civilization (also ARKEO/NES 268[2668])
Spring 3 credits. C. Monroe.
For description, see NES 268.
JWST 272(2672) Imperialism and the History of the Modern Middle East (also NES 272[2672])
Spring. 3 credits. Z. Fahmy.
For description, see NES 272.
JWST 274(2674) History of the Modern Middle East: 19th-20th Centuries (also NES 272[2672], GOVT 274[2747], HIST 276[2674])
Fall. 3 credits. Z. Fahmy.
For description, see NES 274.
JWST 275(2675) The Religions of Ancient Israel (also NES/RELST 275[2675], ARKEO 276[2675])
Spring. 3 credits. J. Zorn.
For description, see NES 275.

## JWST 291(2793) Middle Eastern Cinema

 (also NES 293[2793], FILM/COM L 293[2930], VISST 293[2193])Fall. 4 credits. D. Starr.
For description, see NES 293.
JWST 301/302(3101/3102) Advanced Intermediate Modern Hebrew (also NES 301/302[3101/3102])
301, fall; 302, spring. 4 credits. N. Scharf. For description, see NES 301-302.

## JWST 305(3105) Conversational Hebrew

 (also NES 305[3105])Spring. 2 credits. Limited to 15 students.
Prerequisite: NES 302, 400, or permission
of instructor; non-native speakers only.
N. Scharf.

For description, see NES 305
JWST 353(3700) History of the Holocaust (also HIST 370[3700])
Spring. 4 credits. V. Caron.
For description, see HIST 370.

JWST 365(3665) Ancient Iraq II (also NES/ARKEO 365/3665)
Fall. 4 credits. D. I. Owen.
For description, see NES 365.
JWST 400(4100) Advanced Readings in Modern Hebrew (also NES 400[4100])
Fall. 4 credits. Limited to 15 students.
D. Starr.

For description, see NES 400.
JWST 401(4101) Modern Hebrew Literature (also NES 401[4101]]
Spring. 4 credits. D. Starr.
For description, see NES 401.
JWST 420(4102) Biblical Hebrew ProseJudges (also NES 420[4102], RELST 420[4102])
Spring. 4 credits. L. Monroe.
For description, see NES 420.
JWST 438(4738) Imagining the Mediterranean (also NES 438[4738], COM L 496[4960])
Fall. 4 credits. G. Holst-Warhaft.
For description, see NES 438.
JWST 440(4540) Maimonides and Averroes (also NES/RELST 440[4540], SPAN 438[4380])
Spring. 4 credits. R. Brann.
For description, see NES 440.
JWST 446(4170) History of Jews: Modern France (also HIST 417[4170])
Spring. 4 credits. V. Caron.
For description, see HIST 417.
JWST 458(4580) Imagining the Holocaust (also ENGL 458[4580], COM L 483[4830])
Spring. 4 credits. D. Schwarz.
For description, see ENGL 458.
JWST 470(4670) Wealth and Power in Early Civilizations (also NES 470[4670])
Fall. 4 credits. C. Monroe.
For description, see NES 470.
JWST 491-492(4991-4992) Independent Study-Undergraduate
Fall and spring. Variable credit. Staff.
JWST 620|6112) Readings in Medieval Hebrew Poetry and Prose (also NES 620[6112])
Fall. 4 credits. R. Brann.
For description, see NES 620.

## Courses not offered 2007-2008

JWST 236 Israel: Literature and Society (also NES 236)
JWST 248 Introduction to Classical Jewish History (also RELST/NES 248)

JWST 255 Women and the Holocaust (also ENGL/FGSS 252)

JWST 271 Yiddish Linguistics (also LING 241)

JWST 299 The Hebrew Bible and the Arabic Qur'an in Comparative Perspective (also NES/RELST/ COM L 299)

JWST 323 Reinventing Biblical Narrative Apocrypha and Pseudepigrapha (also NES/RELST 323)

JWST 328 Gnosticism and Early Christianity (also NES 328, RELST 330)

JWST 344 The History of Early Christianity (also NES 324, CLASS 344, RELST 325)

JWST 371 A Mediterranean Society and Its Culture: The Jews under Classical Islam (also NES/RELST/COM L 371)

JWST 435 Aramaic (also NES 435)
JWST 449 Rescreening the Holocaust (also GERST 449, COM L 453, THETR 450)

JWST 494 Studies in the Novel: Reading Joyce's Ulysses (also ENGL 470)

JWST 639 Islamic Spain: Culture and Society (also NES 339/639, JWST 339, RELST/CDM L 334, SPAN 339/699)

JWST 694 Joyce's Ulysses and the Modern Tradition (also ENGL 670)

## JOHN S. KNIGHT INSTITUTE FOR WRITING IN THE DISCIPLINES

The director of the John S. Knight Institute is Paul Lincoln Sawyer, professor in the Department of English. Katherine Gottschalk, senior lecturer in the Department of English, is the Walter C. Teagle Director of First-Year Writing Seminars. The institute's offices are in 101 McGraw Hall, 255-4061.
D. Evans (Writing Workshop), M. Gilliland (Writing Workshop), K. Hjortshoj (Writing in the Majors), B. LeGendre (Writing Workshop), J. Martin (Writing Workshop), J. Pierpont (Writing Workshop), E. Shapiro (Writing Workshop)
The John S. Knight Institute helps to coordinate the teaching of writing in all undergraduate schools and colleges (the School of Industrial and Labor Relations; the School of Hotel Administration; and the colleges of Agriculture and Life Sciences; Architecture, Art, and Planning; Arts and Sciences; Engineering; and Human Ecology). The program administers writing seminars for first-year and upperclass students, disciplinebased seminars in its Writing in the Majors/ Sophomore Seminar Program, tutorial writing classes, and seminars in the teaching of writing. More than 30 academic departments and programs participate in the program.

## First-Year Writing Seminars

For first-year students the Institute offers the First-Year Writing Seminars-more than 125 different courses in the humanities, social sciences, expressive arts, and sciences. Through introductory work in a particular field of study, seminars help students write good English expository prose-prose that, at its best, is characterized by clarity, coherence, intellectual force, and stylistic control. All seminars pursue this common aim through small classes, with a maximum of 17 students, and adherence to a program-wide set of guidelines:

- Seminars should require at least six-and at most nine-formal essays on new topics, totaling 25-30 pages of polished prose.
- No fewer than three of the six to nine required essays should go through a process of development under the instructor's guidance (e.g., revision, peer review, responses to readings,
conferences)
- All seminars should spend ample classroom time on work directly related to writing.
Reading assignments in the course subject should be kept under ca. 75 pages per week to permit regular, concentrated work on writing.
- All students should meet in at least two individual conferences with the instructor.

Offerings change from semester to semester. Each semester's First-Year Writing Seminars are described on the weh at http://fws.arts.cornell edu.

To ensure that students will enjoy the benefits of small writing classes, First-Year Writing Seminars are limited to no more than 17 students. Instead of pre-enrolling in their writing courses, students request placement in one of five writing seminars by filling out an electronic ballot in August for the fall semester and in November for the spring semester Over 90 percent receive one of their top three choices. After placement by ballot, students may change their writing seminars via electronic add and drop. Writing seminars may be added only during the first two weeks of each semester.

The colleges and the schools served by the Institute accept First-Year Writing Seminars in fulfillment of their individual graduation requirements in categories referred to variously as "first-year writing," "oral and written expression," and the like. The Institute does not decide whether students may graduate: it makes courses available. Individual colleges and schools administer their own graduation requirements.
Currently, most undergraduate students are required to take two First-Year Writing Seminars. Architecture majors, however, need only one. Hotel students fulfill their requirement in one semester, through H ADM 165 in one semester plus one First-Year Writing Seminar in the other. Agriculture and Life Sciences students can take First-Year Writing Seminars or choose from among a variety of other courses to fulfill their requirement.
All students who score 5 on the Princeton Advanced Placement Examination in English receive 3 credits. Such credits are awarded automatically; no application to the John S . Knight Institute or the Department of English is necessary. How these credits may be applied to first-year writing or other distribution requirements depends on the student's college and score. All students who score 5, except Architecture majors, may apply their 3 credits toward the writing requirements of their college. Of students who score 4, only Agriculture and Life Sciences students and Industrial and Labor Relations students may apply their 3 credits toward the writing requirements of their college. Students should always consult their college registrars to be certain that they understand their writing requirements.

Students who have already taken a First-Year Writing Seminar, or who score 4 or 5 on the Princeton AP exam, or 700 or better on the

English Composition or CEEB tests, may enroll, space permitting, in the following upper-level First-Year Writing Seminars: ENGL 270,271 , or 272.

Although there are no exemptions from college writing requirements, some students may fulfill all or part of their college's writing requirement through transfer credits or writing-course substitutions.
For work done at other institutions to be accepted as equivalent to First-Year Writing Seminars, students should demonstrate that they have done a reasonably equivalent amount of writing in a formal course (e.g., it is not sufficient to write one 30 -page term paper.) Students in the College of Engineering and the College of Arts and Sciences must file an "application for transfer evaluation" to request writing credit for such courses; students in other colleges should consult their college registrars.
In unusual circumstances, upper-level students may petition to use a Cornell writing course other than a First-Year Writing Seminar to satisfy part of their writing requirement. The John S. Knight Institute must approve all such petitions in advance.
For information about the requirements for First-Year Writing Seminars and descriptions of seminar offerings, see the John S. Knight Institute web site at http://arts.cornell.edu/ knight_institute

## English 288-289: Expository Writing

Helps students write with more confidence and skill in all disciplines. Open to Cornell sophomores, juniors, and seniors, ENGL 288289 courses explore themes shaped by a genre or use of expository writing, by the common concerns of several disciplines, or by an interdisciplinary topic intimately related to the written medium. Although English department instructors make up roughly half the staff, the Knight Institute's involvement enables the course to extend and diversify its' offerings in separately defined, 16 -member sections that appeal to the varied interests and needs of students in many areas of study Students may choose among a variety of sections focusing on such themes as "War, Peace, Terror, and the Law," "Making the News," "The Reflective Essay," "Hollywood Babylon," and "Rights, Democracy, and the Courts." All staff are selected because their special interests and their training and experience in First-Year Writing Seminars promise original course design and superior performance.

## Writing in the Majors/Sophomore Seminars

Spanning the humanities, social sciences, and sciences, the Knight Institute's upper-level, Writing in the Majors courses do not satisfy formal writing requirements, and faculty participation is entirely voluntary. While all Writing in the Majors courses include extensive writing, usually with guided revision, they also emphasize other forms of active, interactive learning essential to scholarship and careers in the disciplines Writing in the Majors initiatives have included individual and collaborative research projects, collaborative writing, oral presentations, group oral exams, field studies, authentic studentdesigned laboratory experiments, debates, analytical and critical reading exercises, topical
symposia, conversation groups, student-led discussions, poster sessions, and many kinds of informal writing, including online exchanges. Varying radically in design and size, from enrollments of fewer than 10 students to more than 300 , Writing in the Majors courses over the past 19 years have involved collaboration with 150 faculty members and more than 250 graduate teaching assistants to enrich learning in 75 upper-level courses offered in 24 departments. In 2007-2008, the Knight Institute substantially incfeased the number of Writing in the Majors courses offered at the 200 level. These courses are intended to provide students who are still in the early stages of their academic careers with opportunities to engage with disciplinary subject matter through writing.

## WRIT 701(7101) Writing in the Majors

 SeminarFall and spring. 1 credit. S-U grades only. Teaching assistants assigned to Writing in the Majors projects enroll in a six-week course on teaching strategies in advanced instruction.

## Teaching Writing

Each summer and fall, the institute offers instruction in the teaching of writing to new staff members in the First-Year Writing Seminars and other interested instructors. Teaching Writing, offered in the summer or fall, is primarily a course for graduate students. The program also sponsors a summer apprenticeship program for a limited number of graduate students, and a summer seminar for faculty members interested in the teaching of writing.

## WRIT 700(7100) Teaching Writing

Summer and fall. 1 credit. S-U grades only. Summer and fall. 1 credit. S-U grades only.
Prepares graduate instructors of Cornell's FirstYear Writing Seminars to teach courses that both introduce undergraduates to particular fields of study and help them develop writing skills they will need throughout their undergraduate careers. Seminar discussions and readings on pedagogical theories and practices provide an overview of the teaching of writing within a disciplinary context. As part of the course, participants develop written assignments designed to be used in their own First-Year Writing Seminars.

## Writing Workshop

The John S. Knight Institute offers "An Introduction to Writing in the University" for first-year students (or transfer students needing writing credit) through the Writing Workshop. This course is designed for students who have had little training in composition or who have serious difficulty with writing assignments.
WRIT 137 and 138 are graded S-U only, and students receiving a grade of S are granted credit toward their college writing requirements. Students who think this course might be appropriate including non-native speakers of English scoring less than 600 on the Test of English as a Foreign Language (TOEFL) should attend the assessment sessions offered by the Writing Workshop during orientation week each fall. The workshop also offers a Walk-In Service (see below) to help students work on writing assignments. The director is Joe Martin, senior lecturer in the Writing Workshop. The
workshop offices are in 174 Rockefeller Hall, 255-6349.

## The Writing Walk-In Service

Through the Writing Walk-In Service, the Writing Workshop offers tutoring assistance in writing to any student who needs help with a writing project. The Writing Walk-In Service has tutors available during the academic year in 174 Rockefeller Hall and North and West Campus residential areas. The director is Mary Gilliland. For information, contact the Writing Workshop, 174 Rockefeller Hall, 255-6349.

## WRIT 137-138, 134(1137-1138, 1134) An Introduction to Writing in the University

137, fall; 138, spring; 134, summer. 3 credits each semester. Limited to 12 students per sec in fall and spring, 6 in summer. Prerequisite: permission of instructor. S-U grades only.
Writing seminar designed for students who need more focused attention to master the expectations of academic writing. Emphasizes the analytic and argumentative writing and critical reading essential for university-level work. With small classes and weekly student/ teacher conferences, each section is shaped to respond to the needs of students in that particular class.

## WRIT 139|1139) Special Topics in Writing

Fall and spring. 3 credits. Cannot fulfill writing or distribution requirements.
Prerequisite: undergraduate standing;
permission of instructor. S-U grades only. These courses allow students the opportunity to resolve significant writing challenges that have interfered with their academic progress Students must have ongoing writing projects on which to work. Instruction is in weekly tutorials. Interested students should go to 174 Rockefeller for more information.

## WRIT 702(7102) Graduate Writing

 WorkshopFall and spring. 3 credits. Limited to 10 students per sec. Prerequisites: graduate standing; permission of instructor. S-U grades only.
Gives graduate students the opportunity to resolve significant writing challenges that have interfered with their academic progress.
Students must have ongoing writing projects to work on. Instruction is in weekly tutorials. Interested students should go to 174
Rockefeller Hall for further information.

## WRIT 703(7103) Work in Progress

Fall and spring. 3 credits. Limited to 10 students per sec. Prerequisite: graduate standing and permission of instructor. S-U grades only.
Writing seminar for graduate students who have substantial work in progress, such as professional articles, theses, or dissertations. In the first two weeks students discuss shetorical and stylistic features of scholarly writing and methods of composing and revising, with relevant readings. Remaining weeks emphasize exchange and discussion of drafts, supplemented by individual conferences. The course goal is the improvement and completion of student writing projects.

KHMER (CAMBODIAN)
See "Department of Asian Studies."

## KOREAN

See "Department of Asian Studies

## LATIN AMERICAN STUDIES PROGRAM

## 190 Uris Hall

1)avid Block, Ibero-American Bibliographer, Interim Director, Latin American Studies Program; Vilma Santiago-Irizarry, Anthropology, please contact LASP; Lourdes Benería, City and Regional Planning; Robert Blake, Animal Science; Bruno Bosteels, Romance Studies; Debra Ann Castillo, Romance Studies, please contact LASP; María Lorena Cook, School of Industrial and Labor Relations; Raymond Craib, History; Eleanor Dozier, Romance Studies; Maria Fernandez, History of Art; Gary Fields, International Labor Relations and Economics: Maria Antonia Garcés, Romance Studies; Maria Cristina García, History; William W. Goldsmith, City and Regional Planning; Karen Graubart, History; Jere D. Haas, Anthropology, Nutritional Science; Luz Horne, Romance Studies; Zulma Iguina, Romance Studies; Steven Jackson, Government; Teresa Jordan, Geological Science; Eduardo Kohn. Anthropology; Steven Kyle, Agricultural Economics; David R. Lee, Applied Economics and Management; Barbara Lynch, City and Regional Planning; Luis Morató, Romance Studies; Jura Oliveira, Romance Studies; Edmundo Paz Soldán, Romance Studies; Gretel Pelto, Nutritional Sciences; Simone Pinet, Romance Studies; Alison Power, Department of Ecology and Evolutionary Biology; Eloy Rodríguez, Plant Biology; Jeannine RoutierPucci, Romance Studies; Elvira Sánchez-Blake, Romance Studies; Roberto Sierra, Music; Jose M. Rodriguez-Garcia, Romance Studies; María Stycos, Romance Studies. Emeritus: Donald Freebairn, Agricultural Economics; Thomas Poleman, Agricultural Economics; Don Sola, Romance Studies; Joseph M. Stycos, Development Sociology; David Thurston, Plant Pathology; Frank Young, Development Sociology.
Cornell's Latin American Studies Program (LASP) was founded in 1961 with funds from the Mario Einaudi Center for International Studies and a major grant from the Ford Foundation. The National Defense Education Act (NDEA) Language and Area Center established LASP in 1966 as one of the nation's premier Latin American centers. Today, the Latin American Studies Program provides a focus for all activities oriented toward Latin America on the Cornell campus. Latin Americanists are active in most of Cornell's colleges and schools, with such diverse strengths as the languages and literatures of the area, agricultural sciences, city and regional planning, anthropology, history, economics and the other social sciences. It is the purpose of the program to stimulate teaching by establishing contacts with Latin American universities and institutions, supporting research through grants to faculty members and graduate students, and sponsoring visiting scholars from Latin America. LASP offers a concentration in

Latin American Studies for undergraduate students and a graduate minor for graduate students.

## Undergraduate Concentration

To complete an undergraduate concentration in Latin American Studies, students must earn a minimum of 15 credits in Latin American Studies. Latin American content courses not on the list may be approved by petition only. To satisfy the requirements of the concentration, undergraduates must select courses from at least three fields and must include at least one course at the advanced level. Language Instruction below the 300 level may not be counted toward the credit requirement. However, language facility in Spanish, Portuguese, or Quechua must be demonstrated by successfully completing SPAN 219, PORT 219, QUECH 219, or the equivalent.

## Courses

LAT A 195(1950) Colonial Latin America (also HIST/AIS 195[1950])
Fall and spring. K. Graubart.
For description, see HIST 195.

## LAT A 215(2150) The Tradition of

 Rupture (also SPAN 215[2150])Fall. J. Rodriguez-Garcia and staff. For description, see SPAN 215.

## LAT A 217(2170) Readings-Medieval/

 Early Mod Sp (also SPAN 217[2170])Fall. M. A. Garcés.
For description, see SPAN 217.
Lat A 220(2200) Perspectives on Latin America (also SPAN 220[2200])
Fall. E. Paz-Soldan and Director, Latin American Studies Program.
For description, see SPAN 220.
LAT A 245(2450) Drugs: People, Policies, Politics (also HIST 245)
Fall. M. Roldan.
For description, see HIST 245.
LAT A 301(3010) Hispanic Theater Production (also SPAN 301[3010]) Fall. D. Castillo.
For description, see SPAN 301

## [LAT A 306|3060) Modern Mexico (also

 HIST 306[3060])]LAT A 312(3211) Forging Nations (also HIST 312[31 20])
Fall. M. Roldan.
For description, see HIST 312.
LAT A 329(3290) Comparative Politics of Latin America (also GOVT 329[3293]) Fall. 4 credits. K. Roberts.
For description, see GOVT 329.
LAT A 330(3300) Latin American Studies: Issues in Interdisciplinary Perspective (also HIST 333[3331], ANTHR 331[3431])
Fall. M. Roldan and J. Henderson. Examines a range of topics that characterize Latin America in the 20th and 21st centuries by examining key texts dealing with the region and interpreted by the instructors and several visiting lecturers. The course provides advanced undergraduates and graduate students with an opportunity to broaden their knowledge of the area and to do in-depth research on an area of interest.

LAT A 339(3390) Political Economy of Mexico (also ILRIC 339[3390])
Spring. M. Cook.
For description, see ILRIC 339.

## LAT A 368(3680) Modern and

 Contemporary LatIn American Art (also ART H 3680[3550], LSP[3680])Spring. M. Fernandez.
For description, see ART H 368.

## Lat A 371(3710) Cuba: Search for Development Alternatives (also CRP 371[3710])

Fall. B. Lynch.
For description, see CRP 371.
LAT A 376(3760) Latin American Cities (also CRP 376[3760])
Fall. B. Lynch.
For description, see CRP 376.

## LAT A 405(4050) U.S.-Cuba Relations (also HIST/LSP/AM ST 405/605[4050/6050]) <br> Fall. M. C. Garcia. <br> Lat A 426(4260) Social Movements in Latin America (also GOVT 426/626[4264/6264], LAT A 626[6260])

Fall. K. Roberts.
For description, see GOVT 426.
LAT A 519(5190) Urban Theory and Spatial Development (also CRP 519[5190])
Spring. W. W. Goldsmith.
For description, see CRP 519.

## LAT A 600(6000) Contemporary Issues in

 Latín AmericaFall and spring. Director, Latin American Studies Program.
An exploration of critical topics in the Anthropology, Art, Economics, History, Literature, Political Science, and Sociology of Latin America. Course features guest speakers from Cornell and other institutions.
LAT A 602(6020) Agriculture in the Developing Nations II (also IARD 602[6020])
Spring. R. Blake.
For description, see IARD 6020.
LAT A 605(6050) U.S.-Cuba Relations (also AM ST/LSP/HIST 405/605[4050/6050])
Fall. 4 credits. M, C. Garcia.

## [LAT A 612(6120) Colonial Latin America

 (also HIST 612[6120])Fall. 4 credits. Next offered 2009-2010. K. Graubart.]

Lat A 626(6260) Social Movements in Latin Amerlca (also GOVT 426/626[4624/6264], LAT A 426[4280])
Fall. K. Roberts.
For description, see GOVT 426.
LAT A 635(6350) Labor Markets and Income Distribution in Developing Countries (also ILRIC 635[6350]) Spring. G. Fields.
For description, see ILRIC 635.
LAT A 636(6360) Indigenous Globalization (also D SOC/AIS 635[6350])
Fall. A. Gonzales.
For description, see D SOC 635.

LAT A 674(6740) Transformatlons in the Global South (also CRP 674[6740])
Spring. W. W. Goldsmith.
For description, see CRP 674.

## Lat A 676(6760) Latin Amerlcan Citles

 (also CRP 676[6760])Fall. B. Lynch.
For description, see CRP 676.
LAT A 739(7390) Political Economy of Mexico (also ILRIC 739[7390])
Spring. M. Cook.
For description, see ILRIC 739.

## LATINO STUDIES PROGRAM

## 434 Rockefeller Hall

## Undergraduate Concentration

The Latino Studies Program offers an interdisciplinary undergraduate concentration in Latino studies, with courses mostly drawn from history, sociology, anthropology,
literature, and language, but the program also cross-lists courses from other colleges.

- To complete the concentration, students must take at least five courses (a minimum of 15 credits) in Latino Studies, including Latinos in the United States (D SOC 265, LSP 201, and SOC 265), which is offered each spring semester.
- Students are required to include at least three courses from Groups I and II (one from each group, and another from either group). Of the three courses, two must be at the 300 or 400 level.
One elective course (see list below) can count toward the concentration. Courses must be completed with a letter grade of C or above. Independent studies and first-year writing seminars do not count toward concentration requirements. The list varies each semester in accordance with faculty schedules and visiting appointments.


## Group I: Humanlties

LSP 225 The United States-Mexico Border: History, Culture, Representation (also AM ST/HIST 225)
LSP 240 Survey in U.S. Latina/o Literature (also AM ST/ENGL 240)
LSP 246 Contemporary Narratives by Latina Writers (also FGSS/SPAN 246)
LSP 248 Poetry of the Latina/o Experience (also SPAN 248)
LSP 260 Latinos in the United States: Colonial Period to 1898 (also AM ST 259, HIST 260)
LSP 261 Latinos in the United States: 1898 to the Present (also AM ST/HIST 261)
LSP 264 Exploring Latino/a Identity (also ENGL 264)
LSP 303 American Dreams (also SPAN 303)
LSP 398 Latina/o Popular Culture (also AM ST 396, ENGL 398)
LSP 413 Classics of Latina/o Literature (also SPAN 413)
LSP 462 Senior Seminar in Latina/o Studies: Chicana Feminism in a Globalizing World (also ENGL 462, AM ST 452)

LSP 693 Gender, Globalization, and Latina/o Literature (also ENGL 693)

## Group II: Social Sclences

LSP 201 Latinos in the United States (also D SOC/SOC 265)
LSP 220 Sociology of Health and Ethnic Minorities (also D SOC 220)
LSP 221 Anthropological Representation: Ethnographies of Latino Culture (also AM ST/ANTHR 221)
LSP 230 Latino Communities (also D SOC 230, AM ST 231)
LSP 355 Latinos, Law, and Identity (also AM ST 357, D SOC 355)
LSP 375 Comparative U.S. Racial and Ethnic Relations (also AM ST/D SOC 375)
LSP 431/
631 Farmworkers (also HIST 431/631)
LSP 451 Multicultural Issues in Education (also EDUC 451)
LSP 610 Political Identity: Race, Ethnicity, and Nationalism (also GOVT 610)
LSP 624 Ethnoracial Identity in Anthropology, Language, and Law (also ANTHR 624, LAW 723)
LSP 660 Language, Ideologies and Practices (also ANTHR 660)

## Electives:

LSP 100 Introduction to World Music I: Africa and the Americas (also MUSIC 103)
LSP 101 Research Strategies in Latino Studies
LSP 111 Introduction to American Studies: New Approaches to Understanding American Diversity, the 20th Century (also AM ST 110, HIST 161)
LSP 202 Spanish for English-Spanish Bilinguals (also SPAN 200)
LSP 241 Immigration and Ethnicity in 20thCentury United States (also HIST 240, AM ST 239)
ISP 311 Social Movements (also AIS/D SOC 311)

LSP 319 Racial and Ethnic Politics in the United States (also GOVT 319, AM ST 313)

LSP 368 Modern and Contemporary Latin American Art (also ART H 368)
LSP 377 The United States (also ANTHR/AM ST 377)
LSP 405/605 U.S.-Cuba Relations (also HIST 405/605, LAT A 405/605)
LSP 423 Borders (also COM L 423, SPAN 490)
LSP 485 Immigration: History, Theory, Practice (also HIST/AM ST 485)
LSP 694 Bilingual Education in Comparative Perspectives (also EDUC 694)
ART 214 Art and the Multicultural Experience
Other elective courses will be determined each semester.

## Graduate Minor

Students wishing to complete a graduate minor in Latino studies need to formally register with the Latino Studies Program office, take an upper-level seminar plus two advanced courses in Latino Studies and work intensively with a faculty member outside of their major field. In
lieu of available courses, the student and his or her minor field advisor may design a special project that culminates in a paper given at a conference or presented for publication. Each special project requires the approval of the director of graduate studies for the minor field. Upon completion of the minor, students receive a certificate from the program. Sudents wishing to pursue the graduate minor field in Latino studies must file an application at the Latino Studies Program, 434 Rockefeller Hall.

## Llbrary

The Latino Studies Program library in 432 Rockefeller Hall serves Cornell students, faculty, staff, and the wider local community. The library maintains print and media material pertinent to U.S. Latino issues including a collection of books, research material, archives, and films. The library and conference room also provide meeting space for more than 25 Latino student organizations.

## Courses

[LSP 100(1301) Introduction to World Musle: Africa and the Americas (also MUSIC 103[1301])
3 credits. 1-hour disç. Next offered 20082009. S. Pond

For description, see MUSIC 103.]

## LSP 101(1101) Research Strategies in Latíno Studies

Spring. 1 credit. T. Cosgrave.
The digital revolution has made an enormous amount of information available to research scholars, but discovering resources and using them effectively can be challenging. This course introduces students with research interests in Latino Studies to search strategies and methods for finding materials in various formats (e.g., digital, film, and print) using information databases such as the library catalog, print and electronic indexes, and the World Wide Web. Instructors provide equal time for lecture and hands-on learning. Topics include government documents, statistics, subject-specific online databases, social sciences, the humanities, and electronic citation management.

## LSP 201(2010) Latinos in the United States (also SOC/D SOC 265[2650])

Spring. 4 credits, variable. H. Velez.
For description, see SOC 265.
LSP 202(2020) Spanish for EnglishSpanlsh Bilinguals (also SPAN 200[2000])
Fall. 4 credits. N. Maldonado-Mendez For description, see SPAN 200.

LSP 220(2200) Sociology of Health and Ethnic Minorities (also D SOC 220[2200])
Fall. 3 credits. P. Parra
Discusses the health status of minorities in the United States. Specifically explores intragroup diversity such as migration, economic status, and the influence of culture and the environment on health status and access to health care. Although special attention is given to Latino populations, discussion encompasses other minorities who face similar problems.

## [LSP 221(2721) Anthropological

 Representation: Ethnographies on Latino Culture (also AM ST/ANTHR 221[2721])3 credits. Next offered 2008-2009
V. Santiago-Irizarry

For description, see ANTHR 221.]
[LSP 230(2300) Latino Communitles (also D SOC/AM ST 231[2300]]
3 credits. Next offered 2008-2009. R. Mize.
For description, see D SOC 230.]
LSP 246(2460) Contemporary Narratlves by Latina Writers (also SPAN/FGSS 246[2460])
Fall. 3 credits. D. Castillo.
For description, see SPAN 246.
[LSP 248(2480) Poetry of the Latina/o Experience (also SPAN 248[2480])
Spring. 3 credits. Next offered 2008-2009
For description, see SPAN 248.]
LSP 260(2600) Latinos In the United States: Colonial to 1898 also MIST 260[2600], AM ST 259[2590])
Fall. 4 credits. M. C. Garcia
For description, see HIST 260.
LSP 261(2610) Latinos in the United States: 1898 to the Present (aiso HIST/AM ST 261[2610])
Spring. 4 credits. M. C. Garcia.
For description, see HIST 261.
LSP 313(3130) Spanish Writing Workshop for Advanced Engllsh/Spanish Bilinguals (also SPAN 313 [3130])
Fall. 1 credit. Prerequisite: permission of instructor. Students must be registered concurrently with LSP 202. N. MaldonadoMendez.
For description, see SPAN 313
[LSP 319(3191) Raclal and Ethnic Politics In the United States (also GOVT 319[3191], AM ST 313[3191])
4 credits. Next offered 2008-2009.
M. Jones-Correa.

For description, see GOVT 319.]
LSP 355[3550] Latinos, Law, and Idently [also AM ST 357[3550], D SOC 355[3550]
Fall. 3 credits. R. Mize.
For description, see D SOC 355.
LSP 368(3551) Modern and Contemporary Latino/Latin American Art (also ART H 368[3550], LAT A 368[3680])
Spring. 4 credits. M. Fernandez.
For description, see ART H 368.
[LSP 375(3750) Comparative U.S. Raclal and Ethnic Relations (also AM ST 375[3750], D SOC 375[3750])]

LSP 377(3777) The United States (also ANTHRAM ST 377[3777])
Fall. 4 credits. V. Santiago-Irizarry.
For description, see ANTHR 377.
[LSP 398(3980) Latina/o Popular Culture (also ENOL 398[3980), AM ST 396[3981])
4 credits. Next offered 2008-2009
M. P. Brady.

For description, see ENGL 398.]

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LSP 405/605(4050/6050) U.S.-Cuba Relations (also AM ST/HIST/LAT A/ LSP 405/605[4050/6050])
Spring 4 credits. M. C. Garcia.
For description, see HIST 405/605.
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## LSP 420-421(4200-4210) Undergraduate

 Independent StudyFall and spring. 2-4 credits. Prerequisite: permission of instructor.
Guided independent study.

LSP 423(4230) Borders (also COM L 423[4230], SPAN 490[4900])
Fall 4 credits. D. Castillo.
For description, see COM L 423.
LSP 431/631(4310/6310) Farmworkers (also CRP 395.72/679.72, HIST 431/631[4310/6310], ILRCB 402[4020]) (HA-AS)
Spring. 4 credits. Team taught. Faculty supervisor: TBA.
Interdisciplinary, team-taught course on the world of rural migrant labor. Weekly sessions taught by faculty members from across campus combine short lectures and discussion of assigned readings. Emphasis is on migrant farmworkers in the United States, mostly from the Caribbean and mainland Latin America, with an increasing focus as the semester progresses on farmworkers in central and upstate New York. Course requirements include analytical essays, a final paper, and participation in a service-learning project that are arranged in conjunction with the instructors

## LSP 451(4510) Multicultural Issues in

 Education (also EDUC 451[4510])Fall. 3 credits. S. Villenas.
LSP 485(4850) Immigratlon: History, Theory, and Practice (also HIST 485[4850], AM ST 485[4850])
Fall. 4 credits. M. C. Garcia.
For description, see HIST 485.

## LSP 620-621(6200-6210) Graduate

 Independent StudyFall, spring. 2-4 credits. Prerequisite: permission of instructor.
Guided independent study.
LSP 624(6424) Ethnoracial Identity in Anthropology, Language, and Law (also ANTHR 624[6424], LAW 723)
Spring. 4 credits. V. Santiago-Irizarry. For description, see ANTHR 624.
[LsP 694(6940] Bilingual Education in Comparative Perspectives (also EDUC 694[6940])
3 credits. Next offered 2008-2009.
S. Villenas.]

## LAW AND SOCIETY

Co-directors: M. Lynch (science and technology studies), 302 Rockefeller Hall, 2557294, mel27@cornell.edu, and R. Lieberwitz (ILR), 287A Ives Hall, 255-3289, rll5@cornell. edu
Advisers: G. Alexander (law), D. Dunning (psychology), G. Hay (law), B. Hendrix (government), P. Hyams (history), M. Katzenstein (government), R. Miller (philosophy), M. Moody-Adams (philosophy), M. B. Norton (history), D. Powers (Near East studies), A. Riles (law), V. Santiago-Irizarry (anthropology), S. Shiffrin (law)
The law and society concentration provides an opportunity for focused study of the interaction between law and society from an interdisciplinary perspective predominantly rooted in the social sciences and humanities: anthropology, comparative literature, economics, government, history, philosophy, psychology, science and technology studies, and sociology.
The concentration is open to all undergraduates, but interested students with
majors outside the College of Arts and Sciences are advised to check their college's policy and procedures regarding external concentrations, including whether the concentration is included on their college transcript. All students completing the concentration will receive a certificate and can include their participation in the law and society concentration on a résumé or law school application.
To allow sufficient time for a coherent program of study to be developed and completed, students who have an interest in this concentration are required to register before the start of the second semester of their junior year. Under extenuating circumstances, late registrations may be accepted at the discretion of the directors, but only if the registrant has a plan already formulated for completing the concentration's requirements. Special late registration forms that include the student's plan outline are available in the Ethics and Public Life (EPL) office, 240 Goldwin Smith Hall.
The standard law and society registration form is available online at www.arts.comell.edu/epl and in the EPL office. As part of the registration process, each student is assigned a law and society adviser who is available to provide guidance with course selection and help with other questions or concems related to the student's participation in the concentration. The name and contact information of the assigned adviser are included in a welcome e-mail that is sent shortly after a student's registration form is received.

## Four-Event Requirement

Many students find access to and participation in law and society events a particularly beneficial component of the concentration. Officially registered law and society students are notified of qualifying events (usually at least 10 per semester) and other information related to the concentration through an e-mail listserve and postings outside the Ethics and Public Life office. Attendance at a minimum of four events (tracked with sign-in sheets) is required between registration and graduation, but students seeking a broader perspective are encouraged to attend as many events as they can.

## Four-Course Requirement

Law and society is an interdisciplinary concentration requiring students to successfully complete four courses (at least 12 credits) from the approved course list, earning a letter grade no lower than $C$ - in each. Of the four qualifying courses, at least two must be outside the student's major, and no more than two can be in the same subject area. Crosslisted courses may be counted in any of the departments listed. Students who have a double major are permitted to select one major as the dominant and use applicable courses from the second major toward the four-course requirement. Appropriate courses taken before registering for the law and society concentration can be counted toward the fourcourse requirement. There are no required courses, but past students have found GOVT 313 and PSYCH 265 particularly relevant. At the discretion of the law and society directors, permission may be granted to substitute an appropriate course that has been:

1. accepted from another educational institution toward the student's degree program (one course maximum)
2. taken as part of a semester abroad program
3. recently added to the Cornell curriculum

The best evidence of a course's
appropriateness is the syllabus, which is often available online and can be submitted electronically to one of the directors for their determination. Petitions for course
substitutions should be submitted before the student's final semester.
To facilitate tracking of courses taken and/or events attended, a printable student progress record can be accessed electronically or obtained as a preprinted form from the EPL office.
The law and society concentration is administered by the Ethics and Public Life (EPL) office. For more information, contact the EPL administrative assistant at 240 Goldwin Smith Hall, epl@cornell.edu, or 255-8515.

African American History (AM ST 344 / HIST 335)

African-American Social Political Thought (AS\&RC 231)
American Constitutional Development (AM ST 317/HIST 318)

American Political Development in the 20th Century (GOVT 404)
American Political Thought from Madison to Malcolm X (AM ST 376/HIST 316/ GOVT 366)

Applied Public Finance (PAM 204)

## Arbitration (ILRCB 602)

Asian American Politics and Public Policy (AAS 390)

Biblical Seminar (COM L 428/RELST 427)
Biomedical Ethics (B\&SOC/S\&TS 446)
Biotechnology and the Law (B\&SOC/S\&TS 406)

Business and Government in the Global Marketplace (AEM 432)

Children and the Law (HD 233)
Christianity and Judaism (COM L/RELST 326)

Civil Liberties in the United States (AM ST 310/GOVT 327)

Classical Theory (SOC 375/D SOC 301)
Coastal and Oceanic Law and Policy (NTRES 306)
Communication Law (COMM 428/HIST 440)

Comparative Issues in Social Stratification (D SOC 370/SOC 371)
Competition Law and Policy (LAW 402)
Conflict Resolution in Medieval Europe (HIST 436)

Conflict, Dispute Resolution, and Law in Cultural Context (ANTHR 328)
Constitutional Aspects of Labor Law (ILRCB 689)
Contemporary Moral Issues (PHIL 145)

## Contemporary Political Philosophy (GOVT 465/PHIL 447) <br> Copyright in the Digital Age (COMM 494) <br> Corporations, Shareholders, and Pollcy (PAM 334)

Culture, Law, and Politics of the Internet (INFO 515)

Drugs and Society (SOC 246)
Economics and the Law (ECON 404)
Economics of Business Regulation (AEM 331)

Economics of Consumer Laws and Protection (PAM 341)
Economics of Family Policy: Adults (ECON 420)

Economics of Family Pollcy: Children (ECON 421)

Employment Discrimination (H ADM 485)
Employment Discrimination and the Law (ILRCB 684)

Environmental Governance (B\&SOC/S\&TS/ NTRES 331)

Environmental Law (CRP 451]
Environmental Politics (CRP 380)
Ethical Issues in Health \& Medicine (B\&SOC/S\&TS 205)
Ethical Theory (PHIL 341)
Ethics (PHIL 241)
Ethics and Health Care (PHIL 245)
Ethics and Public Life (PHIL 247)
Ethics and the Environment (B\&SOC/S\&TS 206/PHIL 246)

Ethnoracial Identity in Anthropology, Language, and Law (ANTHR/LSP 624) LAW 723)

Families and Social Policy (HD 456)
Farmworkers (CRP 395.72/HIST/LSP/LASP 431/ILRCB 402)

Feminist Philosophy (PHIL 249)
Formation of Islamic Law (HIST 453/NES) RELST 457)

Freedom of Speech, Censorship, and the Supreme Court (AM ST/HIST 440)
Gender and Society (D SOC/FGSS 206)
Gender Inequality (FGSS/SOC 316)
Global Justice (GOVT 368/PHIL 347)
Global Thinking (GOVT 294/PHIL 194)
Government and Politics of Southeast Asia (GOVT 344)

Government and Public Policy: An Intro to Analysis and Criticism (GOVT 428)
Health Care Services: Consumer and Ethical Perspectives (PAM 552)

History of Ethics: Ancient and Medieval (PHIL 344)
History of Ethics: Modern (PHIL 345)

History of the U.S. Senate (HIST 403/ GOVT 400)

Human Genetics and Society (BIOGD 482)
Immigrants, Minorities, and Metropolitan Government (AM ST 423/GOVT/LSP 422)

Inequality, Diversity, and Justice (CRP/ GOVT/SOC 293/PHIL 193)
International Justice (PHIL 448)
International Labor Law (ILRCB 681)
International Law (GOVT 389)
Intro to Peace Studies (GOVT 393)
Introduction to American Government and Politics (GOVT 111)
Introduction to Policy Analysis (PAM 230
Introduction to the Bible I (JWST/NES/ RELST 223)

Introduction to the Blble II (NES/RELST 224)

Introduction to the New Testament (JWST 223/NES/RELST 229)

Introduction to the Qur'an (COM L/NES) JWST 256/RELST 213)

Islam in Theory and Practice (NES/RELST 259)

Islamic Law and Society (NES 357/RELST 356)

Israell Soclety (JWST/NES 395/SOC 390)
Kinship and Social Organizatlon (ANTHR 323)

Knowledge, Technology, and Property (S\&TS 411)

Labor and Employment Law (ILRCB 201)
Labor Market Analysis (ECON 341/ILR 440)

Latinos, Law, and Identity (AM ST 357/D SOC/LSP 355)

Law, Science, and Public Values (B\&SOC/ S\&TS 407)

Law, Science, and Sustainabillty (LAW 408)

Law, Society, and Culture in the Middle East, 1200-1500 (HIST 372/NES 351/ RELST 350)

Law, Society, and Morality (PHIL 342)
Liberty and Justice for All (ILRCB 488)
Limits on Protection of Creative Expression: Copyright Law (LAW 410)

Literature as Moral Inquiry (ENGL 402)
Literature of the Old Testament (COM L/ RELST 328)

Marriage and Sexuality in Medieval Europe (FGSS/RELST/HIST 368)
Memory and the Law (HD 319)
Modern European Politics (GOVT 332)
Modern European Society and Politics (GOVT/SOC 341)

Modern Political Philosophy (GOVT 362] PHIL 346)

New York State Government Affairs (PAM 392)

People, Values, and Natural Resources (NTRES 220)

Policing and Prisons in American Culture (AM ST 395/ENGL 397)
Politics and Culture in the 1960s (AM ST/ ENGL 268)

Politics and Culture (GOVT 363/SOC 248)
Politics and Policy: Theory, Research, and Practice (AM ST 501/GOVT 500/PAM 406)

Politics of Nations Within (GOVT 364)
Prisons (AM ST 315/GOVT 314)
Problems in Contemporary Society (SOC 207)

Psychology and Law (PSYCH 265)
Public Finance: Resource Allocation and Fiscal Policy (ECON 336)

Public Finance: The Microeconomics of Govt. (ECON 335)

Public Policy and African American Urban Community (AS\&RC 420)

Race in the Medieval Islamic World (HIST 472/NES 429/S HUM 428)

Race, Space, and Place (AAS/CRP 395)
Racial and Ethnic Politics (AM ST 313/ GOVT/LSP 319)

Radicals and Revolutionaries in Latin America (HIST 459)

Resources Management and Environmental Law (CRP 444/544/ NTRES 444)

Schooling and Society (SOC 357)
Science and Technology Policy (GOVT 400.9)

Sex Discrimination and the Law (ILRCB 608)

Sex, Power, and Politics (FGSS/GOVT 304)
Sexuality and the Law Seminar (FGSS 461/GOVT 462)
Social and Political Context for American Education (EDUC 271)

Social and Political Philosophy (PHIL 242)
Social Inequality (SOC 208)
Soclal Movements (AIS/D SOC 311)
Social Movements in American Politics (AM ST/GOVT 302)

Social Policy (PAM 473)
Social Policy (SOC 326)
Social Policy and Social Welfare (CRP 448/548)
Social Problems (D SOC 200)
Social Welfare as a Social Institution (PAM 383)

Terrorism and the Law (LAW 690)
The American Presidency (GOVT 316)

The Court, Crime, and the Constitution (HIST 202)

The Death Penalty (LAW 405)
The History of the Common Law in England and America (LAW 648)
The Nature, Functions, and Limits of Law (GOVT 313)

The Old English Laws (HIST 469/ENGL 419)

The Pollics of Environmental Protection in America (B\&SOC/S\&TS 427)

The Rabinor Seminar (AM ST 430.5/HIST 448/LSP 430.5)

The Right of Prevention (S HUM 423/GOVT 453)

The Sociology of Contemporary Culture (S\&TS 354/SOC 352)

The United States (AM ST/ANTHR/LSP 377)

Theories of Society (D SOC 301/SOC 375)
Third World Urbanization (CRP 474)
U.S. Congress (GOVT 318/AM ST 319)
U.S. Supreme Court (GOVT/AM ST 328)

Values in Law, Economics, and Industrial Relations (ILRCB 607)

Varieties of American Dissent, 1880-1990 (AM ST/HIST 324)

Women in American Society, Past and Present (AM ST/HIST/FGSS 273)

## LESBIAN, BISEXUAL, AND GAY STUDIES

S. Bem, B. Correll, J. Culler, I. DeVault,
J. Frank, J. E. Gainor, S. Haenni, E. Hanson, C. Howie, I. V. Hull, P. Hyams, M. Katzenstein, P. Liu, T. Loos, K. March, C. A. Martin, K. McCullough, T. Murray, M. B. Norton, J. Peraino, M. Raskolnikov, N. Salvato, R. Savin-Wiliiams, A. M. Smith, A. Villarejo, S. Warner, R. Weil

The field of Lesbian, Bisexual, \& Gay Studies is devoted to the interdisciplinary study of the social construction of sexuality. LBG Studies is founded on the premise that the social organization of sexuality is best studied from the perspectives offered by those positions that have been excluded from established cultural norms.
In addition to offering a graduate minor, the field of LBG Studies offers an undergraduate concentration, which is administered under the auspices of Feminist, Gender, \& Sexuality Studies (FGSS) and which consists of four courses from the list below. Although most of the courses in LBG studies (including those on men) generally fall under the aegis of FGSS and are hence crosslisted with it, not all of the courses in FGSS are sufficiently focused enough on the social construction of sexuality per se to be part of the LBG studies concentration. In order to qualify for the concentration, courses must devote a significant portion of their time to sexuality and to questioning the cultural and historical institution of exclusive heterosexuality. Students selecting their four courses from the

LBG studies subset must identify their concentration as either LBG studies or FGSS; they cannot double-count their credits and thereby use the same courses for both concentrations.
Students interested in the LBG studies concentration should contact the Lesbian, Bisexual, \& Gay Studies Office in 391 Uris Hall.

## Courses

ANTHR 200(1420) Cultural Diversity and Contemporary Issues
Fall. 3 credits. M. Fiskesjo.
For description, see ANTHR 200.

## ANTHR 321/621(3421/6421) Sex and

 Gender in Cross-Cultural Perspective (also FGSS 321/631[3210/6210])Fall. 4 credits. K. March.
For description, see ANTHR 321.

## ENGL 276(2760) Desire (also FGSS/

 COM L 276[2760], THETR 278[2780])Spring. 4 credits. Letter grades only,
E. Hanson.

For description, see ENGL 276.

## [ENGL 355(3550) Decadence (also COM

 L/FGS5 355[3550])4 credits. Next offered 2008-2009.
E. Hanson.]
[ENGL 478(4780) Intersections in Lesblan Fiction (also FGSS 477[4770], AM ST 468[4780])
4 credits. Next offered 2009-2010.
K. McCullough.]

ENGL 603(6030) The Question of Feminist and Queer Criticism in Premodern Studies (also FGSS 603[6030])
Spring. 4 credits. M. Raskolnikov.
For description, see ENGL 603.
ENGL 625(6250) Love, Loss, and Lament in the Renaissance (also FGSS 628[6280])
Fall. 4 credits. B. Correll.
For description, see ENGL 625.
ENGL 655(6550) Modernist Fiction and the Erotics of Style (also FGSS 655[6550])
Spring. 4 credits. E. Hanson.
For description, see ENGL 655.

## FGSS 201(2010) Introduction to

 Feminist, Gender, and Sexuality StudiesFall and spring. 4 credits. Staff.
For description, see FGSS 201.
FGSS 400(4000) Senior Seminar in Feminist, Gender, and Sexuality Studies
Fall. 4 credits. Staff.
For description, see FGSS 400.

## FREN 442/642(4420/6420) Sex in French (also FGSS 432/632[4320/6320])

Spring. 4 credits. C. Howie.
For description, see FREN 442.
[FREN 449/649[4490/6490) Mystics and Mystique (also FGSS 449[4490])
4 credits. Next offered 2009-2010.
C. Howie.]

GOVT 462(4625) Sexuality and the Law [also AM ST 460[4265], FGSS 461[4610])
Spring. 4 credits. A. M. Smith.
For description, see GOVT 462.
GOVT 762(7625) Sexuality and the Law (also FGSS 762[7620])
Spring. 4 credits. A. M. Smith
For description, see GOVT 762.
HD 384(3840) Gender and Sexual Minorities (also FGSS 385[3850])
Fall. 3 credits. K. Cohen.
For description, see HD 384.
[HIST 209|2090) Seminar in Early America (also AM ST/FGSS 209[2090])
4 credits. Next offered 2008-2009.
M. B. Norton.]

HIST 273(2730) Women in American Society, Past and Present (also FGSS 273[2730])
Fall. 4 credits. M. B. Norton.
For description, see HIST 273.
[HIST 368(3860) Marriage and Sexuality in Medieval Europe (also FGSS/ RELST 368[3680])
4 credits. Next offered 2008-2009.
P. Hyams.]

HIST 416(4160) Gender and Sex in Southeast Asia (also ASIAN 416[4416], FGSS 416[4160])
Fall. 4 credits. T. Loos.
For description, see HIST 416.

## [MUSIC 695(7311) Topics in Music:

 Gender, Sexuality, and Glam Rock (also FGSS 695[6950])Fall. 4 credits. Next offered 2009-2010. J. Peraino.]

THETR 420/620(4200/6200) Parody (also FGSS 427/637[4270/6370])
Spring. 4 credits. N. Salvato.
For description, see THETR 420.
THETR 605(6050) Camp, Kitsch and Trash (also FGSS 605[6050])
Fall. 4 credits. N. Salvato.
For description, see THETR 605.

## THETR 606(6060) Passionate Politics: Affect, Protest, Performance (also

 FGSS 604[6040])Fall. 4 credits. S. Warner
For description, see THETR 606.

## LINGUISTICS

http://ling.cornell.edu
J. Whitman, chair (209 Morrill Hall);
M. Diesing, director of graduate studies (fall). (211 Morrill Hall); W. Harbert, director of undergraduate studies ( 210 Morrill Hall); D. Abusch, J. Bowers, W. Browne, A. Cohn. S. Hertz, J. Legate, A. Miller, A. Nussbaum, M. Rooth, C. Rosen, M. Wagner, M. Weiss, director of graduate studies (spring) (218 Morrill Hall), D. Zec.
Linguistics, the systematic study of human language, lies at the crossroads of the humanities and the social sciences, and much of its appeal derives from the special combination of intuition and rigor that the analysis of language demands. The interests of the members of the Department of Linguistics
and linguistic colleagues in other departments span most of the major subfields of linguistics: phonetics and phonology, the study of speech sounds; syntax, the study of how words are combined; semantics, the study of meaning; historical linguistics, the study of language change over time; and sociolinguistics, the study of language's role in social and cultural interactions.
Studying linguistics is not a matter of studying many languages. Linguistics is a theoretical discipline with ties to such areas as cognitive psychology, philosophy, logic, computer science, and anthropology. Nonetheless, knowing particular languages (e.g., Spanish or Japanese) in some depth can enhance understanding of the general properties of human language. Not surprisingly, then, many students of linguistics owe their initial interest to a period of exposure to a foreign language, and those who come to linguistics by some other route find their knowledge about languages enriched and are often stimulated to embark on further foreign language study.
Students interested in learning more about linguistics and its relationship to other disciplines in the humanities and social sciences are encouraged to take LING 101, a general overview, which is a prerequisite for most other courses in the field, or one of the first-year writing seminars offered in linguistics (on topics such as metaphor and the science of language). LING 101 and other introductory courses fulfill the social science distribution requirement. Most 100 - and 200 -level courses have no prerequisites and cover various topics in linguistics (e.g., LING 170 Introduction to Cognitive Science; LING 285 Linguistic Theory and Poetic Structure) or focus on the linguistics of a particular geographic region or historical development of particular languages (e.g., LING 217 History of the English Language to 1300; LING 241 Yiddish Linguistics). Some of these courses also fulfill the breadth requirements.
Talks and discussions about linguistics are offered through the Undergraduate Linguistics Forum and the Linguistics Colloquium (sponsored by the department and the Cornell Linguistic Circle). These meetings are open to the university public and anyone wishing to learn more about linguistics is most welcome to attend.

## The Major

For questions regarding the linguistics major, contact Professor Wayne Harbert ( 210 Morrill Hall, 255-8441, weh2@cornell.edu).
The prerequisite for a major in linguistics is the completion of LING 101 and either LING $301,302,303$, or 304 . The major has its own language requirement, different from that of the College of Arts and Sciences, which should be completed as eariy as possible: majors must complete the equivalent of two semesters of college-level study of a language that is either non-European or non-IndoEuropean (language study undertaken to satisfy the college requirement can also count toward the major requirement if the language meets these conditions). With approval of the department's director of undergraduate studies, this requirement may be waived for students taking the cognitive studies concentration or a double major.
The other standard requirements for the linguistics major are as follows:

1. LING 301 Introduction to Phonetics, LING 302 Introduction to) Phonology, LING 303 Introduction to Syntax, and LING 304 Introduction to Semantics and Pragmatics (one of which will already have been taken as a prerequisite to the major).
2. LING 314 Historical Linguistics
3. Three additional courses in linguistics at the 300 or 400 level, of which two must be general linguistics.
4. A course at or beriond the 300 level in the structure of a language, or LING 300 Field Methods for Undergraduates or LING 400 Lánguage Typology

Some substitutions to these standard requirements are possible after consultation with your advisor and approval by the DUS

## Honors

Applications for honors should be made during the junior year or by the start of fall semester of the senior year. For further information, please contact the DUS.
'Candidates for admission must have a 3.0 (B) average overall and should have a 3.5 average in linguistics courses. In addition to the regular requirements of the major, the candidate for honors will complete an honors thesis and take a final oral exam in clefense of it. The thesis is usually written during the senior year but may be started in the second semester of the junior year when the student's program so warrants. The oral exam will be conducted by the honors committee, consisting of the thesis advisor and at least one other faculty member in linguistics. Members of other departments may serve as additional members if the topic makes this advisable. LING 493 and 494 may be taken in conjunction with thesis research and writing but are not required

## First-Year Writing Seminars

For descriptions, consult the John S. Knight brochure for times, in ructors, and descriptions

## Courses

LING 101(1101) Intrarlaction to Linguistics ( $\mathrm{KCM}-\mathrm{A}$ )
Fall or spring. alata each semester. Fall. A. Miller; spring. I Inqute.

Overview of the scrinc language especially its theore : maderpinnings, methods, and major fimings. Areas covered include: the relation triween sound and meaning in human languages, social variation in language, language change over time, universals of language, and the mental representation of linguistic knowledge Students are introduced to a wide variety of language phenomena, drawn not only from languages resembling English, but also from many that appear to be quite unlike English such as those native to the Americas, Africa, Asia, Australia, and the South Pacific

## [LING 109(1109) English Words: Histories and Mysteries \% (HA-AS)

Spring. 3 credits. Next offered 2008-2009 Staff.
Where do the words we use come from? This course examines the history and structure of the English vocabulary from its distant IndoEuropean roots to the latest in technical jargon and slang. Topics include formal and semantic change, taboo and euphemism, borrowing,
new words from old, "learned" English loans from Greek and Latin, slang, and society.]

## LING 111(1111) American Sign Language I

Summer only. 4 credits. T. Galloway. Students with no previous background in American Sign Language (ASL) are introduced to the nature of a signed language and develop expressive and receptive skills in ASL Basic grammar and vocabulary are covered, including explanations of the fundamental parts of a sign, proper use of fingerspelling, and the significance of nonmanual features. Instruction is supplemented with videotexts allowing students to begin to explore the visual literature of the Deaf community in the United States-stories, poems, and jokes that are unique to Deaf culture. Readings and class discussions acquaint students with the causes of deafness, the historical development of ASL and its linguistic status, and characteristics of deaf education both throughout history and in the present clay.

## LING 112(1112) American Sign

 Language IISummer only. 4 credits. Prerequisite: LING
111 or permission of instructor.
T. Galloway.

In this intermediate course, students continue to develop expressive and receptive fluency in ASL. Focus is on greater descriptive skill, developing intermediate-level narratives, and enhancing conversational ability. Advanced grammar and vocabulary is supplemented with further instruction in the linguistic structure of ASL. Readings, class discussions, and videotexts containing samples of the visual literature of the U.S. Deaf community continues students* investigation inno American Deaf history and the shaping of modern Deaf culture.

## LING 131-132(1131-1132) Elementary Sanskrit (also CLASS 191-192[13311332], SANSK 131-132[1131-1132])

For description, see SANSK 131-132.
LING 170(1170) Introduction to Cognitive Science (also COGST 101[1101], CS 170[1710], PHIL 191[1910], PSYCH 102[1200]) (KCM-AS)
For description, see COGST 101.
LING 215(2215) Psychology of Language (also COGST/PSYCH 215[2150]) (KCM-AS)
For description, see PSYCH 215 .
LING 217(2217) History of the English Language to 1300 (also ENGL 217[2170]) " (HA-AS)
Fall. 4 credits. W. Harbert.
Explores the developinent of the English language from its Indo-European beginnings through the period of Early Middle English. Topics include linguistic reconstruction, changes in sound, vocabulary and grammatical structure, external influences, and Old and Early Middle English language and literature. This course forms a sequence with LING 218 , but the two may be taken independently.

## LING 218(2218) History of the English

 Language since 1300 (HA-AS)Spring. 4 credits. W. Harbert
Traces English from Chaucer to the present, including the development of standard English and dialects, and the rise of English as a world language.
[LING 236(2236) Introduction to Gaelic
Spring. 3 credits. Next offered 2009-2010 W. Harbert.

Introduction to the Scottish Gaelic language with some discussion of its history, structure and current status.]

## LING 238[2238] Introduction to Welsh

Fall. 3 credits. W. Harbert.
Introduction to the Welsh language, with cliscussion of its history, structure, and current status, and a brief introduction to Welsh literature.

## [LING 241(2241) Yiddish Lingulstics (SBA-AS)

Fall. 3 credits. No previous knowledge of Yiddish required. Next offered 2008-2009. M. Diesing.

Yiddish language and culture, including structure and history of the Yiddish language, Yiddish in America, minority language issues, influence of Yiddish on present-day American English.]
[LING 244(2244) Language and Gender (also FGSS 244[2440]) (SBA-AS)
Spring. 4 credits. For nonmajors or majors. Next offered 2009-2010. S. McConnellGinet.
Explores connections between language (use) and gender/sex systems, addressing such questions as the following: How do sex and gender affect the ways we speak, the ways we interpret and evaluate speech? How do sociocultural differences in women's and men's roles affect their language use, their relation to language change? What is meant by sexist language? How does conversation structure the social worlds of women and men? Readings draw from work in linguistics, anthropology, philosophy, psychology,
literature, and general women's studies and feminist theory.]

## [LING 246/546(2246/5546) Minority

 Languages and Linguistics (SBA-AS)Fall. 4 credits. Graduate students register under LING 546. Next offered 2008-2009. W. Harbert.

Examines minority languages from linguistic, social, and political perspectives, including such issues as language death, language maintenance, bilingualism, language policy, and language rights.]
[LING 251-252(2251-2252) Intermediate Sanskrit (also CLASS 291-292[23512352], SANSK 251-252[2251-2252]) 앙
Satisfies Option 1. Next offered 2008-2009 For description, see SANSK 251-252.]
LING 270(2270) Truth and Interpretation (also COGST/PHIL 270[2700]) (KCM-AS)
Fall. 4. credits. B. Weatherson
For description, see PHIL 270.
LING 285/585(2285/5585) Linguistic Theory and Poetic Structure (also ENGL 296/585[2960/5850]) (LA-AS]
Fall. 4 credits. Graduate students register under LING 585. J. Bowers.
The aim of this course is to show how certain results of modern linguistics can usefully be applied to the analysis and interpretation of poetry.

## LING 300(3300) Field Methods for

 Undergraduates (KCM-AS)Spring. 4 credits. Prerequisite: students should normally have completed (or be concurrently enrolled in) LING 301, 302, 303, 304. W. Harbert.
A hands-on course in which students gain experience in eliciting linguistic data from a native speaker of an unfamiliar language organizing and analyzing those data and producing descriptions of the lexicon, phonetics, phonology, morphology, syntax, and texts in the language on the basis of them.

## LING 301(3301) Introduction to Phonetics (KCM-AS)

Fall. 4 credits. Prerequisite: LING 101 or permission of instructor. Y. Chen. Introduction to the study of the physical properties of human speech sounds, including production, acoustics, and perception of speech. Provides in-depth exposure to the breadth of sounds found across human languages. Students achieve a high level of skill in phonetic transcription and some practice in reading spectrograms. An introduction to speech synthesis and automatic speech recognition is also provided. A small course project to discover the phonemes of an unknown language is undertaken

## LING 302(3302) Introduction to Phonology (KCM-AS)

Spring. 4 credits. Prerequisite: LING 101 or
permission of instructor. D. Zec
Introduction to phonology, which studies the patterning of speech sounds in human language. Emphasis is on formal devices, such as rules and representations, that capture the internal organization of speech sounds as well as their grouping into larger units, syllables, and feet

## LING 303(3303) Introduction to Syntax (KCM-AS)

Fall. 4 credits. Prerequisite: LING 101 or permission of instructor. J. Legate Introduction to syntax, which studies how words are combined to form phrases and sentences. The course aims to give students the ability to address questions regarding the syntactic properties that are shared by natural languages (as well as those that distinguish them) in a precise and informed way. Topics include those that lie at the heart of theoretical syntax: phrase structure, transformations, grammatical relations, and anaphora. Emphasis throughout the course is placed on forming and testing hypotheses.

## LING 304(3304) Introduction to

 Semantics and Pragmatics (KCM-AS) Spring. 4 credits. Prerequisite: LING 303 or permission of instructor. D. Abusch. Examines the two major components of sentence meaning: (1) how sentences mean what they mean and (2) how they can be used to communicate more than what they (literally) mean. Investigates precise ways of describing the possible interpretations of a sentence and the relationship between meaning and syntactic structure. Topics include the representation of lexical meaning, the meaning of quantifier phrases and analyses of scope ambiguities, and classic puzzles of reference. Also examines possible applications of the theory to linguistically interesting legal cases (torts and criminal law) slips of the tongue, acquisition studies,language disorders, and connections with the philosophy of language.

## LING 308(3308) Readings in Celtic Languages

Fall or spring, depending on demand. 2 credits. Prerequisite: permission of instructor. S-U grades only. W. Harbert Reading/discussion groups in Welsh or Scottish Gaelic.

## LING 314(3314) Introduction to

 Historical Linguistics \# (HA-AS)Spring. 4 credits. Prerequisite: LING 301 or
permission of instructor. M. Weiss. Survey of the basic mechanisms of linguistic change, with examples from a variety of languages

## LING 315-316(3315-3316) Old Norse

315 , fall; 316 , spring. 4 credits each
semester. K. Jonatansdóttir.
Old Norse is a collective term for the earliest North Germanic literary languages: Old Icelandic, Old Norwegian, Old Danish, and Old Swedish. The richly documented Old Icelandic is the center of attention, and the purpose is twofold: the students gain knowledge of an ancient North Germanic language, important from a linguistic point of view, and gain access to the medieval Icelandic (and Scandinavian) literature. 315: The structure of Old Norse (Old Icelandic), phonology, and morphology, with reading of selections from the Prose-Edda, a 13th-century narrative based on the Eddaic poetry. 316: Extensive reading of Old Norse texts, among them selections from some of the major Icelandic family sagas: Njals saga, Grettis saga, and Egils saga, as well as the whole Hrafnkels saga.

LING 321-322(3321-3322) History of the Romance Languages (also ROM 5 321-322[3210-3220]) " (HA-AS)
321, fall; 322, spring. 4 credits each
semester. Prerequisites: for LING 321, LING
101 or equivalent and qualification in any Romance language; for LING 322, LING
321 or permission of instructor.
321 covers popular Latin speech, early documentary sources, Pan-Romance phonological changes, regional divergence, early external history, and non-Latin influences. 322 covers the shaping of Romance morphological systems, changes in the lexicon, medieval diglossia, and the emergence of Romance standards. 321 and 322 both include selected readings in the earliest Romance texts.

## LING 332(3332) Philosophy of Language (also PHIL 332[3320]) <br> For description, see PHIL 332

[LING 333(3333) Problems in Semantics (also COGST 333[3330]) (KCM-AS)
Spring. 4 credits. Prerequisite: logic or semantics course or permission of instructor. Next offered 2009-2010. Staff. Looks at problems in the semantic analysis of natural languages, critically examining work in linguistics and philosophy on particular topics of current interest. Topics for 2007 are presuppositions, events and argument structure, information structure, dynamic semantics.]

## [LING 347(3347) Topics in the History of

 English (HA-AS)Fall. 4 credits. Prerequisite: LING 217, 314, course in Old or Middle English, or permission of instrucior. Next offered 2009-2010. W. Harbert.
Treats specific topics in the linguistic history of the English language, selected on the basis of the particular interests of the students and the instructor.]

## LING 390|3390) Independent Study in

 LinguisticsFall or spring. 1-4 cr dits, variable.
Prerequisite: LING 101 and permission of instructor. Staff.
Independent study of limguistics topics not covered in regular curri ilum for undergrads.

## LING 400(4400) Language Typology (KCM-AS)

Spring, 4 credits. Prelequisite: LING 101. J. Whitman.

Studies a basic question of contemporary linguistics: in what ways do languages differ, and in what ways are they all alike? Efforts are made to formalize universals of syntax and to characterize the total repertory of constructions available to natural languages. Common morphological devices and their syntactic correlates are covered. Emphasis is on systems of case, agreement, and voice

## LING 401-402(4401-4402) Phonology I, II

 (KCM-AS)401 , fall; 402 , spring. 4 credits each semester. Prerequisites: for LING 401, LING 302 or equivalent; for LING 402, LING 401 or permission of instructor. Fall, D. Zec; spring, M. Wagner.
401 provides a basic introduction to phonological theory. The first half of the course focuses on basic principles of phonology, patterns of sounds, and their representations. In the sccond half, the nature of syllable structure and feature representations are explared. 402 provides further refinement of the issues investigated in 401, focusing in particul: r on metrical theory, lexical phonology, autos mental phonology, and prosodic morpholo.
LING 403-404(4403 Sin) Syntax I, II (KCM-AS)
403, fall; 404, spt redits each semester. Prerequ ir LING 403, LING 303; for LING 40 ㄴ114 103 or permission of instructor. Fall thoing; spring,
J. Legate.

403 is an advanced inmon to syntactic theory within the prins $, 1,=-$ and parameters/ minimalist framework-. Iupics include phrase structure, argument struc ure (unaccusative verbs, unergative verbs, double object constructions), principles of word order, and the binding theory. 404 is a continuation of 403, focusing on syntactic dependencies, including the theory of control, an examination of locality constraints on movement, covert versus overt movement, and the syntax of quantification. The purpose of the course is to develop the background needed for independent syntactic research.

## LING 405(4405) Sociólinguistics (CA-AS)

Fall. 4 credits. Prerequisite: LING 101 or another linguistics course or permission of
instructor. Y. Chen and J. Whitman. This course surveys some of the different issues, theories, concepts, and methods in sociolinguistics, the study of the interaction of language with society.

## [LING 409(4409) Structure of Itallan

 (KCM-AS)Spring. 4 credits. Prerequisites: LING 101 and qualification in any Romance language. Next offered 2009-2010. C. Rosen.]
[LINO 411(4411) History of the Japanese Language (also ASIAN 411[4411], JAPAN $410[4410])$ \# (HA-AS)
Fall. 4 credits. Prerequisite: reading knowledge of Japanese. Next offered 2009-2010. J. Whitman.
Overview of the history of the Japanese language followed by intensive examination of issues of interest to the participants. Students should have a reading knowledge of Japanese.]
[LING 412(4412) Linguistic Structure of Japanese (also ASIAN 412[4412]) (KCM-AS)
Spring. 4 credits. Prerequisites: JAPAN 102 or permission of instructor and LING 101.
Next offered 2009-2010. J. Whitman. Introduction to the linguistic study of Japanese, with an emphasis on morphology and syntax.]

## [LING 413(4413) Applied Linguistics and

 Second Language Learning (KCM-AS)Spring. 4 credits. Prerequisite: at least one course in applied linguistics, linguistics, psychology, anthropology, communication, cognitive studies, education, or literary analysis; or permission of instructor. Next offered 2008-2009. Staff.
An introduction to the field of applied
linguistics with focus on different domains of language research as they bear on second language learning.)

## [LINQ 416(4416) Structure of the Arabic Language [also NES $416[4206]$ ] (KCM-As)

Spring. 4 credits. Next offered 2009-2010. M. Younes.

For description, see NES 416.]
[LING $417(4417)$ History of the Russian Language (also RUSSA 401[4401]) (HA-AS)
Spring. 4 credits. Prerequisite: permission of instructor. Next offered 2008-2009. W. Browne.

Phonological, morphological, and syntactic developments from Old Russian to modern Russian.]

LING 419(4419) Phonotics I (KCM-AS)
Fall. 4 credits. Prerequisite: LING 301 or
permission of instructor. A. Miller.
Provides a basic introduction to the study of phonetics. Topics include anatomy and physiology of the speech production apparatus, transcription and production of some of the world's sounds, basic acoustics, computerized methods of speech analysis, acoustic characteristics of sounds, speech perception, speech synthesis, and stress and intonation.

## LINO 420(4420) Phonetics II (KCM-AS)

Spring. 4 credits. Prerequisite: LING 419. A. Miller.

Continuation of Phonetics I, providing a more detailed survey of some areas in acoustic and articulatory phonetics. Topics include feature theory, vocal tract acoustics, quantal theory, speaker normalization, theories of speech perception, coarticulation, theories of speech production, and prosody. In addition, a number of "hands-on" projects are part of the course.

LING 421 (4421) Semantics I (KCM-AS)
Fall. 4 credits. Prerequisite: LING 304. D. Abusch.

Introduces methods for theorizing about meaning within generative grammar. These techniques allow the creation of grammars that pair syntactic structures with meanings.
Students look at several empirical areas in detail, among them complementation (combining heads with their arguments), modification, conjunction, definite descriptions, relative clauses, traces, bound pronouns, and quantification. An introduction to logical and mathematical concepts used in linguistic semantics (e.g., set theory, functions and their types, and the lambda notation for naming linguistic meanings) is included in the course.
LING 422(4422) Semantics II (KCM-AS)
Spring 4 credits. Prerequisite: LING 421 or permission of instructor. M. Rooth. Uses the techniques introduced in Semantics I to analyze linguistic phenomena, including quantifier scope, ellipsis, and referential pronouns. Temporal and possible worlds semantics are introduced and used in the analysis of modality, tense, and belief sentences. The phenomena of presupposition, indefinite descriptions, and anaphora are analyzed in a dynamic compositional framework that formalizes the idea that sentence meaning effects a change in an information state.

LING 423(4423) Morphology (KCM-AS)
Fall. 4 credits. Prerequisite: LING 101 or permission of instructor. M. Wagner. Addresses the basic issues in the study of words and their structures. Provides an introduction to different types of morphological structures with examples from a wide range of languages. Special emphasis is given to current theoretical approaches to morphological theory and to computational models of morphology.

## LING 424(4424) Computational Linguistics (also COGST 424[4240], CS 324[3740]) (MOR)

Fall. 4 credits. Recommended: CS 114. M. Rooth.

Introduces methods for doing a language computationally, including parsing and representation of syntactic analyses; computational morphology; probabilistic grammars; feature constraint formalisms for syntax; treebank methodology.
[LING 425(4425) Pragmatics (KCM-AS]
Fall. 4 credits. Prerequisite: LING 304 or PHIL 231, or permission of instructor. Next offered 2008-2009. D. Abusch.
Introduction to aspects of linguistic meaning that have to do with context and with the use of language. Topics include context change semantics and pragmatics, presupposition and accommodation, conversational implicature, speech acts, and the pragmatics of definite descriptions and quantifiers.]
[LING 427(4427) Structure of Hungarian (also HUNGR 427[4427]) (KCM-AS) Fall. $4 \cdot$ credits. Prerequisite: LING 101. Next offered 2008-2009. W. Browne.]

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[LING 428/628(4428/6628) Connectionist Psycholinguistics (also COGST 428[4280], PSYCH 428/628[4280/6280]
Next offered 2008-2009.
For description, see PSYCH 428]
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[LING 430(4430) Structure of Korean (also ASIAN/KOREA 430[4430]) (KCM-AS)
Spring. 4 credits. Prerequisite: KOREA 102 or linguistics course. No previous knowledge of Korean required. Next offered 2009-2010. J. Whitman.
Intensive examination of the syntax and phonology of a non-Indo-European language with the objective of testing principles of current linguistic theory.]
LING 431(4431) Structure of an African Language (KCM-AS)
Spring. 4 credits. Prerequisite: LING 101 or permission of instructor. A. Miller.
Survey of the structure of Southern African Khoesan languages in light of current linguistic theory.

## [LING 432(4432) Middle Korean (also

 KRLIT 432[4432]) © \# (LA-AS)Spring. 4 credits. Offered alternate years Prerequisite: KOREA 202 or equivalent. Next offered 2009-2010. J. Whitman. Introduction to the premodern Korean language. Focuses on the earliest bangeul texts of the 15 th century, but also introduces materials written in Korean using Chinese characters before the 15 th century, including byangga. No previous background in linguistics is required, but students should have a command of written Korean of at least the third-year level.]
[LING 433(4433) The Lesser-Known
Romance Languages (also ROM Romance Languages (also ROM 5 433[4330]) (KCM-AS)
Spring. 4 credits. Prerequisites: LING 101 and qualification in any Romance language.
Next offered 2008-2009. C. Rosen.
Surveys several Romance languages/dialects, examining sound systems, grammars, and historical evolution from Latin. Readings represent both the modern languages and their earliest attested stages.]

## LING 436(4436) Language Development \{also COGST/HD 337[3370], PSYCH 436[4360]) (KCM-AS) <br> For description, see COGST 337.

## [LING 437(4437) Celtic Linguistic Structures (KCM-AS)

Spring. 4 credits. Prerequisite: LING 403
Next offered 2008-2009. W. Harbert.
Treats selected topics in the syntax and morphosyntax of the modern Celtic languages.]
[LING 441(4441) Introduction to Germanic Lingulstics (also GERST 441[4410]) (HA-AS)
Spring. 4 credits. Prerequisite: LING 101 or permission of instructor. Next offered 2008-2009. W. Harbert.
Survey of major issues in historical Germanic linguistics.]

## LING 443[4443]) Lingulstic Structure of

 Russian (also RUSSA 403[4403]) (KCM-AS)Fall. 4 credits. Prerequisites: reading
knowledge of Russian, W. Browne.
A synchronic analysis of the structure of modern Russian. This course deals primarily with phonology and its relation to morphology

LING 450(4500) Lab Course: Language Development [also COGST 450[4500], HD/PSYCH 437(4370])
Fall. 2 credits
For description, see COGST 450.
[LING 451(4451) Greek Comparative Grammar (also CLASS 421[4421]) (KCM-AS)
Next offered 2009-2010.
For description, see CLASS 421.]
LING 452(4452) Latin Comparative Grammar (also CLASS 42थ[4422]) (KCM-AS)
Fall. 4 credits. A. Nussbaum.
For description, see CLASS 422.
LING 453(4453) Structure of Latin (also LATIN 453[4453], ROM $\$ 454[4453]$ ) " (KCM-AS)
Fall. 4 credits. Prerequisite: a basic
knowledge of Latin forms and constructions or some previous work in Romance and/or general linguistics. A. Nussbaum.

An analysis of the phonology, morphology, and syntax of Latin from a synchronic point of view. The course is intended for a twofold audience-students of Latin interested in a linguist's-eye view of the facts and students of general and/or Romance linguistics interested in what Latin data might have to offer for historical and general linguistic purposes.

## [LINQ 455(4455) Greek Dlalects (also

 GREEK 425[4455]) (KCM-AS]Next offered 2009-2010.
For description, see GREEK 425.]
[LINQ 456|4456) Archaic Latin (also LATIN 426[4456]) (LA-AS)
Next offered 2008-2009.
For description, see LATIN 426.]
[LING 45714457) Homeric Philology (also GREEK 427[4457]) \# (LA-AS)
Next offered 2008-2009.
For description, see GREEK 427.]
[LINO 459(4459) Mycenaean Greek (also GREEK 429[4459]) (LA-AS)
Next offered 2009-2010.
For description, see GREEK 429.]
[LING 460(4460) Sanskrit Comparative Grammar (also CLASS 490[4490]) (KCM-AS)
Fall. 4 credits. Prerequisite: reasonable familiarity with classical Sanskrit morphology. Next offered 2008-2009. A. Nussbaum.

Survey of the historical phonology and morphology of Sanskrit in relation to the Indo-Iranian and Indo-European comparative evidence.]

## LING 461(4461) Introduction to IndoEuropean Lingulstics (HA-AS)

Fall. 4 credits. M. Weiss.
An introduction to the phonology,
morphology, and syntax of Proto-Indo-
European and the chief historical
developments of the daughter languages.
[LING 474(4474) Introduction to Natural Language Processing (also COGST/ CS 474[4740])
Next offered 2008-2009.
For description, see CS 474.]

## LING 493(4493) Honors Thesls Research

Fall. 4 credits. Staff.
May be taken before or after LING 494, or may be taken independently.
LING 494(4494) Honors Thesis Research
Spring. 4 credits. Staff.
May be taken as a continuation of, or before, LING 493.
[LING 530(5530) Representation of Structure in Vision and Language (also COGST/PSYCH 530[6300])
Next offered 2008-2009.
For description, see PSYCH 530.]

## LING 600(6600) Field Methods

Spring. 4 credits. Prerequisites: LING 401
and 403 or permission of instructor.
J. Bowers and M. Wagner.

Elicitation, recording, and analysis of data from a native speaker of a non-Western language not generally known to students.

## [LING 601(6601) Topics in Phonological Theory

Spring. 4 credits, variable. Prerequisites:
LING 401 and one higher-level phonology course. Next offered 2008-2009. Staff. Selected topics in current phonological theory.]
[LINO 602(6602) Topics in Morphology
Fall. 4 credits. Prerequisites: LING 401 or 403 or permission of instructor. Next offered 2008-2009. Staff.
Selected topics in current morphological theory.]

## LING 604(6604) Research Workshop

Fall. 2 credits. Requirement for third-year linguistics graduate students. S-U grades only. M. Diesing.
Provides a forum for presentation and discussion of ongoing research, and development of professional skills. Participants must enroll in a concurrent independent study with a special committee member, or a relevant workshop.

## [LING 606(6606] Historical Syntan

Fall. 4 credits. Prerequisite: LING 403. Next offered 2009-2010. J. Whitman.]
[LING 609(6609) SLA and the Asian Languages (also ASIAN 610[6610])
Next offered 2008-2009.]

## LING 615(6615) Topics in Semantics

Fall. 4 credits. Prerequisite: LING 421 or permission of instructor. D. Abusch.
Selected topics in semantic theory, focusing on recent literature.

## [LING 616(6616] Topics in Syntactic

 TheoryFall. 4 credits, variable. Prerequisite: LING 404 or permission of instructor. Next offered 2008-2009.
Examination of recent developments in syntactic theory, including "minimalist" approaches to phrase structure, derivations, representations and the nature of economy conditions, and parametric differences.]

## [LING 617-618(6617-6618) Hittite

617, fall; 618, spring. 4 credits each semester. Prerequisites: for LING 617, permission of instructor; for LING 618,
LING 617 or permission of instructor. Next offered 2008-2009. M. Weiss.
Introduction to the cuneiform writing system and the grammar of Hittite, followed by the reading of selected texts.]

## [LING 619(6619) Rlgveda

Fall. 4 credits. Prerequisite: permission of instructor. Next offered 2008-2009. Staff.]

## [LING 621(6621) Avestan and Old

 PersianFall. 4 credits. Prerequisite: basic knowledge of Sanskrit forms and morphology syntax. Next offered 20082009. M. Weiss.

Linguistically oriented readings of Old Persian and Avestan.]
[LING 623-624(6623-6824) Old Irish I, il 623, fall; 624, spring. 4 credits each semester. Prerequisite: for LING 624, LING 623 or permission of instructor. Next offered 2009-2010. M. Weiss.]

## [LING 625(6625] Middle Welsh

Spring. 4 credits. Prerequisite: permission of instructor. Next offered 2008-2009. W. Harbert.

Students develop a reading knowledge of Middle Welsh through translating selections from prose and poetry. No familiarity with Welsh is assumed.]

## LING 633(6633) Language Acquisition Seminar (also COGST/ND 633[6330])

 Fall. 1-4 credits. Prerequisite: LING 436 or equivalent or permission of instructor. B. Lust.This seminar reviews and critiques current theoretical and experimental studies of first language acquisition, with a concentration on insights gained by cross-linguistic study of this area. Attention is also given to the development of research proposals.

## [LING 635-636(6635-6636) Indo- <br> \section*{European Workshop}

635, fall; 636, spring. 4 credits each semester. Prerequisite: permission of instructor. Next offered 2008-2009. M. Weiss.

An assortment of subjects intended for students with previous training in IndoEuropean linguistics.I

## [LING 637(6637] Introduction to

 TocharianFall. 4 credits. Prerequisite: knowledge of other ancient IE language and historical linguistics methods. Next offered 20082009. M. Weiss.

Introduction to the grammar of Tocharian A and B.]

## [LING 645(6645) Cothic

Fall. 4 credits. Prerequisite: LING 101. Offered every three years; next offered 2009-2010. W. Harbert.
Linguistic structure of Gothic, with extensive readings of Gothic texts.]
[LING 646(6848) Old Migh German, Old Saxon (also OERST 658[6580])
Spring. 4 credits. Prerequisite: LING 101.
Highly recommended: reading knowledge of Modern German. Offered every three years; next offered 2009-2010. W. Harbert. Combines a survey of the linguistic history and structure of Old High German and Old Saxon with extensive readings from the major documents in which they are recorded.]

## [LING 648(6648) Speech Synthesis (also INFO 648[6648])

Spring. 4 credits. Prerequisite: LING 401, 419 , or permission of instructor. Offered alternate years; next offered 2008-2009. S. Hertz.

Investigates the nature of the acoustic
structure of speech synthesis, using speech as a tool for exploring this structure. A particular acoustic model is proposed, developed, and
motivated by considering the relationship between phonological and acoustic structure, speech timing, phonetic universals, coarticulation, and speech perception. The primary tool for investigation is the Delta System, a powerful software system for investigating phonology and phonetics through speech synthesis. The course is meant for graduate students and advanced undergraduate students in linguistics, but may also be of interest to students in psychology/ psycholinguistics, computer science, and cognitive studies.]

## LINQ 649/6649) Structure of Old English

Fall. 4 credits. Prerequisite: LING 441.
Offered every three years. W. Harbert. Linguistic overview of Old English, with emphasis on phonology, morphology, and syntax.

## LING 659(8659) Seminar In Vedic Philology (also ASIAN 659[6659], CLASS 659[7459])

Fall. 4 credits. Prerequisite: two years of Sanskrit or permission of instructor. M. Weiss.

A seminar for intensive reading of Vedic texts, primarily the Rig Veda. Attention will be given to the study of Vedic ritual and mythology, and to the later commentarial and performance traditions. Students will be familiarized with the various methods, primarily philological, necessary for the competent reading of Vedic texts.

## LING 681(6661) Old Church Slavonic (also RUSSA 601[6601])

Fall. 4 credits. Prerequisite: knowledge of Slavic or ancient Indo-European language. Prerequisite to LING 662 and 671. W. Browne.

Grammar and reading of basic texts.

## LING 662(6662) Old Russlan Texts (also RUSSA 602[6602])

Spring. 4 credits. Prerequisite: LING 661. W. Browne.

Grammatical analysis and close reading of Old Russian texts.

## LINQ 671(6674) Comparative Slavic

 Linguistics (also RUSSA 651[6651])Fall. 4 credits. Prerequisites: LING 661
taken previously or simultaneously, or permission of instructor. Offered alternate years. W. Browne.
Sounds and forms of the Slavic languages and of prehistoric common Slavic; main historical developments leading to the modern languages.

## LING 700(7700) Seminar

Fall or spring. Credit TBA
Seminars are offered according to faculty interest and student demand. Topics for 20062007 include: semantics; computational linguistics; language acquisition; and the nature of the interfaces between phonetics, phonology, and syntax.

## LING 701-702(7701-7702) Directed Research

701, fall; 702, spring. $1-4$ credits. Times TBA. Staff.

## MATHEMATICS

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D. Barbasch, chair; A. Back, Y. Berest, L. Billera, D. Bock, K. Brown, X. Cao, R. Connelly, R. K. Dennis, R. Durrett, E. Dynkin, L. Gross, J. Guckenheimer, A. Hatcher (DUS), D. Henderson, T. Holm, J. Hubbard, J. Hwang, Y. Ilyalshenko, P. Kahn, M. Kassabov, B. Khoussainov, G. Lawler, S. Lim, A. Lozano-Robledo, G. Michler, J. Moore, C. Muscalu, A. Nerode, E. Nevo, M. Nussbaum, I. Peeva, R. Ramakrishna, E. Rassart, T. Riley, L. Saloff-Coste, A. Schatz, S. Sen, R. A. Shore, R. Sjamaar, J. Smillie, B. Speh, M. E. Stillman (DGS), R. Strichartz, E. Swartz, M. Terrell, R. Terrell, A. Thomas, W. Thurston, R. Vale, A. Vladimirsky, K. Vogtmann, L. Wahlbin, J. West. Emeritus: J. Bramble, S. Chase, M. Cohen, C. Earle, R. Farrell, H. Kesten, G. R. Livesay, M. Morley, L. E. Payne, A. Rosenberg, M. Sweedler.

Mathematics is the language of modern science; basic training in the discipline is essential for those who want to understand, as well as for those who want to take part in, the important scientific developments of our time. Acquaintance with mathematics is also extremely useful for students in the social sciences and valuable for anyone interested in the full range of human culture and the ways of knowing the universe in which we live.
The Department of Mathematics faculty has strong groups specializing in algebra, number theory, combinatorics, real and complex analysis, Lie groups, topology and geometry, logic, probability and statistics, mathematical physics, and applied mathematics. Related departments at Cornell have specialists in computer science, operations research, linear programming, and game theory, and courses in these topics can be integrated readily into the mathematics major.
The deparment offers a rich variety of undergraduate courses, and many of its beginning graduate courses are suitable for advanced undergraduates as well. Under some conditions, a student may carry out an independent reading and research project for college credit under the supervision of a faculty member.
Members of the department are available to discuss with students the appropriate course for their levels of ability and interest, and students are urged to avail themselves of this help.
Students who want to take any of the courses numbered 300 or above are invited to confer, before registering, with the instructor concerned. The level of a course is indicated by the first digit of the course number: roughly, 1,2 , indicate underclass courses; 3, 4, upperclass courses; 5, professional level and mathematics education courses; 6,7 , graduate courses. The subject matter of courses is often indicated by the second digit: 0 , general; 1,2 , analysis; 3, 4, algebra and combinatorics; 5, 6, topology and geometry; 7, probability and statistics; 8 , logic; 9, other.
Midterm grades, when required, will be $S$ or $U$ only, except in special circumstances. In courses with numbers below 700, students will receive letter grades, with the exception of nonmathematics majors who have requested an S-U grade.

## Advanced Placement

Secondary school students are strongly urged to take one of the two advanced placement exams of the College Entrance Examination Board in their senior year. Freshmen who have had some calculus but who have not taken an advanced placement exam should take the placement exam in mathematics offered at Cornell just before the beginning of classes in the fall. Anyone with any knowledge of calculus should carefully read "Advanced Placement," p. 7.

## The Major

The mathematics major adapts to a number of purposes. It can emphasize the theoretical or the applied. It can be appropriate for professionals and nonprofessionals alike, and can be broad or narrow. It can also be combined easily with serious study in another subject in the physical, biological, or social sciences by means of a double major and/or concentration. For example, a double major in mathematics and computer science is facilitated by the concentration in computer science (requirement 4, option b) described below. This concentration permits a student to use certain computer science courses to satisfy the requirements of both majors. Questions concerning the major should be brought to a member of the Mathematics Major Committee.

## Prerequisites

Students are admitted to the major after successfully completing a semester of multivariable calculus and a semester of linear algebra. The department recommends students take either MATH 221-222 or 223-224. Normally students will be admitted to the major only when they have grades of B - or better in all 200-level mathematics courses taken. Alternative prerequisites for admission to the major are MATH 192 and 294 with grades of B- or better or MATH 213 and 231 with grades of $\mathrm{B}+$ or better. A grade of C - or better in CS 100 is also required for admission to the major for students graduating in 2010 or later.

## Requirements

Students must complete nine courses to fulfill the following three requirements for the mathematics major. (Students graduating in 2009 or earlier must also complete CS 100 with a grade of C - or better as part of the requirements for the major rather than as a prerequisite for the major.) A course may be counted toward the major only if it is taken for a letter grade, and a grade of C - or better is received for the course. Major advisors can alter these requirements upon request from an advisee, provided the intent of the requirements is met. In particular, many suitable graduate courses are not listed here. No course may be used to satisfy more than one requirement for the math major.

1. Two courses in algebra.* Eligible courses are
MATH 431 or 433
MATH 432 or 434
MATH 437
MATH 332 or 336
2. Two courses in analysis. Eligible courses are MATH 311, 321, 323, 413, 414, 418, 420, 422, 424, 425 (also CS 421), 426 (also CS 422), 428.
3. Five further high-level mathematical courses. Two-credit courses count as half courses. 500-level MATH courses will not normally count toward the major. In rare cases, exceptions are made. Students should consult their advisors. The seven alternatives ( $\mathrm{a}-\mathrm{g}$ ) below do not exhaust the possibilities. A mathematics major interested in a concentration in a subject different from those below may develop a suitable individual program in consultation with his or her major advisor.

## a. Concentration in Mathematics:

i. Four additional MATH courses numbered 300 or above.
ii. One course dealing with mathematical models. Any course from outside mathematics with serious mathematical content and dealing with scientific matters. Serious mathematical content includes, but is not limited to, extensive use of calculus or linear algebra. Any course from another department that would satisfy one of the other concentrations may be used. In addition, CS 211, MATH 335*/CS 480, MATH/BIOEE 362, MATH 384/PHIL 330, MATH 425/CS 421, MATH 481/PHIL 431, MATH 482/PHIL 432, MATH 483/ PHIL 436, MATH/CS 486, PHYS $116,208,213$, or 217 may be used Other 100 -level physics courses, PHYS 207, and PHYS 209 may not be used. Some courses in biology, chemistry, and other fields may be used.

## b. Concentration in Computer

Science: Five additional courses from (iii) and (iv) below, of which at least one is from (iii) and three are from (iv).
iii. Mathematics courses numbered 300 or above
iv. Computer science courses with significant mathematical content. Eligible courses are: CS 305, 321, 322, 381, 400, 411, 421 (also MATH 425), 422 (also MATH 426), $426,428,465,467,472,474,475$, $478,480,482,483,485,486$, and 487. Students graduating in May 2009 or earlier may also use CS 427, $468,481$.
c. Concentration in Economics: Five additional courses from (v), (vi), and (vii) below, as follows: one course from (v), three courses from (vi), and a fifth course from any of (v), (vi), or (vii).
v. Mathematics courses numbered 300 or above.
vi. Economics courses with significant mathematical content. Eligible courses are ECON 319*/619, 320/620, 325, 327, 368 (formerly 467), 416, 419, 476/676, 477/677,
$609,610,613,614,717,718,748$, 749, 756. Only two of the econometrics courses ( $320 / 620$, $325,327,748,749$ ) are allowed. Students graduating in May 2009 or earlier may also use ECON/ AEM 450.
vii. Courses in operations research with significant mathematical content and dealing with material of interest in economics. Eligible courses are OR\&IE 320, 321, 432, 435, 474, and 476.
d. Concentration in Mathematical

Biology: Five additional courses from (viii) and (ix) below, with three courses from (viii) and two courses from (ix).
viii. Biology courses that have mathematical content or provide background necessary for work at the interface between biology and mathematics. Eligible courses are BIOBM/CS 321, BIOEE/MATH 362, BIOEE 460, BIONB 422, BTRY 382, 408*, 409*, 482, 483, 484, EAS 359. Students graduating in May 2009 or earlier may also use BIOGD 481, 484, 487, BIONB 330.
ix. Mathematics courses numbered above 300 . Particularly appropriate are MATH 420 and $471^{*}$.
e. Concentration in Mathematical

Physics: Five additional courses from ( $x$ ) and (xi) below, of which at least one is from ( $x$ ) and three are from (xi).
x. Mathematics courses in analysis, geometry, algebra and combinatorics, probability and statistics, and mathematical logic. Eligible courses are MATH 311, $321,323,401,413,414,420,418$ or 422, 424, 425 (also CS 421), 426 (also CS 422), 428, 431 or 433, 432 or $434,437,441,442,450,451$, 452, 453, 454, 455, 471*, 472*, 481, 482, 483, 486.
xi. Physics courses that make significant use of advanced mathematics. Eligible courses are PHYS 314, 316, 318, 323, 327, 341, $443,444,445,451,454,455,457$, 480, 481. Students graduating in May 2009 or earlier may also use PHYS 317, 456.
f. Concentration in Operations

Research: Five additional courses
from (xii) and (xiii) below, of which at least one is from (xii) and three are from (xiii).
xii. Mathematics courses numbered 300 or above
xiii. Courses in operations research in which the primary focus involves mathematical techniques. Eligible courses are OR\&IE 320, 321, 360, 361, 431, 432, 434, 435, 436, 451, $462,464,473,483,573$.
g. Concentration in Statistics: Five additional courses from (xiv), (xv),

See the list of courses with overlapping content at the end of the introduction.
and (xvi) below, which include both from (xv) and at least two from (xvi). MATH 171 is recommended as an additional course, not counting toward the requirements. It should be taken, or audited, before or simultaneously with MATH 471.
xiv. Mathematics courses numbered 300 or above.
xv. MATH 471* and 472*
xvi. Courses in other departments with significant content in probability and statistics, complementing (xiv). Eligible courses are BTRY 302, 482, 602, 603, 604; OR\&IE 361, $462,464,468,469,473,474$, and 476 (counted as half a course here); ILRST 312, 410, and 411; and ECON 320.

## Senior Thesis

A senior thesis can form a valuable part of a student's experience in the mathematics major. It is intended to allow students to conduct an in-depth investigation not possible in regular course work. The work should be independent and creative. It can involve the solution of a serious mathematics problem, or it can be an expository work, or variants of these. Both the process of doing independent research and mathematics exposition, as well as the finished written product and optional oral presentation, can have a lasting positive impact on a student's educational and professional future.

## Double Majors

The Departments of Computer Science, Economics, and Physics all permit double majors with the mathematics major, allowing the courses listed under the corresponding concentrations above to be counted for both majors. Students should consult the appropriate departments for any further conditions.

## Honors

The Department of Mathematics awards honors (cum laude) and high honors (magna cum laude and summa cum laude) to graduating mathematics majors who have demonstrated outstanding ability in the major program.
The awards are determined by the Mathematics Major Committee in the latter part of the semester before graduation. The committee will primarily be looking for excellent performance in mathematics courses, particularly in challenging courses at the 400 level or beyond. Participation in the honors seminar (MATH 401) for one semester, or independent study at a high performance level can also contribute to honors. Students interested in any level of honors should consult their major advisors or a member of the Mathematics Major Committee concerning suitable courses. Outstanding performance in graduate classes or an excellent senior thesis can contribute to high honors.

## Teacher Education in Mathematics

For information on the various possibilities for students considering teaching mathematics in

[^1]schools, go to www.math.cornell.edu/ Undergraduate/Teaching.

## Studying Mathematics Outside the Major

The College of Arts and Sciences and the Department of Mathematics offer no minor or concentration in mathematics for students who are not math majors. However, some other scientific departments in the college offer, within their own majors, concentrations in mathematics and mathematics-related fields. A student interested in such a concentration should consult the director of undergraduate studies of his or her major department
The College of Engineering offers a minor in applied mathematics that is open to any undergraduate in that college. The minor is sponsored jointly by the Department of Mathematics and the Department of Theoretical and Applied Mechanics, and is administered by the latter department. Engineering students interested in this minor should contact Professor Richard Rand of the Department of Theoretical and Applied Mechanics (255-7145; rhr2@cornell.edu)

The Department of Mathematics welcomes into its upper-level courses students from all colleges, schools, and departments at Cornell. In particular, undergraduates who wish to pursue serious study of mathematics, whether within or to complement their own major fields, are encouraged to consult with the department. The department's director of undergraduate studies and other faculty can provide assistance in selecting appropriate areas of study and individual courses.

## Distribution Requirement

The mathematics courses that can be used to satisfy the Mathematics and Quantitative Reasoning part of the Arts College distribution requirements are indicated by the symbol "(MQR)".

## Basic Sequences

## Precalculus

Description
Courses

1. Algebra and trigonometry to prepare students for calculus

MATH 109* or EDUC 005*
2. Algebra, analytic geometry, elements of calculus

EDUC $115^{*}$, MATH 100*
*MATH 100, MATH 109, EDUC 005, and EDUC 115 do not carry credit for graduation in the Arts College

Students who want a semester of calculus after EDUC 115 or MATH 100 may take MATH 106 or 111. Noncalculus alternatives are MATH 105 or 171.

## Calculus

Description

1. Standard three-semester
sequence for students who do not expect to take advanced courses in mathematics
2. Calculus for engineers (also taken by some physical science majors)

Mathematics Courses

111-112-213

191-192-293-294
3. Several sequences are possible for prospective mathematics majors and others who expect to take advanced courses in mathematics: 111-112-221-222, 111-122-221-222, 111-122-223-224 or some 'mix of these courses. Students may also take the engineering sequence 191-192-293-294. Students are encouraged to consult with their advisors.

MATH 191 may be substituted for 112. The two-year sequences include some linear algebra. Students who take the three-semester sequence 111-112-213 may learn some linear algebra by taking MATH 231

## Special-Purpose Sequences

## Description

1. Finite mathematics and calculus for life and social science majors
2. Other possible finite mathematics and calculus sequence
3. Calculus and statistics 106-171 sequences

111-171
Students who want to take two semesters of calculus are advised to take the first two semesters of one of the three calculus sequences. Students with excellent performance in MATH 106 may follow that course with MATH 112 or 122 . The courses in each of the calculus and statistics sequences may be taken in either order, since no calculus background is required for MATH 171. Each of the sequences listed here satisfies the mathematics requirement for most medical schools.

Switching between calculus sequences is often difficult, especially at the 200 level. Students should not attempt such a switch without consulting the director of undergraduale studies.

## Courses with Overlapping Content

Because the department offers many courses with overlapping content, students must choose their courses carefully to ensure that they will receive credit for each course they take. Listed below are groups of courses that have similar content. Students will receive credit for only one of the courses in each group.
MATH 106, 111
MATH 112, 122, 191
MATH 192, 213, 222, 224
MATH 221, 223, 231, 294
MATH 332, 335, 336*
MATH 431 and 433
MATH 432 and 434
MATH 471, ECON 319, BTRY 408,
MATH 472, ECON 319, BTRY 409
*Credit for both MATH 332 and MATH 336 will be granted only if both were taken during or before spring 2002 .
Note: Courses with overlapping content are not necessarily equivalent courses. Students are encouraged to consult a mathematics faculty member when choosing between them

## Fees

In some courses there may be a small fee for photocopying materials to be handed out to students.

## Summer Courses

A list of mathematics courses usually offered every summer can be found in the School of Continuing Education and Summer Sessions section of this catalog. Students interested in taking summer courses in mathematics should consult the Department of Mathematics web site (www.math.cornell.edu). A tentative summer listing may be available as early as October.

## Undergraduate Course Offerings

Please visit www.math.cornell.edu for further information and up-to-the-minute corrections.

Foundation courses: 105, 106, 111, 112, 122,
191, 192, 213, 221, 222, 223, 224, 231, 293, 294
Mathematics Education: 408, 451
History of Mathematics: 403
General and Liberal Arts Courses: 103, 134, $135,171,304,401,408$

Analysis: 311, 321, 413, 414, 418
Algèbra and Number Theory: 332, 336, 431, 432, 433, 434, 437
Combinatorics: 441, 442, 455
Geometry and Topology: 356, 450, 451, 452, 453, 454
Probability and Statistics: 171, 275, 471, 472
Mathematical Logic: 281, 384, 481, 482, 486
Applied Analysis and Differential Equations: 323, 362, 420, 422, 424, 425, 426, 428

MATH 005(0005) Academic Support for MATH 105
Fall. 1 transcript credit only; cannot be used toward graduation.
Reviews material presented in MATH 105 lectures, provides problem-solving techniques and tips as well as prelim review. Provides further instruction for students who need reinforcement. Not a substitute for MATH 105 lectures or recitations.

## MATH 006(0006) Academic Support for

 MATH 106Spring. 1 transcript credit only; cannot be used toward graduation.
Reviews material presented in MATH 106 lectures, provides problem-solving techniques and tips as well as prelim review. Provides further instruction for students who need reinforcement. Not a substitute for MATH 106 lectures or recitations.

## MATH 011(0011) Academic Support for

 MATH 111Fall, spring. 1 transcript credit only; cannot be used toward graduation.
Reviews material presented in MATH 111 lectures, provides problem-solving techniques and tips as well as prelim review. Provides further instruction for students who need reinforcement. Not a substitute for MATH 111 lectures or recitations.

## MATH 012(0012) Academic Support for

 MATH 112Fall, spring. 1 transcript credit only; cannot be used toward graduation.
Reviews material presented in MATH 112 lectures, provides problem-solving techniques and tips as well as prelim review. Provides further instruction for students who need reinforcement. Not a substitute for MATH 112 lectures or recitations.

MATH 100(1000) Calculus Preparation
Fall, spring. 2 transcript credits only: cannot be used toward graduation. Introduces a wide variety of topics of algelora and trigonometry that have applications in various disciplines. Emphasis is on the development of linear, polynomial, rationat. trigonometric, exponential, and logarithmic functions. Students will have a better understanding of the behavior of these functions in their application to calculus because of the strong emphasis on graphing. Application of these mathematical ideas is addressed in problem-solving activities.

## MATH 103(1103) Mathematical Explorations (MOR)

Fall, spring, summer. 3 credits. For students who wish to experience how mathematical ideas naturally evolve. The homework consists of the students actively investigating mathematical ideas. The course emphasizes ideas and imagination as opposed to techniques and calculations. Topics vary depending on the instructor and are announced (www.math.cornell.edw) several weeks before the semester begins. Some assessment is done through writing assignments.

## MATH 105(1105) Finite Mathematics for

 the Life and Social Sciences (MaR)Fall. 3 credits. Prerequisite: three years
high school mathematics, including
trigonometry and logarithms.
Introduction to linear algebra, probability, and Markow chains that develops the parts of the theory most relevant for applications. Specific topics include equations of lines, the method of least squares, solutions of linear systems. matrices; basic concepts of probability, permutations, combinations, binomial distribution, mean and variance, and the normal approximation to the binomial distribution. Examples from biology and the social sciences are used.

## MATH 106(1106) Calculus for the Life and Social Sciences (MQR)*

Spring. 3 credits. Prerequisite: readiness for calculus, such as can be obtained from three years of high school mathematics (including trigonometry and logarithms) or from MATH 100, MATH 109, or ElOU TC 115. For students planning to take MATH 112. MATH 111 is recommended rather than 106.

Introduction to differential and integral calculus, partial derivatives, elementary differential equations. Examples from Jiology and the social sciences are used.

## MATH 109(1109) Precalculus

 MathematicsSummer. 3 transcript credits only; cannot be used toward graduation.
Designed to prepare students for MATH 111. Reviews algebra, trigonometry, logarithms, and exponentials.

## MATH 111(1110) Calculus I (MOR)*

Fall, spring, summer. 4 credits. Prerequisite: MATH 109 or three years of high school mathematics, including trigonometry and logarithms.
Topics include functions and graphs, limits and continuity, differentiation and integration of algebraic, trigonometric, inverse trig, logarithmic, and exponential functions;
*See the list of courses with overlapping content at the end of the introduction.
applications of differentiation, including graphing. max-min problems, tangent line approximation. implicit differentiation, and applications to the sciences; the mean value theorem: and antiderivatives, definite and indefinite integrals, the fundamental theorem of calculus, substitution in integration, the area under a curve. Graphing calculators are used, and their pitfalls are cliscussed, as applicable to the above topics. MATE 111 can serve as a one-semester introduction to calculus or as part of a two-semester sequence in which it is followed by MATH 112 or 122.

## MATH 112(1120) Calculus II (MQR)*

Fall. spring. 4 creclits. Prerequisite: MATH 111 with grade of $C$ or better or excellent performance in MATH 106. Those who do well in MATH 111 and expect to major in mathematics or strongly mathematicsrelated field shoulcl take 122 instead of 112.

Focuses on integration: applications, including volumes and arc length; techniques of integration, approximate integration with error estimates, improper integrals, differential equations (separation of variables, initial conditions, systems, some applications). Also covers infinite sequences and series: definition and tests for convergence, power series, laylor series with remainder, and parametric equations.

## MATH 122(1220) Honors Calculus II (MQR)*

Fall. 4 credits. Prereguisite: one semester of calculus with high performance or permission of department. Students planning to continue with MATH 213 are advised to take 112 instead of this course. Takes a more theoretical approach to calculus than MATH 112 Topics include differentiation and integration of elementary transcendental functions, techniques of integration, applications, polar ctordinates, infinite series, and complex numbers, as well as an introduction to proving theorems.

## MATH 134(1340) Mathematics and

 Politics (MQR)Fall. spring. 4 credits.
We apply mathematical reasoning to some problems arising in the social sciences. We discuss game theory and its applications to political and historical conflicts. Power indices are introduced and used to analyze some political institutions. The problem of finding a fair election procedure to choose among three or more alternatives is analyzed.

## MATH 135(1350) The Art of Secret Writing (MQR)

Fall, spring, summer. 3 credits. Prerequisite: three years high school mathematics. Examines classical and modern methods of message encryption, decryption. and crypteanalysis. Mathematical tools are developed to describe these methods (modular arithmetic, probability, marrix arithmetic, number theory), and some of the fascinating history of the methods and people involved is presented.

## MATH 160(1600) Totally Awesome Mathematics

Spring. 2 credits. Prerequisite: one semester calculus. (AP credit is sufficient.)
Mathematics is a broad and varied field that extends far beyond calculus and the high

Sice the list of courses with overlapping content at the end of the introduction.
school curriculum. This course will introduce exciting mathematical topics to stretch your imagination and give you a feel for the great variety of problems that mathematicians study. Each week a different lecturer will present a new topic and fun problems for discussion. Topics will vary from year to year, but may include the following: encryption and number theory, non-Euclidean geometry, knots and surfaces, combinatorics of polyhedra, the Heisenberg Uncertainty Principle and signal processing, unsolvable problems and noncomputable functions, card shuffling and probability, symmetry and solutions of polynomial equations.
MATH 171(1710) Statistical Theory and Application in the Real World (MQR)
Fall, spring, summer. 4 credits. Prerequisite: high school mathematics. No previous familiarity with computers presumed. No
credit if taken after ECON 319, 320, or 321. Introductory statistics course discussing techniques for analyzing data occurring in the real world and the mathematical and philosophical justification for these techniques. Topics include population and sample distributions. central limit theorem, statistical theories of point estimation, confidence intervals, testing hypotheses, the linear model, and the least squares estimator. The course concludes with a discussion of tests and estimates for regression and analysis of variance (if time permits). The computer is used to demonstrate some aspects of the theory, such as sampling distributions and the Central Limit Theorem. In the lab portion of the course, students learn and use computerbased methods for implementing the statistical methodology presented in the lectures.

## MATH 191(1910) Calculus for Engineers (MQR)*

Fall, spring, summer. 4 credits. Prerequisite: three years high school mathematics including trigonometry and logarithms and at least one course in differential and integral calculus.
Essentially a second course in calculus. Topics include techniques of integration, finding areas and volumes by integration, exponential growth, partial fractions, infinite sequences and series, and power series.

## MATH 192(1920) Multivariable Calculus for Engineers (MQR)*

Fall, spring, summer. 4 credits. Prerequisite: MATH 191.
Introduction to multivariable calculus. Topics include partial derivatives, double and triple integrals, line integrals, vector fields, Green's theorem, Stokes' theorem, and the divergence theorem.

## MATH 213(2130) Calculus III (MQR)*

Fall, spring. 4 credits. Prerequisite: MATH 112,122 , or 191.
Designed for students who wish to master the Dasic techniques of multivariable calculus, but whose major will not require a substantial amount of mathematics. Topics include vectors and vector-valued functions; multivariable and vector calculus including multiple and line integrals; first- and second-order differential equations with applications; systems of differential equations; and elementary partial differential equations. The course may emphasize different topics in the syllabus in different semesters.

Fsee the list of courses with overlapping content at the end of the introduction.

MATH 221 (2210) Linear Algebra (MQR)*
Fall, spring. 4 credits. Prerequisite: two semesters of calculus with high performance or permission of department. Recommended for students who plan to major in mathematics or a related field. For a more applied version of this course, see MATH 231.
Topics include vector algebra, linear transformations, matrices, determinants, orthogonality, eigenvalues, and eigenvectors. Applications are made to linear differential equations.

## MATH 222(2220) Multivariable Calculus (MQR)*

Fall, spring. 4 credits. Prerequisite: MATH 221. Recommended for students who plan to major in mathematics or a related field. Differential and integral calculus of functions in several variables, line and surface integrals as well as the theorems of Green, Stokes, and Gauss.

## MATH 223(2230) Theoretical Linear

 Algebra and Calculus (MQR)*Fall. 4 credits. Prerequisite: two semesters of calculus with grade of A- or better, or permission of instructor.
MATH 223-224 provides an integrated treatment of linear algebra and multivariable calculus designed for students who have been highly successful in their previous calculus courses. The material is presented at a higher theoretical level than in 221-222. Topics in 223 include vectors, matrices, and linear transformations; differential calculus of functions of several variables; inverse and implicit function theorems; quadratic forms, extrema, and manifolds; multiple and iterated integrals.

## MATH 224(2240) Theoretical Linear Algebra and Calculus (MOR)*

Spring. 4 credits. Prerequisite: MATH 223. Topics include vector fields; line integrals; differential forms and exterior derivative; work, flux, and density forms; integration of forms over parametrized domains; and Green's, Stokes', and divergence theorems.

## MATH 231(2310) Linear Algebra with

 Applicatlons (MQR)*Fall, spring. 3 credits. Prerequisite: MATH 111 or equivalent. Students who plan to major in mathematics should take MATH 221 or 294.
Introduction to linear algebra for students who wish to focus on the practical applications of the subject. A wide range of applications are discussed and computer software may be used. The main topics are systems of linear equations, matrices, determinants, vector spaces, orthogonality, and eigenvalues. Typical applications are population models, input/ output models, least squares. and difference equations.

## MATH 275(2750) Living in a Random

 World (MQR)Spring. 3 credits. Prerequisite: one semester of calculus. Some familiarity with integration and differentiation is useful, but the equivalent of a one-semester course in calculus is more than enough.
Concentrates on applications of probability in the physical, biological, and social sciences, and to understanding the world around us

[^2](e.g., games, lotteries, option pricing, and opinion polls).

MATH 281(2810) Deductive Logic (also PHIL 331[3310]) (MaR)<br>Spring. 4 credits. H. Hodes.

For description, see PHIL 331.

## MATH 293(2930) Differential Equations

 for Engineers (MOR)Fall, spring, summer. 4 credits. Prerequisite: MATH 192. Taking MATH 293 and 294 simultaneously is not recommended. Introduction to ordinary and partial differential equations. Topics include: first-order equations (separable, linear, homogeneous, exact); mathematical modeling (e.g., population growth, terminal velocity); qualitative methods (slope fiekts, phase plots, equilibria, and stability); numerical methods; second-order equations (method of undetermined coefficients, application to oscillations and resonance, boundary-value problems and eigenvalues); Fourier series; linear partial differential equations (heat flow, waves, the Laplace equation); and linear systems of ordinary differential equations.

## MATH 294(2940) Linear Algebra for Engineers (MQR)*

Fall, spring, summer. 4 credits. Prerequisite: MATH 192. Taking MATH 293 and 294
simultaneously is not recommended.
Linear algebra and its applications. Topics include matrices, determinants, vector spaces, eigenvalues and eigenvectors, orthogonality and inner product spaces; applications include brief introductions to difference equations, Markov chains, and systems of linear ordinary differential equations. May include computer use in solving problems.

## MATH 304(3040) Prove It! (MOR)

Spring. 4 credits. Prerequisite: MATH 221,
223,294 , or permission of instructor. In mathematics, the methodology of proof provides a central tool for confirming the validity of mathematical assertions, functioning much as the experimental method does in the physical sciences. In this course, students learn various methods of mathematical proof, starting with basic techniques in propositional and predicate calculus and in set theory and combinatorics, and then moving to
applications and illustrations of these via topics in one or more of the three main pillars of mathematics: algebra, analysis, and geometry. Since cogent communication of mathematical ideas is important in the presentation of proofs, the course emphasizes clear, concise exposition. This course is useful for all students who wish to improve their skills in mathematical proof and exposition, or who intend to study more advanced topics in mathematics.

## MATM 311(3110) Introduction to Analysis (MOR)

Fall, spring. 4 credits. Prerequisites: MATH 221-222, 223-224, or 192 and 294.
Provides a transition from calculus to real analysis. Topics include rigorous treatment of fundamental concepts in calculus: including limits and convergence of sequences and series, compact sets; continuity, uniform continuity and differentiability of functions. Emphasis is placed upon understanding and constructing mathematical proofs.

[^3]
## MATH 321(3210) Manifolds and

 Differential Forms (MQR)Fall. 4 credits. Prerequisites: multivariable calculus and linear algebra (e.g., MATH 221-222, 223-224, or 192 and 294).
A manifold is a type of subset of Euclidean space that has a well-defined tangent space at every point. Such a set is amenable to the methods of multivariable calculus. After a review of some relevant calculus, this course investigates manifolds and the structures that they are endowed with, such as tangent vectors, boundaries, orientations, and differential forms. The notion of a differential form encompasses such ideas as surface and volume forms, the work exerted by a force, the flow of a fluid, and the curvature of a surface, space, or hyperspace. The course reexamines the integral theorems of vector calculus (Green, Gauss, and Stokes) in the light of differential forms and apply them to problems in partial differential equations. topology, fluid mechanics, and

## electromagnetism.

## MATH 323(3230) Introduction to Differential Equations (MQR)

Fall. 4 credits. Prerequisites: multivariable calculus and linear algel)ra (e.g., MATH 221-222, 223-224, or 192 and 294), or permission of instructor.
Intended for students who want a brief onesemester introduction to the theory and techniques of both ordinary and partial differential equations. Topics for ordinary differential equations may include initial-value and two-point boundary value problems, the basic existence and uniqueness theorems. continuous dependence on data, stability of fix-points, numerical methods, special functions. Topics for partial differential equations may include the Poisson, heat and wave equations, boundary and initialboundary value problems, maximum principles, continuous dependence on data, separation of variables, Fourier series, Green's functions, numerical methods, transform methods.

## MATH 332(3320) Algebra and Number

 Theory (MQR)*Fall. 4 credits. Prerequisite: MATH 221, 223, 231 or 294.
Covers various topics from number theory and modern algebra. Usually includes most of the following: primes and factorization,
Diophantine equations, congruences, quadratic reciprocity, continued fractions, rings and fields, finite groups, and an introduction to the arithmetic of the Gaussian integers and quadratic fields. Motivation and examples for the concepts of abstract algebra are derived primarily from number theory and geometry.

## MATH 336(3360) Applicable Algebra

 (MQR)*Spring. 4 credits. Prerequisite: MATH 221, 223, 231, or 294.
Introduction to the concepts and methods of abstract algebra and number theory that are of interest in applications. Covers the basic theory of groups, rings and fields and their applications to such areas as public-key cryptography, error-correcting codes, parallel computing, and experimental designs. Applications include the RSA cryptosystem and use of finite fields to construct errorcorrecting codes and latin squares. Topics

[^4] the end of the introduction.
include elementary number theory, Euclidean algorithm, prime factorization, congruences, theorems of Fermat and Euler, elementary group theory, Chinese remainder theorem, factorization in the ring of polynomials, and classification of finite fields.

## [MATH 356(3560] Groups and Geometry

 (MQR)Spring. 4 credits. Prerequisite: MATH 221. 223, 231 or 294. Prior knowledge of group theory is not a prerequisite. Next offered 2008-2009.
A geometric introduction to the algebraic theory of groups through the study of symmetries of planar patterns and 3dimensional regular polyhedra. Course also provides an introduction to abstract mathematical thinking and mathematical proofs.]

## MATH 362(3620) Dynamic Models in Biology (also BIOEE 362[3620]) (MQR)

Spring. 4 credits. Prerequisite: two semesters of introductory biology (BIO G 101-102, 105-106, 107-108, 109110 , or equivalent) and completion of math requirements for biological sciences major or equivalent.
For description, see BIOEE 362.
MATH 384(3840) Foundations of Mathematics (also PHIL 330[3300]) (MOR)
Fall. 4 credits.
For description, see PHIL 330.
MATH 401(4010) Monors Seminar: Topics In Modern Mathematics (MQR)
Spring. 4 credits. Prerequisite: two mathematics courses numbered 300 or higher or permission of instructor. Participatory seminar aimed primarily at introducing senior and junior mathematics majors to some of the challenging problems and areas of modern mathematics. Helps students develop research and expository skills in mathematics, which is important for careers in any field that makes significant use of the mathematical sciences (i.e., pure or applied mathematics, physical or biological sciences, business and industry, medicine). Content varies from year to year.

## MATH 403(4030) History of Mathematics

 * (MQR)Spring. 4 credits. Prerequisite: two mathematics courses above 300 , or permission of instructor.
Survey of the development of mathematics from antiquity to the present, with an emphasis on the achievements, problems, and mathematical viewpoints of each historical period and the evolution of such basic concepts as number, geometry, construction, and proof. Readings from original sources in translation. Students are required to give oral and written reports.

## [MATH 408(4080) Mathematics in Perspective (MQR)

Spring. 4 credits. Prerequisite: permission of instructor. Next offered 2008-2009. Re-examines very basic mathematics from an advanced perspective, emphasizing the connections between branches and ties of current mathematical interest. Emphasis on communication of mathematics.]

MATH 413(4130) Honors Introduction to Analysis I (MOR)
Fall, spring. 4 credits. Prerequisite: high level of performance in MATH 221-222, 223-224, or 192 and 294 and familiarity with proofs. Students who do not intend to take MATH 414 are encouraged to take MATH 413 in spring.
Introduction to the rigorous theory underlying calculus, covering the real number system and functions of one variable. Based entirely on proofs. The student is expected to know how to read and, to some extent, construct proofs before taking this course. Topics typically include construction of the real number system, properties of the real number system, continuous functions, differential and integral calculus of functions of one variable, sequences and series of functions.

## MATH 414(4140) Honors Introduction to

 Analysis II (MQR)Spring. 4 credits. Prerequisite: MATH 413. Proof-based introduction to further topics in analysis. Topics may include the Lebesgue measure and integration, functions of several variables, differential calculus, implicit function theorem, infinite dimensional normed and metric spaces, Fourier series, ordinary differential equations.

## MATH 418(4180) Introduction to the

 Theory of Functions of One Complex Variable (MQR)Spring. 4 credits. Prerequisite: MATH 223224,311 , or 413 or permission of instructor.
Theoretical and rigorous introduction to complex variable theory. Topics include complex numbers, differential and integral calculus for functions of a complex variable including Cauchy's theorem and the calculus of residues, elements of conformal mapping. Students interested in the applications of complex analysis should consider MATH 422.

## MATH 420(4200) Differential Equations

 and Dynamical Systems (MQR)Fall. 4 credits. Prerequisite: high level of performance in MATH 221-222, 223-224,
192 and 294 , or permission of instructor. Covers ordinary differential equations in one and higher dimensions: qualitative, analytic, and numerical methods. Emphasis is on differential equations as models and the implications of the theory for the behavior of the system being modeled and includes an introduction to bifurcations.
MATH 422(4220) Applied Complex Analysis (MQR)
Spring. 4 credits. Prerequisite: MATH 221222, 223-224, 192 and 294, or 213 and 231 Undergraduates who plan to attend
graduate school should take MATH 418. Covers complex variables, Fourier transforms, Laplace transforms and applications to partial differential equations. Additional topics may include an introduction to generalized functions.

## MATH 424(4240) Wavelets and Fourier

 Series (MOR)Spring. 4 credits. Prerequisite: MATH 221222, 223-224, 192 and 294, or permission of instructor.
Both Fourier series and wavelets provide methods to represent or approximate general functions in terms of simple building blocks. Such representations have important consequences, both for pure mathematics and for applications. Fourier series use natural sinusoidal building blocks and may be used to
help solve differential equations. Wavelets use artificial building blocks that have the advantage of localization in space. A full understanding of both topics requires a background involving Lebesgue integration theory and functional analysis. This course presents as much as possible on both topics without such formidable prerequisites. The emphasis is on clear statements of results and key ideas of proofs, working out examples, and applications. Related topics that may be included are Fourier transforms, Heisenberg uncertainty principle, Shannon sampling theorem, and Poisson summation formula

## MATH 425(4250) Numerical Analysis and Differential Equations (also CS 421[4210]) (MaR)

Fall. 4 credits. Prerequisites: MATH 221 or 294 or equivalent, one additional
mathematics course numbered 300 or
above, and knowledge of programming Introduction to the fundamentals of numerical analysis: error analysis, approximation, interpolation, numerical integration. In the second half of the course, the above are used to build approximate solvers for ordinary and partial differential equations. Strong emphasis is placed on understanding the advantages, disadvantages, and limits of applicability for all the covered techniques. Computer programming is required to test the theoretical concepts throughout the course. MATH 425 (CS 421) and MATH 426 (CS 422) provide a comprehensive introduction to numerical analysis; these classes can be taken independently from each other and in either order.

## MATH 426(4260) Numerical Analysis: Linear and Nonlinear Problems (also CS 422[4220]) (MOR)

Spring. 4 credits. Prerequisites: MATH 221 or 294 or equivalent, one additional mathematics course numbered 300 or above, and knowledge of programming. Introduction to the fundamentals of numerical linear algebra: direct and iterative methods for linear systems, eigenvalue problems, singular value decomposition. In the second half of the course, the above are used to build iterative methods for nonlinear systems and for multivariate optimization. Strong emphasis is placed on understanding the advantages, disadvantages, and limits of applicability for all the covered techniques. Computer programming is required to test the theoretical concepts throughout the course. MATH 425 (CS 421) and MATH 426 (CS 422) provide a comprehensive introduction to numerical analysis; these classes can be taken independently from each other and in either order.

## MATH 428(4280) Introduction to Partial Differential Equations (MQR)

Spring. 4 credits. Prerequisite: MATH 221 -$222,223-224$, or 192 and 294, or permission of instructor.
Topics are selected from first-order quasilinear equations, classification of second-order equations, with emphasis on maximum principles, existence, uniqueness, stability, Fourier series methods, approximation methods.

## MATH 431(4310) Linear Algebra (MOR)*

Fall. 4 credits. Prerequisite: MATH 221, 223, 231 , or 294 . Undergraduates who plan to attend graduate school in mathematics should take MATH 433-434

[^5] the end of the introduction.

Introduction to linear algebra, including the study of vector spaces, linear transformations, matrices, and systems of linear equations. Additional topics are quadratic forms and inner product spaces, canonical forms for various classes of matrices and linear transformations.

## MATH 432|4320) Introduction to Algobra (MQR)*

Spring. 4 credits. Prerequisite: MATH 332, 336,431 or 433 , or permission of instructor. Undergraduates who plan to attend graduate school in mathematics should take MATH 433-434.
Introduction to various topics in abstract algebra, including groups, rings, fields, factorization of polynomials and integers, congruences, and the structure of finitely generated abelian groups. Optional topics are modules over Euclidean domains and Sylow theorems.

## MATH 433(4330) Honors Linear Algebra (MQR)*

Fall. 4 credits. Prerequisite: high level of performance in MATH 221, 223, 231, or 294 Honors version of a course in advanced linear algebra, which treats the subject from an abstract and axiomatic viewpoint. Topics include vector spaces, linear transformations, polynomials, determinants, tensor and wedge products, canonical forms, inner product spaces, and bilinear forms. Emphasis is on understanding the theory of linear algebra; homework and exams include at least as many proofs as computational problems. For a less theoretical course that covers approximately the same subject matter, see MATH 431.

## MATH 434(4340) Honors Introduction to Algebra (MQR)*

Spring. 4 credits. Prerequisite: MATH 332, 336,431 , or 433 , or permission of instructor.
Honors version of a course in abstract algebra, which treats the subject from an abstract and axiomatic viewpoint, including universal mapping properties. Topics include groups, groups acting on sets, Sylow theorems; rings, factorization: Euclidean rings, principal ideal domains and unique factorization domains, the structure of finitely generated modules over a principal ideal domain, fields, and Galois theory. The course emphasizes understanding the theory with proofs in both homework and exams. An optional computational component using the computer language GAP is available. For a less theoretical course that covers similar subject matter, see MATH 432.

## MATH 437(4370) Computational Algebra (MQR)

Spring. 4 credits. Prerequisite: linear algebra (MATH 294, or MATH 221, or MATH 431).
Introduction to Grobbner bases theory, which is the foundation of many algorithms in computational algebra. In this course, students learn how to compute a Grobner basis for polynomials in many variables. Covers the following applications: solving systems of polynomial equations in many variables, solving diophantine equations in many variables, 3 -colorable graphs, and integer programming. Such applications arise, for example, in computer science, engineering, economics, and physics.

[^6]
## MATH 441(4410) Introduction to

 Combinatorics I (MQR)Fall. 4 credits. Prerequisite: MATH 221, 223, 231 , or 294.
Combinatorics is the study of discrete structures that arise in a variety of areas, particularly in other areas of mathematics, computer science, and many areas of application. Central concerns are often to count objects having a particular property (e. g., trees) or to prove that certain structures exist (e.g., matchings of all vertices in a graph). The first semester of this sequence covers basic questions in graph theory, including extremal graph theory (how large must a graph be before one is guaranteed to have a certain subgraph) and Ramsey theory (which shows that large objects are forced to have structure). Variations on matching theory are discussed, including theorems of Dilworth, Hall, König, and Birkhoff, and an introduction to network flow theory. Methods of enumeration (inclusion/exclusion, Möbius inversion, and generating functions) are introduced and applied to the problems of counting permutations, partitions, and triangulations.

## MATH 442(4420) Introduction to Combinatorics II (MQR)

Spring. 4 credits. Prerequisite: MATH 221, 223,231 , or 294.
Continuation of the first semester, although formally independent of the material covered there. The emphasis here is the study of certain combinatorial structures, such as Latin squares and combinatorial designs (which are of use in statistical experimental design), classical finite geometries and combinatorial geometries (also known as matroids, which arise in many areas from algebra and geometry through discrete optimization theory). There is an introduction to partially ordered sets and lattices, including general Mobius inversion and its application, as well as the Polya theory of counting in the presence of symmetries.
MATH 450(4500) Matrix Groups (MaR)
Fall. 4 credits. Prerequisite: MATH 221-222, 223-224, or 192 and 294.
An introduction to a topic that is central to mathematics and important in physics too, although usually taught only at the graduate level as in MATH 650, Lie Groups. The object: of study are certain classes of matrices, such as orthogonal, unitary, or symplectic matrices These classes have both algebraic structure (groups) and geometric/topological structure (manifolds). Thus the course will be a mixture of algebra and geometry/topology, with a little analysis as well. Concrete examples will be emphasized, as is appropriate for an undergraduate introduction. Background not included in the official prerequisites will be developed as needed

## MATH 451(4510) Euclidean and Spherical

 Geometry (MQR)Fall. 4 credits. Prerequisite: MATH 221, 223,
231 , or 294 , or permission of instructor Covers topics from Euclidean and spherical (non-Euclidean) geometry. Nonlecture, seminar-style course organized around student participation

## MATH 452(4520) Classical Geometries

 (MQR)Spring. 4 credits. Prerequisite: MATH 221 223,231 , or 294 , or permission of instructor. Offered alternate years.

Introduction to hyperbolic and projective geometry-the classical geometries that developed as Euclidean geometry was better understood. For example, the historical problem of the independence of Euclid's fifth postulate is understood when the existence of the hyperbolic plane is realized. Straightedge (and compass) constructions and stereographic projection in Euclidean geometry can be understood within the structure of projective geometry. Topics in hyperbolic geometry include models of the hyperbolic plane and relations to spherical geometry. Topics in projective geometry include homogeneous coordinates and the classical theorems about conics and configurations of points and lines. Optional topics include principles of perspective drawing, finite projective planes, orthogonal Latin squares, and the cross ratio.

## MATH 453(4530) Introduction to

 Topology (MaR)Fall. 4 credits. Prerequisite: MATH 221, 223, 231 , or 294 , plus at least one mathematics course numbered 300 or above, or permission of instructor.
Topology may be described briefly as qualitative geometry. This course begins with basic point-set topology, including connectedness, compactness, and metric spaces. Later topics may include the classification of surfaces (such as the Klein bottle and Mobius band), elementary knot theory, or the fundaméntal group and covering spaces

## MATH 454(4540) Introduction to Differential Geometry (MaR)

Spring. 4 credits. Prerequisites: MATH 221222, 223-224, or 293-294, plus at least one mathematics course numbered 300 or above. MATH 453 is not a prerequisite. Differential geometry involves using calculus to study geometric concepts such as curvature and geodesics. This introductory course focuses on the differential geometry of curves and surfaces. It may also touch upon the higher-dimensional generalizations, Riemannian manifolds, which underlie the study of general relativity.

## [MATH 455(4550) Applicable Geometry (MOR)

Spring. 4 credits. Prerequisite: good introduction to linear algebra (e.g., MATH $221,223,231$, or 294 ) or permission of instructor. Does not assume students know the meaning of all words in the following description. Next offered 2008-2009.
Introduction to the theory of n -dimensional convex polytopes and polyhedra and some of its applications, with an in-depth treatment of the case of 3 dimensions.]

MATH $471(4710)$ Basic Probability (MOR)*
Fall. 4 credits. Prerequisites: one year of calculus. Recommended: some knowledge of multivariate calculus.
Introduction to probability theory, which prepares the student to take MAT'H 472. The course begins with basics: combinatorial probability, mean and variance, independence conditional probability, and Bayes formula Density and distribution functions and their properties are introduced. The law of large numbers and the central limit theorem are stated and their implications for statistics are discussed.

[^7]
## MATH 472(4720) Statistics (MQR)*

Spring. 4 credits. Prerequisites: MATH 471 and knowledge of linear algebra (e.g., MATH 221). Recommended: some knowledge of multivariable calculus. Statistics have proved to be an important research tool in nearly all of the physical, biological, and social sciences. This course serves as an introduction to statistics for students who already have some background in calculus, linear algebra, and probability theory. Topics include parameter estimation, hypothesis testing, and linear regression. The course emphasizes both the mathematical theory of statistics and techniques for data analysis that are useful in solving scientific problems.

## [MATH 481(4810) Mathematical Logle (also PHIL 431[4310]) (MQR)

Spring, 4 credits. Prerequisites: MATH 222 or 223 and preferably some additional course involving proofs in mathematics, computer science, or philosophy. Next offered 2008-2009.
First course in mathematical logic: formal definitions of languages, truth, proofs and computability. Completeness, incompleteness and compactness theorems.]

## MATH 482(4820) Toples in Logic (also PHIL 432[4320]) (MQR)

Fall. 4 credits.
For description, see PHIL 432.
MATH 486(4860) Applled Logic lalso Cs 486[4860]) (MOR)
Spring. 4 credits. Prerequisites: MATH 221222, 223-224, or 192 and 294; CS 280 or equivalent (e.g., MATH $332,336,432,434$, or 481); and additional course in mathematics or theoretical computer science.
Covers propositional and predicate logic; compactness and completeness by tableaux, natural deduction, and resolution. Other possible topics include equational logic; Herbrand Universes and unification; rewrite rules and equational logic, Knuth-Bendix, method and the congruence-closure algorithm and lambda-calculus reduction strategies; topics in Prolog, LISP, ML, or Nuprl; and applications to expert systems and program verification.

## MATH 490(4900) Supervised Reading and Research

Fall, spring. 1-6 credits.
Supervised reading and research by arrangement with individual professors. Not for material currently available in regularly scheduled courses.

## Professional-Level and Mathematics Education Courses

MATH 505(5050) Educetional Issues in Undergraduate Mathematles
Spring. 4 credits. Prerequisite: graduate
standing or permission of instructor. Examines various educational issues in undergraduate mathematics and the relationship of these issues to the mathematics itself. The precise choice of topics varies, but the intent is that a balance of different views be presented and discussed. There are extensive readings in the course and occasional guest lectures. Possible topics include: nature of proof and how and when to teach it, calculus "reform," teaching mathematics to school teachers, using writing,
using history, alternative assessments,
alternatives to lecturing, equity issues, effective uses of technology, what is mathematical understanding and how do we recognize it, what should every mathematics major know, and research in undergraduate mathematics.

## [MATH 507(5070) Teaching Secondary

Mathematics: Theory and Practlces
Spring. 4 credits. Next offered 2008-2009 Explore foundations/connections among number, operations, measurement, proof, algebra, geomerry, trigonometry, data analysis, probability. For seniors/grads planning to teach secondary mathematics or teach future teachers.]

## MATH 508(5080) Mathematics for

 Secondary School TeachersFall, spring. $1-6$ credits. Prerequisite: secondary school mathematics teachers or permission of instructor.
Examination of the principles underlying the content of the secondary school mathematics curriculum, including connections with the history of mathematics and current mathematics research.

## Graduate Courses

Many of our graduate courses are topics courses for which descriptions are not included here; however, during each preenrollment period a schedule of graduate courses to be offered the following semester is posted at www.math.cornell.edu/Courses/ courses.html. This web site includes course descriptions that are often more detailed than those included here, as well as a means for interested students to participate in the process of selecting meeting times.

## MATH 611(6110) Real Analysis

Fall. 4 credits.
MATH 611-612 are the core analysis courses in the mathematics graduate program. 611 covers measure and integration and functional analysis.

## MATH 612(6120) Complex Analysis

Spring. 4 credits.
MATH 611-612 are the core analysis courses in the mathematics graduate program. 612 covers complex analysis, Fourier analysis, and distribution theory.

## [MATH 613-614(6130-6140) Toples in

 Analysls613, fall; 614, spring. 4 credits each. Next offered 2008-2009.]

## MATH 615(6150) Mathematical Methods In Physics

Fall. 4 credits. Prerequisite: for undergraduates, permission of instructor. Intended for graduate students in physics or related fields. Recommended: a strong advanced calculus course and at least two years of general physics. Assumes knowledge of elements of finite dimensional vector space theory, complex variables, separation of variables in partial differential equations, and Fourier series. Designed to give a working knowledge of the principal mathematical methods used in advanced physics. Covers Hilbert space, generalized functions, Fourier transform, Sturm-Liouville problem in ODE, Green's functions, and asymptotic expansions.

## MATH 617(6170) Dynamical Systems

Fall. 4 credits. Generally offered every two years.
Topics include existence and uniqueness theorems for ODEs; Poincaré-Bendixon theorem and global properties of twodimensional flows; limit sets, nonwandering sets, chain recurrence, pseudo-orbits and structural stability; linearization at equilibrium points: stable manifold theorem and the Hartman-Grobman theorem; and generic properties: transversality theorem and the Kupka-Smale theorem. Examples include expanding maps and Anosov
diffeomorphisms; hyperbolicity: the horseshoe and the Birkhoff-Smale theorem on transversal homoclinic orbits; rotation numbers; Herman's theorem; and characterization of structurally stable systems.

## [MATH 618(6180) Smooth Ergodlc Theory

Spring. 4 credits. Next offered 2008-2009.
Topics include invariant measures; entropy; Hausdorff dimension and related concepts; hyperbolic invariant sets: stable manifolds, Markov partitions and symbolic dynamics; equilibrium measures of hyperbolic attractors; ergodic theorems; Pesin theory: stable manifolds of nonhyperbolic systems; Liapunov exponents; and relations between entropy, exponents, and dimensions.]

## MATH 619-620(6190-6200) Partial

 Differential Equations619, fall; 620, spring. 4 credits each semester.
Covers basic theory of partial differential equations.

## MATH 621(6210) Measure Theory and

 Lebesgue IntegrationFall. 4 credits
Covers measure theory, integration, and Lp spaces.

## MATH 622(6220) Applied Functlonal

 AnalysisSpring. 4 credits. Not offered every year. Covers basic theory of Hilbert and Banach spaces and operations on them. Applications

## MATH 628(6280) Complex Dynamical Systems

Fall. 4 credits. Prerequisite: MATH 418. Various topics in the dynamics of analytic mappings in one complex variable, such as Julia and Fatou sets, the Mandelbrot set, Mañē-Sad-Sullivan's theorem on structural stability. Also covers: local theory, including repulsive cycles and the Yoccoz inequality, parabolic points and Ecalle-Voronin invariants, Siegel disks and Yoccoz's proof of the Siege! Brjuno theorem; quasi-conformal mappings and surgery: Sullivan's theorem on nonwandering domains, polynomial-like mappings and renormalization, Shishikura's construction of Hermann rings; puzzles, tableaux and local connectivity problems; and Thurston's topological characterization of rational functions, the spider algorithm, and mating of polynomials.

## MATH 631(6310) Algebra

Fall. 4 credits. Assumes familiarity with material of standard undergraduate course in abstract algebra.
MATH 631-632 are the core algebra courses in the mathematics graduate program. 631 covers group theory, especially finite groups; rings and modules; ideal theory in commutative rings; arithmetic and factorization in principal
*See the list of courses with overlapping content at the end of the introduction.
ideal domains and unique factorization domains; introduction to field theory; tensor products and multilinear algebra. (Optional topic: introduction to affine algebraic geometry.)

## MATH 632(6320) Algebra

Spring. 4 credits. Prerequisite: MATH 631. MATH 631-632 are the core algebra courses in the mathematics graduate program. 632 covers Galois theory, representation theory of finite groups, introduction to homological algebra. Familiarity with the material of a standard undergraduate course in abstract algebra will be assumed.

## [MATH 633(6330) Noncommutatlve Algebra

Fall. 4 credits. Next offered 2008-2009. Covers Wedderburn structure theorem, Brauer group, and group cohomology.]

## MATH 634(6340) Commutative Algebra

Spring. 4 credits.
Covers Dedekind domains, primary decomposition, Hilbert basis theorem, and local rings.

## [MATH 649(6490) Lle Algebras

Fall. 4 credits. Next offered 2008-2009. Topics include nilpotent, solvable and reductive Lie algebras; enveloping algebras; root systems; Coxeter groups; and classification of simple algebras.]

## MATH 650(6500) Lie Groups

Fall. 4 credits.
Topics include topological groups, Lie groups; relation between Lie groups and Lie algebras; exponential map, homogeneous manifolds; and invariant differential operators.

## MATH 651(6510) Algebraic Topology

Spring. 4 credits.
One of the core topology courses in the mathematics graduate program. An introductory study of certain geometric processes for associating algebraic objects such as groups to topological spaces. The most important of these are homology groups and homotopy groups, especially the first homotopy group or fundamental group, with the related notions of covering spaces and group actions. The development of homology theory focuses on verification of the Eilenberg-Steenrod axioms and on effective methods of calculation such as simplicial and cellular homology and Mayer-Vietoris sequences. If time permits, the cohomology ring of a space may be introduced.

## MATH 652(6520) Differentiable Manifolds I

Fall. 4 credits. Prerequisites: advanced calculus, linear algebra (MATH 431), pointset topology (MATH 453).
One of the core topology courses in the mathematics graduate program. Introduction to geometry and topology from a differentiable viewpoint, suitable for beginning graduate students. The objects of study are manifolds and differentiable maps. The collection of all tangent vectors to a manifold forms the tangent bundle, and a section of the tangent bundle is a vector field. Alternatively, vector fields can be viewed as first-order differential operators. Students study flows of vector fields and prove the Frobenius integrability theorem. In the presence of a Riemannian metric, the notions of parallel transport, curvature, and geodesics are development. Students examine the tensor calculus and the exterior differential calculus
and prove Stokes' theorem. If time permits, de Rham cohomology, Morse theory, or other optional topics are introduced.

## [MATH 653(6530) Differentiable

 Manlfolds IISpring. Prerequisites: MATH 652 or equivalent. Next offered 2008-2009. Advanced topics from differential geometry and differential topology selected by instructor. Examples of eligible topics include transversality, cobordism, Morse theory, classification of vector bundles and principal bundles, characteristic classes, microlocal analysis, conformal geometry, geometric analysis and partial differential equations, and Atiyah-Singer index theorem.]

## MATH 661(6610) Ceometric Topology

## Fall. 4 credits.

Introduction to some of the more geometric aspects of topology and its connections with group theory. Possible topics include surface theory, 3 -manifolds, knot theory, geometric and combinatorial group theory, hyperbolic groups, and hyperbolic manifolds.

## MATH 662(6620) Rlemannian Geometry

 Spring. 4 credits.Topics include linear connections, Riemannian metrics and parallel translation; covariant differentiation and curvature tensors; the exponential map, the Gauss Lemma and completeness of the metric; isometries and space forms, Jacobi fields and the theorem of Cartan-Hadamard; the first and second variation formulas; the index form of Morse and the theorem of Bonnet-Myers; the Rauch, Hessian, and Laplacian comparison theorems; the Morse index theorem; the conjugate and cut loci; and submanifolds and the Second Fundamental form.

## MATH 671(6710) Probabillty Theory I

Fall. 4 credits. Prerequisite: knowledge of Lebesgue integration theory, at least on real line. (Students can learn this material by taking parts of MATH 413-414 or 621.) Conditional expectation, martingales, Brownian motion. Other topics such as random walks and ergodic theory, depending on time and interest of the students and the instructor.

## MATH 672(6720) Probability Theory II

Spring. 4 credits. Prerequisite: MATH 671. Content will vary from year to year. Course may be taken more than once for credit. Previously, topics have been chosen from stochastic calculus, diffusion processes, martingale problems, weak convergence, and Markov processes in continuous time.

## MATH 674(6740) Introduction to Mathematical Statistics

Spring. 4 credits. Prerequisites: MATH 671 (measure theoretic probability) and OR\&IE 670 , or permission of instructor. Topics include an introduction to the theory of point estimation, hypothesis testing and confidence intervals, consistency, efficiency, and the method of maximum likelihood. Basic concepts of decision theory are discussed; the key role of the sufficiency principle is highlighted and applications are given for finding Bayesian, minimax, and unbiased optimal decisions. Modern computer-intensive methods like the bootstrap receive some attention, as do simulation methods involving Markov chains. The parallel development of some concepts of machine learning is exemplified by classification algorithms. An
optional section may include nonparametric curve estimation and elements of large sample asymptotics.

## [MATH 675(6750) Statistical Theories

 Applicable to GenomicsFall. 4 credits. Next offered 2008-2009. Focuses on statistical concepts useful in genomics (e.g., microarray data analysis) that involve a large number of populations. Discusses false discovery rate (FDR) of Benjamini and Hochberg, and Storey's papers relating to pFDR . Also discusses the Empirical Bayes approach, which could "borrow the strength ${ }^{\text {" }}$ from other populations.]

## MATH 681(6810) Logic

Spring. 4 credits.
Covers basic topics in mathematical logic, including propositional and predicate calculus; formal number theory and recursive functions; completeness and incompleteness theorems, compactness and Skolem-Loewenheim theorems. Other topics as time permits.

## MATH 711-712(7110-7120) Seminar in Analysis <br> 711, fall; 712, spring. 4 credits

## MATH 713(7130) Functional Analysis

Spring. 4 credits.
Covers topological vector spaces, Banach and Hilbert spaces, and Banach algebras. Additional topics selected by instructor

## [MATH 715(7150) Fourier Analysls

 Spring. 4 credits. Next offered 2008-2009.]
## MATH 71717170) Applied Dynamical

 Systems (also TaAM 776[7760])Spring. 4 credits. Recommended: T\&AM 675, MATH 617, or equivalent.
Topics include review of planar (single-degree-of-freedom) systems; local and global analysis; structural stability and bifurcations in planar systems; center manifolds and normal forms; the averaging theorem and perturbation methods; Melnikov's method; discrete dynamical systems, maps and difference equations, homoclinic and heteroclinic motions, the Smale Horseshoe and other complex invariant sets; global bifurcations, strange attractors, and chaos in free and forced oscillator equations; and applications to problems in solid and fluid mechanics.

## MATH [731]-732([7310]-7320) Seminar in Algebra

731, fall; 732, spring. 4 credits each semester. 731 next offered 2008-2009.

## MATH 735(7350) Topics In Algebra

Fall, spring. 4 credits.
Selection of advanced topics from algebra, algebraic number theory, and algebraic geometry. Course content varies.

## MATH 737(7370) Algebraic Number

 TheoryFall. 4 credits

## MATH 739(7390) Topics In Algebra

Spring. 4 credits.
Selection of advanced topics from algebra, algebraic number theory, and algebraic geometry. Content varies.

## MATH 740(7400) Homological Algebra Fall. 4 credits.

MATH [751]-752([7510]-7520) Berstein Seminar in Topology
751, fall; 752, spring. 4 credits each semester. 751 next offered 2008-2009.
[MATH 753(7530) Algobraic Topology II
Fall. 4 credits. Next offered 2008-2009. Continuation of 651. The standard topics most years are cohomology, cup products, Poincarë duality, and homotopy groups. Other possible topics include fiber bundles, fibrations, vector bundles, and characteristic classes. May sometimes be taught from a differential forms viewpoint.]

## MATH [755]-756([7550]-7560) Topology and Geometric Group Theory

 Seminar755, fall; 756, spring. 4 credits each semester. 755 next offered 2008-2009.

## MATH 757-758(7570-7580) Topics in

 Topology757, fall; 758 , spring. 4 credits each semester.
Selection of advanced topics from modern algebraic, differential, and geometric topology Content varies.

## MATH 761-762(7610-7620) Seminar in Geometry

761 , fall; 762 , spring. 4 credits each semester. Either 761 or 762 generally offered every year.

## MATH 767(7670) Algebraic Ceometry

Fall. 4 credits.
MATH 771-772(7710-7720) Seminar in Probablity and Statlstics
771, fall; 772, spring. 4 credits each semester.

MATH 774(7740) Statistical Learning Theory
Fall. 4 credits. Prerequisites: basic mathematical statistics (MATH 674 or equivalent) and measure theoretic probability (MATH 671).
The course aims to present the developing interface between machine learning theory and statistics. Topics are classification and pattern recognition, support vector machines, neural networks, tree methods, and boosting.

## MATH 777-778(7770-7780) Stochastic Processes <br> 777 , fall; 778 , spring. 4 credits each semester.

MATH 781-782(7810-7820) Seminar in Logic
781, fall; 782, spring. 4 credits each semester.

## MATH 783(7830) Model Theory

Spring. 4 credits.
Introduction model theory at the level of the books by Hodges or Chang and Keisler.

## MATH 784(7840) Recursion Theory

Fall. 4 credits.
Covers theory of effectively computable functions; classification of recursively enumerable sets; degrees of recursive unsolvability; applications to logic; hierarchies; recursive functions of ordinals and higher type objects; generalized recursion theory.

## [MATH 787(7870) Set Theory

Fall. 4 credits. Next offered 2008-2009. First course in axiomatic set theory at the level of the book by Kunen.]

## MATH 788(7880) Topics in Applied Logic Fall. 4 credits.

Covers applications of the results and methods of mathematical logic to other areas of mathematics and science. Topics vary each year; some recent examples are: automatic
theorem proving, formal semantics of programming and specification languages, linear logic, constructivism (intuitionism), nonstandard analysis, and automata theory. This year the course will cover finite model theory.

MATH 790(7900) Supervised Reading and Research
Fall, spring. 1-6 credits
*See the list of courses with overlapping
content at the end of the introduction.

## MEDIEVAL STUDIES

A. S. Galloway, director; F. M. Ahl, R. Brann, C. Brittain, E. W. Browne, O. Falk,
A. B. Groos, K. Haines-Eitzen, W. E. Harbert,
T. D. Hill, T. J. Hinrichs, C. Howie,
P. R. Hyams, W. J. Kennedy, S. MacDonald, S. Manning, M. Migiel, J. M. Najemy, J. A. Peraino, S. Pinet, D. S. Powers, M. Raskolnikov, E. Rebillard, C. Robinson,
C. Ruff, S. Senderovich, S. M. Toorawa, D. X. Warner, M. L. Weiss, S. Zacher. Emeritus: A. M. Colby-Hall, J. J. John, C. V. Kaske,
P. I. Kuniholm, W. Wetherbee.

## Undergraduate Study in Medieval Studies

Course work in medieval studies enhances the student's enjoyment and understanding of the artistic and material relics of the Middle Ages: Gregorian chant, illuminated manuscripts and stained glass windows, Gothic cathedrals, Crusader castles, and picturesque towns cramped within ancient walls. Students discover the serious realities involved in, and shaped by, Arthurian tales of brave knights and fair ladies, dungeons, dragons, and other marvels. Students can analyze and appreciate the horrors of the Black Death, triumphs in courtly love and pitched battle, swords and scimitars, caliphs and popes, fear of demons and djinns, and the reassuring presence of angels. Students can study all this and more very well in English, but see below for how to acquire the medieval languages that so enhance the experience.
The period saw many of the foundational choices that have, for good and ill, made the world what it is today. Many of our current challenges in the fields of law, human rights, attitudes toward power, authority, gender relations, and sexual mores derive from the ways in which these and other questions were formulated a millennium ago. It actually makes good sense to think out your positions on today's world through study of the less complicated but intriguing medieval West, with whose successes and failures we must still contend. Serious investigation of exotic materials marks this concentration out as a unique addition to Cornell's training. The Medieval Studies Program houses a lively undergraduate association, Quodlibet, that arranges frequent lectures on medieval topics and an annual celebratory Reading of prose and poetry in many medieval languages. The graduate students host an annual student colloquium, which is entirely student-run and includes grad medievalists from all over campus.
The "middle" in "Middle Ages" comes from its position between antiquity and the "modern" period, in a schema created for European and Western conditions. Our concentration,
however, is more properly inclusive and treats a time span from roughly the fifth century into the 16 th and ranges from Western Europe and the Mediterranean to China and Japan. To discover the vibrant state of medieval studies today, students should look at the extraordinary range of scholarly, but accessible, web sites that have sprung up all over the Internet. (They can start from Cornucopia noted below.) Cornell possesses a wealth of resources to introduce students to every corner of the field.
Many students feel bound to choose their majors with an eye to future careers and earning potential. While this concentration can add strong interdisciplinary breadth to many majors (e.g., classics, all modern languages, history, music, philosophy), and is excellent preparation for graduate study in a medieval field, science majors thrive in it too. The program provides encouragement, guidance, and an avenue for intelligent appreciation of an important part of all our pasts.
Undergraduates who wish to undertake an independent major or concentration in medieval studies should consult the director of the program, 259 Goldwin Smith Hall, 2558545, medievalst@cornell.edu.
The undergraduate concentration in medieval studies shall consist of five medieval courses (at the 200 level or above) in at least two different disciplines, of which up to two may also count toward the major.

## Medieval Languages

Medieval texts (like all others) become most lively and informafive when read in the original, and Cornell fortunately offers many courses for students interested in acquiring the relevant skills: Medieval Latin, Old English, Middle English, Gothic, Old Saxon, Old High German, Middle High German, Old NorseIcelandic, Old Irish, Middle Welsh, Old Occitan (Provençal), Old French, Medieval Spanish, Medieval Italian, Old Russian, Old Church Slavonic, Classical Arabic, Medieval Hebrew, Classical Chinese, and Classical Japanese.
Some medieval languages require study of a modern language (e.g., French for Old Occitan and Old French) or a classical language (Classical Latin for Medieval Latin) as background. Students interested in a concentration in Medieval Studies should begin the study of a medieval language as early as possible, so that they may be able to study texts in the original before they graduate. Students are advised to consult the sponsoring departments for information about the prerequisites for various medieval languages.

## Graduate Study

The Medieval Studies Program offers both an interdisciplinary and a literary comparative Ph . D. in medieval studies. Disciplinary fields of concentration offered within the Field of medieval studies are medieval archaeology, medieval history, medieval history of art, medieval literature, medieval music, medieval philology and linguistics, and medieval philosophy. Information about the graduate program in medieval studies is available from the field coordinator (medievalst@cornell.edu), and at Cornucopia, the program's web site (www.arts.cornell.edu/medieval).

## Medieval Studies Courses: Graduate and Undergraduate

Courses in various aspects of medieval studies are offered every year in several cooperating departments, including Art History, Asian Studies, Classics, Comparative Literature, English, German Studies, History, Linguistics Music, Near Eastern Studies, Philosophy, Romance Studies, Russian Literature, and by the Society for, the Humanities. For
descriptions, please see the home department.
The current year's offerings are:
ART H 250(2350) Introduction to Art History: Islamic Art and Culture (also NES 247[2647])
Fall. 4 credits. C. Robinson.
ART H 255(2355) Introduction to Art History: Medieval Art and Culture Spring. 4 credits. C. Robinson.

ART H 415/615(4315/6315) Visualizing the Sacred in Late Medieval lberia: Images and Image Devotion in a Multi-Confessional Landscape (also NES 423/623[4523/6523]]
Fall. 4 credits. C. Robinson.
CHLIT 213-214(2213-2214) Introduction to Classical Chinese
213, fall; 214, spring. 3 credits each
semester. D. X. Warner (fall); staff (spring)
CHLIT 300(3300) Reading from the Early Masters
Spring. 4 credits. R. McNeal
CHLIT 418(4418) Marvels and Wonders: Medieval Chinese Narrative Tales
Fall. 4 credits. D. X. Warner.
CLASS 330(3750) Introduction to Dendrochronology (also ART H 309[3250], ARKEO 309[3090]]
Fall. 4 credits. S. Manning.
CLASS 446[4646) Platonism (also PHIL 413[4130])
Spring. 4 credits. C. Brittain.
CLASS 642(7742) Research Methods in Archaeology
Spring. 4 credits. S. Manning.
ENGL 213(2130) Cultures of the Middle Ages
Spring. 4 credits. A. Galloway.
ENGL 308(3080) Icelandic Family Sagas Fall. 4 credits. T. Hill.

ENGL 311/611(3110/6110) Old English Fall. 4 credits. S. Zacher.

ENGL 319(3190) Chaucer
Fall. 4 credits. A. Galloway.
ENGL 321(3210) Spencer and Malory Fall. 4 credits. C. Kaske

ENGL 457/650(4570/6500) Constructing the Book, Reconstructing the Text Fall. 4 credits. C. Ruff.

ENGL 619(6190) Chaucer and Gower Fall. 4 credits. A. Galloway.
FREN 221(2210) Introduction to Textual Analysis
Fall. 3 credits. C. Howie.
FREN 353(3530) Monsters A-X (Aristotle-X-flles) (also COM L 353[3530], FGSS 353[3530])
Fall. 4 credits. K. Long.

FREN 404(4040) Troubadours and Heretics (also COM L 404[4040]) Fall. 4 credits. R. Klein
FREN 442(4420) Sex in French Spring. 4 credits. C. Howie.
HIST 190(1900) East Asia to 1800 Spring. 4 credits. T. J. Hinrichs.

HIST 262(2620) The Middle Ages: Introduction and Sampler Spring. 4 credits. P. Hyams.

HIST 369(3690) The Mistory of Florence in the Time of the Republic 12501530 (also ITAL 369[3690])
Spring. 4 credits. J. Najemy.
HIST 408(4080) Feudalism and Chivalry: Secular Culture in Medieval France, 1000-1300
Fall. 4 credits. P. Hyams.
HIST 468(4680) Love and Sex in the Italian Renalssance |also ITAL 468[4680])
Spring. 4 credits. J. Najemy.
HIST 491/692(4910/6920) Approaches to Medieval Vlolence Fall. 4 credits. O. Falk.
HIST 496(4961) Chinese Medicine and Healing
Spring. 4 credits. T. J. Hinrichs.
HIST 664(6641) Medieval Poverty Fall. 4 credits. P. Hyams.

ITAL 445/645(4450/6450) Decameron Fall. 4 credits. M. Migiel.
JPLIT 406(4406) Introduction to Classical Japanese
Fall. 4 credits. K. Selden.
JPLIT 408(4408) Readings in Classical Japanese
Spring. 4 credits. K. Selden.
LATIN 205(2201) Latin Prose Fall. 3 credits. C. Brittain.

LING 217(2217) History of English Language to $\mathbf{1 3 0 0}$ Fall. 4 credits. W. Harbert.

LING 238(2238) Introduction to Welsh Fall. 3 credits. W. Harbert.

LING 308(3308) Readings in Celtic Languages Fall. 2 credits. W. Harbert

LING 315-316(3315-3316) Old Norse 315 , fall; 316 , spring. 4 credits each semester. K. Jonatansdottir.

LING 649(6649) Structure of Old English (also ENGL 617[6170])
Fall. 4 credits. W. Harbert.
LING 661(6661) Old Church Slavonic (also RUSSA 601[6601]) Fall. 4 credits. W. Browne.

LING 662(6662) Old Russian Texts (also RUSSA 602[6602])
Spring. 4 credits. W. Browne.
LING 671(6671) Comparative Slavic Linguistics (also RUSSA 651[6651]) Fall. 4 credits. W. Browne.
MEDVL 413/613(4103/6103) Survey of Medieval Latin Literature [also LATIN 413/613[4213/7213]] Fall. 4 credits. C. Ruff.

The Survey of Medieval Latin introduces students to the special linguistic features of post-classical Latin and the characteristic genres and modes of discourse of learned culture in the Middle Ages. Readings will focus on three or four periods or milieux and will include examples of scriptural, exegetical, encyclopedic, narrative, epistolary,
hagiographical, and homiletic texts. Before enrolling in this course, students should have significant reading experience and a solid grasp of Latin grammar and should be prepared to undertake the study of advanced topics in Latin syntax, lexicon, and prosody. We will introduce the scansion of both quantitative and accentual verse for those who have no prior experience with Latin versification. Students will have the opportunity to workshop with the class Latin texts relevant to their own research.

## [MEDVL 777(7770) Medieval Studies Proseminar

4 credits. Next offered 2008-2009.]
MEDVL 801(8010) Directed StudyIndividual
Fall and spring. Up to 4 credits. Staff.
MEDVL 802(8020) Directed Study-Group
Fall and spring. Up to 4 credits. Staff.
NES 133-134(1211-1212) Introduction to Qur'anic and Classical Arabic [also RELST 133-134[1211-1212])
133, fall; 134 , spring. 4 credits each semester. M. Younes (fall); staff (spring).
NES 251(2651) Holy War, Crusade, and Jihad in Judaism, Christianity, and Islam (also COM L 231[2310], HIST 269[2691], JWST/RELST 251[2651])
Fall. 3 credits. R. Brann.
NES 256(2556) Introduction to the Qur'an (also RELST 256[2556])
Fall. 3 credits. S. Toorawa.
NES 440/640(4640/6640) Maimonides and Ibn Rushd (also SPAN 438[4380])
Spring. 4 credits. R. Brann.
NES 460(4560) Theory and Method in Near Eastern Studies
Spring. 4 credits. K. Haines-Eitzen.
NES 620(6112) Readings in Medieval Hebrew Poetry and Prose (also JWST 620[6112])
Fall. 4 credits. R. Brann.
PHIL 315(3150) Medieval Philosophy Fall. 4 credits. S. MacDonald.
PHIL 410(4100) Latin Philosophical Texts (also LATIN 61 2[7212], RELST 410[4100])
Fall and spring. Variable credit.
S. MacDonald and C. Brittain.

PHIL 612(6120) Seminar In Medieval Philosophy
Spring. 4 credits. S. MacDonald.
S HUM 404(4040) The Task of the Cleric (also SPAN 404[4040])
Fall. 4 credits. S. Pinet.
SPAN 217(2170) Early Hispanic Modernities: Readings in Medieval and Early Modern Iberian and Spanish-American Literatures (also LAT A 217[2170])
Fall. 4 credits. M. Spofford.

## MODERN EUROPEAN STUDIES CONCENTRATION

## Sydney Van Morgan, coordinator

Students from any college may choose an undergraduate concentration in modern European studies to complement any major. The purpose of the concentration is to provide a coherent structure for students with an interest in interdisciplinary study in the field of European studies.
The concentration has three tracks: European politics, economics, and society; modern European history; and European culture. The requirements for the concentration are:

1. Competence in at least one modern European language, Romance, Germanic, or Slavic (i.e., completion of a 300 -level course or equivalent with a grade of at least B-, or demonstration of an advanced level of competence in an oral proficiency interview test where available).
2. Completion of two out of four interdisciplinary core courses:

## ANTHR 450(4852) Europe: Post-Socialist Capitalism

Fall. 4 credits. J. Rigi.

## GOVT/SOC 341(3410) Modern European Society and Politics

Spring. 4 credits. S. Van Morgan.
COM L 364(3640) The European Novel Spring. 4 credits. A. François.

## NES 438(4738) Imagining the

 MediterraneanFall. 4 credits. G. Holst-Warhaft. Under certain conditions, students may be permitted to substitute other courses for those listed above.
3. Completion of one course in modern (post-1789) European history.
4. Two additional courses in any of the three areas, which may include a senior seminar ( 400 level).
a. Courses in European and comparative politics, anthropology, sociology, feminist, gender and sexuality (FGSS) studies, and related courses in the School of Hotel Administration, the College of Agriculture and Life Sciences, and the School of Industrial and Labor Relations.
b. Courses in modern European history (post-1789).
c. Courses in (post-1789) English and European literatures, comparative literature, semiotics, FGSS, fine arts, architecture, music, philosophy, and film and theatre arts.
Only two courses may be used to satisfy requirements for both the major and the concentration. Courses satisfying the breadth and distribution requirements in the College of Arts and Sciences, however, may be applied to the concentration. Students interested in completing a research project under the European Summer Research Program may apply for the Wood Fellowship in their junior year. All concentrators are encouraged to participate in the Language House Program, the Model European Union program (GOVT $431 / 432$ ), and study abroad. Courses taken abroad may be applied to the concentration if they are approved for Cornell credit.

Departmental advisors include D. Greenwood (anthropology); C. Otto (architecture); S. Christopherson (CRP); G. Fields (economics); D. Schwarz (English); A. Schwarz (German studies); S. Tarrow (government/ sociology); J. Weiss (history); C. Rosen (linguistics); N. Zaslaw (music); T. Camphell (romance studies); G. Shapiro (Russian literature); D. Bathrick (theatre, film, dance); L. Abel (classics); D. Brown (developmental sociology).
For a complete list of relevant courses and seminars, and any further information, contact Sydney Van Morgan, coordinator of the Modern European Studies Concentration, at the Institute for European Studies, 120 Uris Hall, 255-7592, sydney.morgan@cornell.edu, www.einaudi.cornell.edu/Europe.

## MUSIC

R. Harris-Warrick, chair; R. Sierra, director of undergraduate studies ( 338 Lincoln Hall, 2553663); J. Peraino, director of graduate studies (116 Lincoln Hall, 255-5059); X. Bjerken, B. Boettcher, K. Ernste, A. Groos, J. HainesEitzen, M. Hatch, C. Johnston Turner, J. Kellock, C. Kim, J. Lin, P. Merrill, S. Pond,
A. Richards, S. Stucky, K. Taavola, S. Tucker,
J. Webster, M. Yampolsky, D. Yearsley,
N. Zaslaw. Emeritus: M. Bilson, J. Hsu,
K. Husa, S. Monosoff, R. Palmer, D. Rosen,
T. Sokol, M. Stith

Office: 255-4097
Web site: www.arts.cornell.edu/music/

## Musical Performance and Concerts

Musical performance is an integral part of Cornell's cultural life and an essential part of its undergraduate academic programs in music. The department encourages music making through its offerings in individual instruction and through musical organizations and ensembles that are directed and trained by members of the faculty. Students from all colleges and departments of the university join with music majors in all of these ensembles:
Vocal ensembles
Chamber Singers
Chorale
Chorus
Glee Club
Sage Chapel Choir
World Music Choir
Instrumental ensembles
Chamber Music Ensembles
Chamber Orchestra
Symphony Orchestra
Jazz Ensembles
Jazz Combos
Chamber Winds
Wind Ensemble
Wind Symphony
Gamelan
Middle Eastern Music Ensemble
World Drum and Dance Ensemble
Steel Band
Information about requirements, rehearsal hours, and conditions for academic credit can be found in the following listings for the Department of Music. Announcements of auditions are posted during registration each fall semester and, where appropriate, each spring semester as well.

The university is also home to many studentrun musical organizations not affiliated with the Department of Music, including the Big Red Marching Band and Big Red Pep Band, the Cornell Savoyards, and several a cappella groups. Information is available directly from each group.
The Department of Music and the Faculty Committee on Music sponsor more than 100 formal and informal concerts eąch year by Cornell's ensembles, faculty, and students and by distinguished visiting artists. The great majority of these concerts are free and open to the public. Lectures and concerts are listed at www.arts.cornell.edu./music/. Additional information is available through the events office (255-4760).

## Nonmajors

In addition to its performing, instructional, and concert activities, the department offers numerous courses for nonmajors, many of which carry no prerequisites and presuppose no previous formal training in music. Consult the following course listings, and for further information consult Professor R. Sierra, director of undergraduate studies (255-3663), or the department office, 101 Lincoln Hall (255-4097).

## The Major

The major carries the study of music to an advanced level through the integration of performance, music theory, and music history. It is designed to accommodate both students who are oriented toward eventual graduate or professional work in music and those who wish to take a more general approach, often in conjunction with a major in another department.
Students contemplating a major in music should arrange for placement examinations and advising in the department as early as possible, preferably during the freshman orientation period. Information is available from the director of undergraduate studies. Prerequisites for admission to the major are completion of MUSIC 152 and 154, preferably by the end of the freshman year (the sophomore year is possible, but reduces flexibility), with an overall grade of B- or better in each course. In consultation with the director of undergraduate studies, students are expected to have chosen an advisor from among the department faculty before acceptance into the major; admission to the major is decided by the faculty as a whole. Students majoring in music then design their course of study with their advisor.
Music majors must complete the Core Curriculum plus at least two electives. The Core Curriculum serves as the basis for focus in specific areas, such as composition, performance, jazz studies, vernacular music, Western art music, or Asian music. Students may, however, choose electives that reflect a more broadly based study. Those intending to pursue graduate study or professional work in music are advised to take further courses in addition to the two required electives.
The Core Curriculum consists of courses:

1. in music theory: MUSIC 251, 252, 253, 254
2. in music history: MUSIC 207, 208, 300, 400
3. in performance: four semesters of participation in a musical organization or ensemble sponsored by the department of music (MUSIC 331 through 346 and 421 through 448)
Electives: at least 8 credits from the following:
4. in music theory: courses among the theory listings at the 300 level or above
5. in music history: MUSIC 374 through 399 , 401 and above.
6. in performance: MUSIC 322 or 323

Honors. The honors program in music is intended to provide special distinction for the department's ablest undergraduate majors. Qualified students are invited to become candidates by the faculty early in the second semester of their junior year. As soon as possible thereafter, the student forms a committee of three or more faculty members to guide and evaluate the honors work. In their senior year, candidates enroll in MUSIC 401-402 with the chair of the honors committee as instructor. Candidates are encouraged to formulate programs that allow them to demonstrate their musical and scholarly abilities, culminating in an honors thesis, composition, or recital, to be presented not later than April 1 of the senior year. A comprehensive examination administered by the candidate's committee is held not later than April 20. The level of honors conferred is based primarily on the candidate's performance in the honors program, and secondarily on the candidate's overall record in departmental courses and activities.

## Computing if the Arts Undergraduate Concentration

A concentration in Computing in the Arts with an emphasis on music is available both to music majors and to students majoring in other subjects. For more information, contact the department office, 101 Lincoln Hall (2554097).

## Distribution Requirement

College of Arts and Sciences students may apply either one or two music department courses toward the distribution requirement in Literature and the Arts (LA) or Cultural Analysis (CA), as noted. Neither first-year seminars nor advanced placement credit count toward this requirement.
If one music course is counted for distribution, it must carry at least 3 credits, and it may not be in musical performance (MUSIC 321,322 , or 323 ) or in organizations and ensembles (MUSIC 331 through 348 and 421 through 448). Any two of the 2 -credit courses MUSIC 361, 362, 363 count as one course for this purpose.
If two music courses are counted for distribution in LA, they must total at least 6 credits, and at least one of the courses must be academic (as described in the preceding paragraph), not performance-oriented. The second "course," however, may comprise either up to 4 credits earned in performance (MUSIC 321, 322, or 323) or up to 4 credits earned in organizations and ensembles (MUSIC 331 through 348 and 421 through 448), but not both.

## Facilities

Music Library. The Sidney Cox Library of Music and Dance in Lincoln Hall has an excellent collection containing approximately 143,000 periodicals, books, scores, and parts; 64,000 sound and video recordings; and 7,800 microforms, including early printed and manuscript sources. Its depth and breadth serve the needs of a wide variety of users on the campus and its computer lab (designed specifically for music uses), listening, and video viewing facilities are open to all members of the Cornell community, Highlights of the research collection include early opera libretti and scores, 18 th-century keyboard and chamber music, 17 th- and 18 th-century books on music, and an archival collection of American popular song from 1850 to 1950. In addition, the Carl A. Kroch Library houses, in the Division of Rare and Manuscript
Collections, a collection of musical
manuscripts and early printed books on music.
Concert Halls. The Department of Music sponsors more than 100 concerts annually Cornell's principal concert halls are Bailey Hall Auditorium (about 1,400 seats), Sage Chapel (about 800), and Barnes Hall Auditorium (about 280).

## Rehearsal Spaces and Practice Rooms.

Departmental ensembles rehearse primarily in Lincoln Hall, Barnes Hall, and Sage Chapel. Twenty-six studios in Lincoln Hall are available for individual practice by pianists, vocalists, and instrumentalists who are members of the Cornell community. Of these, eight have grand pianos, six have upright pianos, and two have percussion instruments.
To guarantee practice times, a practice room must be reserved. Practice-room fees for a room with a grand piano are $\$ 100$ per semester for up to 12 hours weekly. A $\$ 20$ cash cleposit must be made for a key to the grand piano practice rooms, which is refunded upon return of the key. Fees for a room with either an upright piano or percussion instruments are $\$ 75$ per semester for up to 12 hours weekly, and fees for a room withour a piano are $\$ 35$ per semester for up to 12 hours weekly. The fee for use of the pipe organs is $\$ 60$ per semester for up to 12 hours weekly. All fees are nonrefundable and are not prorated.
Instruments. Six concert grand pianos are available for performances in the various concert halls, plus the following historical keyboard instruments: a modern copy of an 18th-century fortepiano by Johann Andreas Stein, a new fortepiano by Robert McNulty, a Broadwood grand piano from 1827, an 1824 Conrad Graf fortepiano replica, an 1868 Erard grand, one Dowd and one Hubbard harpsichord, and a Challis clavichord. Four distinctive organs are available to qualified individuals for lessons and practice: a twomanual mechanical-action instrument (1972) in Anabel Taylor Chapel; a small Italian organ (1746) and a three-manual symphonic organ (1941), both in Sage Chapel; and an 18thcentury German-style chamber organ (2003) in Barnes Hall. In addition, the Music
Department owns a limited number of string, wind, and percussion instruments that may be rented by members of the department's ensembles.
Electroacoustic Music Center. The center comprises five studios each outfitted with
state-of-the-art hardware and software for music recording, creation, and experimentation. Macintosh, Windows, and Linux operating systems are represented. A variety of MII)I and OSC (Open Sound Control) devices are available for live and interactive performance interests. Available software includes commercial, open source, and custom-designed in-house applications Max/MSP, PD(PureData), Steinberg Cubase, Ardour, Reason, Csound, Peak, Audacity, and Abelton Live are represented alongside dozens of moclular utilities. Video editing and DVD creation are available using Final Cut Pro and Cinelerra. The primary studio hosts a multichannel hardware/software environment (up to 12 channels) for ambisonic mixing, 5.1 surround mixing and mastering, and "vbap" localization techniques. In addition, the Center operates its own server with space for clata backup, weh site hosting, and remote login
Digital Music Program Workstations
Cornell Electroacoustic Music Center (CEMC): The center is mate up of three project studios, a primary multichannel studio used by graduate students and for small group teaching, a 14 -workstation teaching lab, as well as an experimental space for research and testing of new ideas and technologies. In addition, several remote performance and recording solutions are available from handheld to solid state. A combination of commercial and open source software solutions service an array of student and faculty interests including live performance (interactive, improvisational, networked, etc), sound manipulation and sound spatialization, multimedia, intelligent music systems (adaptive and algorithmic composition), music notation, and high-quality recording. The facilities are state-of-the-art and can accommodate almost any creative inclination. A sampling of available software tools include Max/MSP, Purel)ata, Supercollider, Csound (with Scorell or Cecilia), Alselton Live, Reason, Cubase, JACK (and associated tools), Ardour, ambisonic tools (vspace, ICST tools, etc), and many others. CEMC supports a combination of software platforms (Mac, Linux. Windows) and emphasizes crossplatform and/or platform-neutral software tools.

## Introductory Courses

MUSIC 100(1100) Elements of Musical Notation
Fall or spring, weeks 2-5. 1 credit
Corequisite: any 3-credit music course and permission of instructor. Staff.
This four-week course, given at the beginning of each semester, fulfills the requirement of basic pitch, rhythm, and score-reading skills needed for some introductory courses and 200-level courses with prerequisites.

## MUSIC 101(1311) Popular Music in

 America: A Historical Survey (also AM ST 105[1131]) \# (LA-AS)Spring. 3 credits, S. Pond.
This is a general introduction course addressing the broad range of styles described as popular music, as it has developed in the Linited States. The course interrogates the label of "popular" music as distinct from "art" music and examines such musical elements as rhythm, tone color, melody, harmony, form, lyrics. performance style, and dance, as a reflection of culture and aesthetics. Beyond
this, the addresses cultural and cross-musical influences in the development of popular musics from the 1840 s to recent years. Underlying the course is an interest in ways that popular music expresses culture: how popular music affects, and is affected by, ethnicity, class, nationalism, art, gender, and genre. Two lectures and required discussion section per week.

## [MUSIC 102(1101) Fundamentals of

 Music (LA-AS)Fall. 3 credits. No previous training in music required. Next offered 2008-2009. M. Hatch.

An introduction to the theory of music from around the world: the structures of melody and rhythm (pulse, meter, scales, modes, texture, timbre, harmony, form) and the influences of audiences, music technologies (including instruments), reasons, and contexts for music making on instrumental and vocal music from classical, folk, traditional, and popular music of Asia, Africa, Europe, and the Americas. Extensive listening and video examples.]
[MUSIC 103(1301) Introduction to World Music I: Africa and the Americas (also LSP 100[1301]) © (CA-AS)
Spring. 3 credits. No previous training in music required. Next offered 2008-2009. S. Pond.

Exploration of folk, popular, and traditional musical genres of the Western Hemisphere, particularly the African diaspora. Examines both the elements of musical styles and the features of society that influence music.
Listening assignments are major components of the course.]
[MUSIC 104/1302) Introduction to World Music Il: Asia (also ASIAN 192[1192]) (CA-AS)
Spring. 3 credits. No previous training in music required. Next offered 2008-2009. M. Hatch.

An exploration of folk, popular, and traditional musical genres from South, Southeast, and East Asia.]

## MUSIC 105(1105) Introduction to Music

 Theory (LA-AS)Fall. 3 credits. Recommended: experience in reading music; students may take MUSIC 100 concurrently. Staff.
An elementary, self-contained introduction to the theory of Western art music, emphasizing fundamental musical techniques, theoretical concepts, and their application. Intervals, scales, triads; basic concepts of tonality and form; extensive listening to music in various styles; analysis of representative works of Bach, Mozart, Beethoven, and Debussy.

## MUSIC 107(1201) Hildegard to Handel * (LA-AS)

Fall. 3 credits. Prerequisite: ability to read music or concurrent enrollment in MUSIC 100. Staff.

The main trends in Western music from the beginnings of musical staff notation in the 10th century to the mid-18th century. Emphasis on the evolution of musical styles and the changing social, cultural, economic, and political conditions that gave rise to those styles. Topics include Gregorian chant, organum, Ars nova, Renaissance polyphony, the invention of opera, and the rise of instrumental music.

MUSIC 108(1202) Mozart to Minimalism * (LA-AS)
Spring. 3 credits. Prerequisite: ability to read music or concurrent enrollment in MUSIC 100. N. Zaslaw.
A survey of Western art music in many genres from the second half of the 18 th century to the present. Composers whose music is studied include Haydn, Mozart, Beethoven, Schubert, Schumann, Mendelssohn, Berlioz, Chopin, Wagner, Verdi, Liszt, Brahms, Mahler, Debussy, Strauss, Stravinsky, Bartok, Ives, Webern, Messiaen, Copland, Bernstein, Stucky, and Sierra.

## Music Theory

Students contemplating the music major are strongly advised to take MUSIC 151, 152, 153, and 154 in the freshman year; in any case MUSIC 152 and 154 must be completed no later than the end of the sophomore year.

## MUSIC 151(2101) Tonal Theory I (LA-AS)

Fall. 3 credits. Prerequisites: admission by departmental placement exam and concurrent enrollment in or previous credit for MUSIC 153, or equivalent. Intended for students expecting to major in music and other qualified students. K. Taavola.
Detailed study of the fundamental elements of modal and tonal music: rhythm, scales, intervals, triads; melodic principles and twopart counterpoint; diatonic harmony and fourpart voice leading; basic formal structures. Study engages different repertories, including Western art music as well as non-Western and popular traditions.

## MUSIC 152(2102) Tonal Theory II (LA-AS)

Spring. 3 credits. Prerequisites: MUSIC 151 and 153 or equivalent; concurrent enrollment in or previous credit for MUSIC 154. Intended for students expecting to major in music and other qualified students. A grade of B- or better in MUSIC 152 is required for admission to music major. Staff.
Continued study of voice leading and harmonic progression, including diatonic modulation; analysis of binary and ternary forms as well as jazz, blues, and pop phrase models.

## MUSIC 153(2103) Musicianship I

Fall. 2 credits. Pre- or corequisite: MUSIC 151. Intended for students expecting to major in music and other qualified students. K. Taavola.
Sight singing: diatonic melodies in treble, alto, and bass clefs. Keyboard: scales, triads, seventh chords, short diatonic chord progressions. Dictation: intervals, rhythms; short diatonic melodies; short diatonic chorale phrases. Score reading: two parts using treble, alto, and bass clefs. Musical terms: tempo markings and rhythmic terminology.
MUSIC 154(2104) Musicianship II
Spring. 2 credits. Pre- or corequisite:
MUSIC 152. Intended for students expecting to major in music and other qualified students. A grade of B - or better in MUSIC 154, and failure in no individual musicianship components of the course, are required for admission to the music major. Staff.
Sight singing: longer melodies in three clefs, including diatonic modulation. Keyboard: diatonic chord progressions and sequences. Dictation: intervals, rhythms; longer melodies; chorale phrases with diatonic modulation.

Score reading: three parts using treble, alto, and bass clefs. Transcriptions of pop, jazz, and other genres.
MUSIC 204(2111) Physics of Musical Sound (also PHYS 204[1204]) (PBS)
Spring. 3 credits. K. Selby.
For description, see PHYS 204

## MUSIC 251(3101) Tonal Theory III

 (LA-AS)Fall. 3 credits. Prerequisites: MUSIC 152 and 154 or equivalent. Corequisite: MUSIC 253. R. Sierra.

Continuation of diatonic and introduction to chromatic harmony; species counterpoint; composition in small forms.

## MUSIC 252(3102) Tonal Theory IV

 (LA-AS)Spring. 3 credits. Prerequisites: MUSIC 251 and 253 or equivalent. Corequisite: MUSIC 254. K. Taavola

Study of and composition in larger forms, including sonata form; systematic study of chromatic harmony, voice-leading, and modulation; composition in chromatic style.

## MUSIC 253(3103) Musicianship III

Fall. 2 credits. Pre- or corequisite: MUSIC 251. R. Sierra.

Sight singing: melodies with chromaticism in treble, alto, tenor, and bass clefs. Keyboard: diatonic modulation, chromatic chords. Dictation: melodies with modulation; chorale phrases with secondary dominants and other chromatic chords. Score reading: four parts using treble, alto, tenor, and bass clefs. Musical terms: orchestral ranges, terms, clefs, and transpositions.

## MUSIC 254(3104) Musicianship IV

Spring. 2 credits. Pre- or corequisite: MUSIC 252. K. Taavola.
Sight singing: melodies in four clefs, including modality and chromatic modulation. Keyboard: chromatic sequences, chromatic modulations, improvised modulations employing diatonic pivot chords. Dictation: intervals, rhythms, short melodies, and short, diatonic chorale phrases. Score reading: four parts, including transposing instruments. Musical terms: other terms in French, German, and Italian

## MUSIC 361(3111) Jazz Improvisation I

Fall. 2 credits. Prerequisite: MUSIC 151 or permission of instructor. P. Merrill An introduction to fundamental jazz theory, technique, and applied skills. Class work and assignments emphasize basic nomenclature, diatonic seventh chords, upper-structures, modes of the major scale, linear style and melodic motive development, feel, cycles, and phrase construction. Performance, composition, analysis, listening, and ear training.
[MUSIC 362(3112) Jazz Impravisation II
Fall. 2 credits. Prerequisite: MUSIC 361.
Next offered 2008-2009. P. Merrill. Continuation of jazz theory, technique, and applied skills. Class work and assignments emphasize altered upper-structures and dominants, chords and modes of melodic minor, harmonic minor, substitutions, and advanced rhythmic development. Performance, composition, analysis, transcribing, listening, and ear training.]
music 383(3113) Jazz Improvisation III
Spring. 2 credits. Prerequisite: MUSIC 362 or permission of instructor. P. Merrill Continuation of jazz theory, technique, and applied skills. Class work and assignments emphasize Coltrane and post Coltrane harmony, pentatonics, advanced rhythmic development, static-structures, odd-meters, triad pairs, triadic development, augmented vocabulary, composite scales, and an introduction to playing "free." Performance, composition, analysis, listening, and ear training.

## [MUSIC 365(3115) Jazz Piano

Spring. 2 credits. Prerequisite: MUSIC 151 or permission of instructor. Next offered 2008-2009. P. Merrill.
An introduction to jazz keyboard technique, including reading chord symbols, comping, bass line construction, and soloing. This course is intended primarily for jazz instrumentalists with little or no keyboard experience and pianists with little or no jazz experience.]

## [MUSIC 451(4101) Counterpoint *

 (LA-AS)Spring. 4 credits. Prerequisite: MUSIC 251 or permission of instructor. Next offered 2008-2009. S. Stucky.]

## [MUsIC 452(4102) Toples In Music Analysls (also Music 602[6101]) (LA-AS)

Spring. 4 credits. Prerequisite: MUSIC 251 or permission of instructor. Next offered 2009-2010. J. Webster.]
[MUsIC 453(4111) Composition (LA-AS) Fall. 4 credits. Prerequisite: MUSIC 152 or permission of instructor. Next offered 2008-2009. R. Sierra.
Study of music composition through the use of traditional forms such as variation and sonata. The student is required to write original pieces for solo and chamber ensembles.]

## MUSIC 454(4112) Composition In Recent

 Styles (LA-AS)Spring. 4 credits. Prerequisite: MUSIC 251 or permission of instructor. Next offered 2008-2009. R. Sierra.
Through analysis, repertoire from the 20th and 21st centuries furnishes models for composing new works. Styles and techniques are drawn from composers such as Debussy, Bartôk, Schoenberg, Copland, and Adams.
Recommended (though not required) before taking MUSIC 454; when both 453 and 454 are offered, they form a full-year sequence.]

## MUsIC 455(4121) Conducting (La-A8)

Fall. 4 credits. Prerequisite: MUSIC 251 or permission of instructor. C. Kim.
Covers fundamentals of score reading, score analysis, rehearsal procedures, and conducting technique; instrumental and choral contexts.

## MUSIC 456(4122) Orchestration (LA-AS)

 Spring. 4 credits. Prerequisite: MUSIC 251 or permission of instructor. Next offered 2008-2009. R. Sierra.Orchestration based on 19th- and 20th-century models.

## MUSIC 457(4103) Topics In Post-Tonal Theory and Analysis (also MUSIC 654[7102]) (LA-AS)

Spring. 4 credits. Prerequisites: MUSIC 252 and 254. K. Taavola.
Topic: Set theory and 12 -tone theory.
[MUSIC 458(4123) Jazz Arranging (LA-AS)
Fall. 4 credits. Prerequisite: MUSIC 358 or permission of instructor. Next offered 2009-2010. P. Merrill.
A survey of jazz arranging techniques for the big band.]

## Music in History and Culture

[MUSIC 221(1312) Mistory of Rock Music (also AM ST 223[1312]) (LA-AS)
Spring. 3 credits. No previous training in
music required. Next offered 2008-2009.
J. Peraino.

This course examines the development and cultural significance of rock music from its origins in blues, gospel, and Tin Pan Alley up to present-day genres of alternative rock and hip hop.]

## MUSIC 222(1313) A Survey of Jazz (also AM ST 222[1313]) (LA-AS) <br> Fall. 3 credits. S. Pond.

'This course addresses jazz from two perspectives: the various sounds of jazz, as well as the historical streams-musical and cultural-that have contributed to its development.
MUSIC 245(1341) Gamelan In Indonesian History and Cultures (also ASIAN 245[2245], VISsT 244[2744]) 랑 (LA-AS)
Fall or spring. 3 credits. Prerequisite: permission of instructor. No previous knowledge of musical notation or performance experience necessary. Fall, staff; spring, M. Hatch.
An introduction to Indonesia through its art. Elementary techniques of performance on the Indonesian gamelan; a general introduction to Indonesian history and cultures, and the sociocultural contexts for the arts there. Several short papers and one longer research report are required. Instruction by visiting Balinese musician.

## MUSIC 261(2221) Bach and Handel \# (LA-AS)

Spring. 3 credits. Prerequisite: any 3-credit music course or permission of instructor. Staff.
Born within hundred miles of one another in 1685, Bach and Handel followed very different and but equally exciting paths through the musical geography of the 18 th century. The course will look in depth at selected masterpieces of each composer, investigating these works' significance in the 18 th century and in our own time, and will ask why the keyboard music, operas, and passions of these celebrated contemporaries should still matter to us.

## [MUSIC 262(2222) Maydn and Mozart \#

## (LA-AS)

Fall. 3 credits. Prerequisite: any 3 -credit music course or permission of instructor. Next offered 2009-2010. J. Webster.
A survey of the lives, works, and historical roles of Joseph Haydn and Wolfgang Amadeus Mozart. Attention is also given to developments in musical style 1750-1800, and to intellectual currents such as the Enlightenment, the aesthetics of music, and changing concepts of genius.]

## [MUSIC 263(2223) Beethoven \# (LA-AS)

Spring. 3 credits. Prerequisite: any 3-credit music course or permission of instructor. Next offered 2008-2009. J. Webster.]
[MUSIC 264(2231) Musical Romantics * (LA-AS)
Spring. 3 credits. Prerequisite: ability to read music or concurrent enrollment in MUSIC 100. Next offered 2009-2010. D. Rosen.]

## [MUSIC 272(2245) Words and Music (also

 GERST 342[3420]) (LA-AS)Spring. 4 credits. Next offered 2008-2009. A. Groos.

For description, see GERST 342.]

## MUSIC 274(2241) Opera (also THETR

 273[2730]) ( (LA-AS)Fall. 3 credits. D. Rosen and A. Groos. An introduction to opera through the examination of six major works of the operatic repertory by such composers as Mozart, Donizetti, Verdi, Wagner, Bizet, Puccini, and Britten, with attention to the interaction of the words, music, and visual elements. With two of the operas studied, we will trace the development of the opera libretto from the play or short story upon which it is based. We will compare and critique some of the different productions available on video and DVD recordings and, for Verdi's Rigoletto and possibly Mozart's Don Giovanni in live performance (these works are being performed by the Syracuse Opera and Tri-Cities Opera, respectively).

## [Music 276(2242) The Orchestra and Its

 Musle (LA-AS)Spring. 3 credits. Prerequisite: any 3-credit music course or permission of instructor.
Next offered 2008-2009. N. Zaslaw.
The music of, and the social structures
supporting, large instrumental ensembles in the Western world from the 16th century to the present.]

## [MUSIC 277(2243) The Plano and lits Music (LA-AS)

Fall or spring. 3 credits. Prerequisite: one semester of music theory (MUSIC 105, equivalent course, or equivalent experience) or permission of instructors. Next offered 2008-2009. Staff.]

## MUSIC 407(4511) Early Dance (also DANCE 407[4399])

Fall. 1 credit. R. Harris-Warrick.
Topic: Baroque Dance. This course introduces students to the basic movement vocabulary of dances from Western Europe during the Renaissance and Barque periods. It will consider the contexts in which such dances were performed, the music that accompanied the dance, the issues of how to reconstruct dances from the past. It is primarily a movement course, but will involve some reading from primary sources. Semesters that focus on Renaissance dance will include dances such as the pavanne, galliard, branles, allemande, balli, and canarie from France, England, and Italy. Semesters that focus on the Baroque will teach the dance style that emanated from France and became the basis for ballet, including dances such as the minuet, courante, bouree, and sarabande. The course may be repeated for credit.
MUSIC 408(4512) Muslc and
Choreography (also DANCE
324[3530]) (LA-AS)
Spring. 3 credits. Actendance at dance
concerts and music concerts required.
A. Fogelsanger.

For description, see DANCE 324.

## Wusic History Courses for Majors and Qualified Nonmajors

MUSIC 207(3201) Survey of Western Music I \# (LA-AS)
Spring. 4 credits. Pre- or corequisite:
MUSIC 151/153 or permission of instructor. N. Zaslaw.

A survey of Western music and its social contexts from the beginning of notation (circa 900 ) to 1700 . Topics include sacred chant, secular song, polyphony, madrigals, early opera, and the development of independent instrumental music. The course emphasizes listening and comprehension of genres and styles, and is intended for music majors and qualified nonmajors.

## MUSIC 208(3202) Survey of Western Music II " (LA-AS)

Fall. 4 credits. Pre- or corequisite: MUSIC
152/154 or permission of instructor.
K. Taavola.

A survey of Western music and its social contexts from 1700 to the present. Topics include the decline of church music, the rise of public concerts and opera, the evolution of the orchestra, and modernism in the 20th century. The course, which emphasizes listening and comprehension of genres and styles, is intended for music majors and qualified nonmajors.

## MUSIC 300(3211) Proseminar in Musicology (LA-AS)

Spring. 4 credits. D. Yearsley.
Introduction to methods in musicology, including historiography, criticism, approaches to vernacular and non-western musics, and gender studies.

## [Music 374(3222) Opera and Culture

 (also GERST 374[3740]) " (LA-AS)Spring. 4 credits. Prerequisite: any 3 -credit music course or proficiency in German or Italian. Next offered 2008-2009. A. Groos.
For description, see GERST 374.]
[Music 381(3231) Topics in Western Art Music to 1750 \#
Fall. 4 credits. Prerequisite: MUSIC 152 or permission of instructor. Next offered 2008-2009. Staff.]
[MUSIC 382(3232) Topics in Western Art Music 1750-Present
Spring. 4 credits. Prerequisite: MUSIC 152 or permission of instructor. Next offered 2008-2009. Staff.]
Music 386|3301), Toplcs in Popular Music and Jazz
Spring. 4 credits. Prerequisite: MUSIC
$152 / 154$ or permission of instructor.
S. Pond.

This course addresses various topics, centering on the post-World War II years to ca. 1970. Topic for 2008: Post-WWII Rhythm-andBlues to Funk. The course investigates the various sounds of black popular music in the post-World War II period, its antecedents, interactions with other popular musics, and influences on later developments, principally to the mid-1970s. The historical focus engages with R\&B in terms of ethnicity, class, nationalism, racial politics, aesthetics, gender, and genre. The course is both reading and listening based, with opportunities for musicmaking as well. The course entails a significant writing component. It partially satisfies the Music major history requirement Since the course addresses different topics in
different years, it may be taken more than once for credit.
[MUSIC 390(3242) Culture of the Renaissance II (also COM L 362[3620], ENQL 325[3250], HIST 364[3640], ART H 351[3420], FREN 362[3620]) \# (CA-AS)
Fall. 4 credits. Next offered 2008-2009. K. Long and W. J. Kennedy.]

MUSIC 398-399/3901) Independent Study in Music History
398, fall; 399, spring. 4 credits. Prerequisite: MUSIC 152 and permission of instructor. Staff.
Advanced study of various topics in music history. Students enrolling in MUSIC 398-399 participate in, but do not register for, an approved 200 -level music history course and, in addition, pursue independent research and writing projects. See also "Independent Study and Honors."

## MUSIC 400(4211) Senior Seminar

Fall. 4 credits. B. Boutwell.
This seminar concerns a number of prominent trends linking musical composition and visual art within the U.S. since World War II. Through an explicitly interdisciplinary approach, students will explore aesthetic and ideological affinities among movements in these fields while studying specific works by leading American composers and artists. Readings will be drawn from the literature of musicology, art-history, and social theory.
MUSIC 404(4301) Introduction to Ethnomusicology (also MUSIC 604[6301]) (SBA-AS)
Fall. 4 credits. S. Pond.
For description, see MUSIC 604
[MUSIC 410(4222) Music and Monstrous Imaginings ( (LA-AS)
Fall. 4 credits. Next offered 2008-2009. A. Richards.]

## [MUSIC 411(2244) The Organ in Western

 Culture \# (LA-AS)Fall. 4 credits. Prerequisite: permission of instructor. Next offered 2009-2010. A. Richards and D. Yearsley.]

MUSIC 418(4181) Psychology of Music (also PSYCH 418[4180]) (KCM-AS)
Fall. 3 or 4 credits, depending on whether student elects to do an independent project. C. L. Krumhansl.

## For description, see PSYCH 418

## [MUSIC 492(4231) Muslc and Queer Identity (CA-AS)

Spring. 4 credits. Next offered 2008-2009. J. Peraino.]

## [MUsic 493(4232) Women and Music

 (CA-AS)Spring. 4 credits. Next offered 2008-2009. J. Peraino.]

## Digital Music and Mew Media

MUSIC 120(1421) Introduction to Digital Music (LA-AS)
Fall. 3 credits. Limited enrollment.
Prerequisite: permission of instructor.
Recommended: ability to read music.
K. Ernste.

A composition-based introduction to computer hardware and software for digital sound and digital media. Fundamentals of MIDI
sequencing and other techniques for producing electroacoustic music. Each student creates several short compositions.

MUSIC 165(1465) Computing in the Arts (also CS/CIS/ENGRI 165[1610])
Fall. 3 credits. G. Bailey.
For description, see CS 165.
MUSIC 220(2421) Computers in Music Performance (LA-AS)
Spring. 3 credits. Limited enrollment. Prerequisite: permission of instructor. K. Ernste.

A course in live performance and real-time, interactive sound manipulation techniques both in concert and over networks. Students will work individually or in small groups toward realizing short pieces that utilize tools and ideas from the course. MUSIC 220 is appropriate as a continuation for those who have taken MUSIC 120 but is open to others by permission.
[MUSIC 320(3421) Scoring the Moving Image Using Dlgital Technology (LAAS)
Spring. 4 credits. Prerequisite: MUSIC 120
with grade of B or higher and MUSIC 251.
Next offered 2008-2009. K. Ernste.]
Music 355(3431) Sound Design and Digital Audio (also THETR/DANCE 368[3680]) (LA-AS)
Spring. 3 credits. W. Cross.
For description, see THETR 368.

## music 356(3441) Interactive

 Performance Technology (also DANCE 369[3690], THETR 369[3690]) (LA-AS)Fall. 4 credits. W. Cross and A. Fogelsanger. For description, see THETR 369.

## Independent Study and Honors

MUSIC 301-302(4901) Independent Study in Music
301, fall; 302, spring. Credit TBA
Prerequisite: departmental approval;
experience in proposed area of study. Staff.
See also MUSIC 398-399 under "Music in
History and Culture."
MUSIC 401-402(4911) Honers in Music
401, fall; 402, spring. 8 credits per year.
Prerequisite: senior honors candidates.
Staff.
See "Honors" under "The Major" at the beginning of the MUSIC listings.

## Musical Instruction

Cornell faculty members offer individual instruction in voice, organ, harpsichord, piano and fortepiano, violin, viola, cello, and some brass and woodwind instruments to those students advanced enough to do college-level work in these instruments. Lessons are available by audition only. They may be taken either without credit (MUSIC 321) or with credit (MUSIC 322 or 323). All students studying with Cornell faculty members must enroll in MUSIC 321,322 , or 323 Other instruments may sometimes be studied for credit outside Cornell, but also by audition only (see MUSIC 321-323, Secs 9 and 10).
Lessons for beginners. The Department of Music can recommend outside teachers for those who wish to begin studying voice or an instrument. No credit is available for beginning instruction.
Auditions. Auditions are held at the beginning of each semester for lessons for advanced students. Contact the music
department office in 101 Lincoln Hall for information.
Earning academic credit for lessons. For every 4 credits earned in MUSIC 322, the student must have earned, or currently be earning, at least 3 credits in another music course (excluding MUSIC 322, 323, 331-348, or $421-448$ ). These 3 credits must be earned before, or simultaneously with, the first 2 credits in 322; they cannot be applied retroactively. Only music courses taught at Cornell (or approved transfer courses from other colleges or universities) may be used to satisfy this requirement.
Fees. The fee for a one-hour lesson (or two half-hour lessons) weekly, with or without credit, is $\$ 480$ per semester. For a one-half hour lesson weekly (without credit only), the fee is $\$ 240$. All fees are nonrefundable once lessons begin, even if the course is subsequently dropped.
Lessons taken outside Cornell. Under certain conditions, advanced students may earn credit for lessons taken outside Cornell. An audition is required, and no credit can be granted for beginning instruction. For further information, read the description of MUSIC 322-323, Secs 9 and 10, and contact the Music Department office.
Scholarships. Music majors receive a scholarship of up to $\$ 480$ per semester. Any member of department-sponsored ensembles may, with the permission of the director of the ensemble, receive a partial scholarship to help defray the cost of the lessons. All scholarships are intended only for lessons in the student's primary performing medium. Scholarship forms, available in the music department office, are to be returned to the office within the first three weeks of classes.

## . MUSIC 321-322-323(3501-3502-

4501) Individual Instruction

Prerequisite: advanced students only; may register after successful audition with instructor, or, if student needs to study outside Cornell, with appropriate faculty sponsor. Students should contact instructor or music department office for audition information. Students may register for these courses in successive semesters or years.
MUSIC 321(3501)
Fall or spring. 0 credits each semester. See section listing below for instructors.
Students who pass a successful audition to study with Cornell faculty, but either wish to take only a half-hour lesson per week or cannot receive credit for lessons, must enroll in MUSIC 321. S-U grades only.
MUSIC 322(3502)
Fall or spring. 2 credits each semester. See section listing below for instructors.
Students earn 2 credits each semester for one-hour lesson (or two half-hour lessons) per week, accompanied by appropriate practice schedule. Credit may be earned only in conjunction with academic music courses; see "Earning Academic Credit for Lessons," above. Letter grades only.

## MUSIC 323(4501)

Fall or spring. 4 credits each semester. See section listing below for instructors. Open only to juniors and seniors majoring in music and graduate students in music.
The section numbers listed below apply to MUSIC 321, 322, or 323, depending on the instrument studied.

Sec 01 Voice. J. Kellock.
Sec 02 Organ. A. Richards and D. Yearsley.
Sec 03 Piano. X. Bjerken and Staff.
Sec 04 Harpsichord. A. Richards and D. Yearsley.

Sec 05 Violin or Viola. J. Lin.
Sec 06 Cello. J. Haines-Eitzen.
Sec 07 Brass. Staff.
Sec 08 Woodwinds. Staff.
Sec 09/Sec 10 Individual Instruction Outside Cornell.
All the standard orchestral and band instruments, keyboard instruments, guitar, and voice may, under certain conditions, be studied for credit with outside teachers. This course is available primarily for the study of instruments not taught at Cornell and when there is limited enrollment in MUSIC 321 and 322. Prior approval and audition by a member of the faculty in the department are required, and credit may be earned only as described under "Earning academic credit for lessons," above. Additionally, a departmental petition must be completed by the end of the third week of classes. For information and a list of approved teachers, consult the department office, 101 Lincoln Hall.

## Musical Organizations and Ensembles

Students may participate in musical organizations and ensembles throughout the year. Permission of the instructor is required, and admission is by audition only (usually at the beginning of each semester), except that the Sage Chapel Choir, World Music Choir, and the Cornell Gamelan Ensemble are open to all students without prior audition. Registration is permitted in two of these courses simultaneously and students may register in successive years, but no student may earn more than 8 credits in these courses. Membership in these musical organizations and ensembles is also open to qualified students who wish to participate without earning credit.
MUSIC 331-332(3601) Sage Chapel Choir 331, fall; 332, spring. Either 0 credits, S-U, or 1 credit, letter grade, each semester. No audition required. Staff.
Open to all students and members of the university. Varied and demanding repertoire.
The Sage Chapel Choir sings regularly in the Sunday service of worship, which is broadcast on 870 WHCU-AM radio, and on special occasions throughout the year.

## MUSIC 333-334(3602) Chorus

333, fall; 334, spring. Either 0 credits, S-U, or 1 credit, letter grade, each semester.
Prerequisite: successful audition. S. Tucker. A treble-voice chorus specializing in music for women's voices and in mixed-voice repertory.

## MUSIC 335-336(3603) Clee Club

335, fall; 336, spring. Either 0 credits, S-U, or 1 credit, letter grade, each semester.
Prerequisite: successful audition. S. Tucker. A male-voice chorus specializing in music for men's voices and in mixed-voice repertory.

## MUSIC 338(3631) Wind Symphony

Fall and spring. Either 0 credits, S-U, or 1 credit, letter grade, each semester. Prerequisite: successful audition. C. Johnston Turner and Staff.

MUSIC 339-340(3615) Jazz Ensemble II
339, fall; 340, spring. Either 0 credits, S-U, or 1 credit, letter grade, each semester. Prerequisite: successful audition. P. Merrill. Study and performance of classic and contemporary big band literature. Rehearsal once a week with one to two performances a semester.

## MUSIC 342(3633) Wind Ensemble

Fall and spring. Either 0 credits, S-U, or 1 credit, letter grade, each semester. Prerequisite: successful audition. C. Johnston Turner.

## MUSIC 343-344(3621) Symphony Orchestra

343, fall; 344, spring. Either 0 credits, S-U, or 1 credit, letter grade, each semester.
Prerequisite: successful audition. C. Kim. Study and performance of a broad repertoire of orchestral works from Beethoven to the present.
MUSIC 345-346(2541) Advanced Instruction-Gamelan
345 , fall; 346, spring. Either 0 credits, S-U, or 1 credit, letter grade, each semester. Limited enrollment. Prerequisite: permission of instructor. Fall, staff; spring, M. Hatch. Concentrated instruction for students in advanced techniques of performance on the Indonesian gamelan.
music 348(3611) World Music Choir Spring. Either 0 credits, $S$-U, or 1 credit, letter grade, each semester. Prerequisite: permission of instructor. S. Tucker. A mixed-voice chorus whose repertoire is drawn from Africa, Central America, South America, the Caribbean, Eastern Europe, and Asia Music reading skills are not necessary, but a good ear is essential.

## MUSIC 421-422(4621) Chamber

 Orchestra421, fall; 422, spring. Either 0 credits, S-U, or 1 credit, letter grade, each semester. Prerequisite: successful audition. C. Kim. Study and performance of chamber orchestra works from the baroque period to the present.

## MUSIC 423-424(4616) Jazz Combos

423, fall; 424, spring. Either 0 credits, S-U, or 1 credit, letter grade, each semester. Prerequisite: successful audition. P. Merrill. Study and performance of classic and contemporary small-group jazz.
MUSIC 431-432(3614) Middle Eastern Music Ensemble (also NES 447-448[4947-4948])
431, fall; 432, spring. Either 0 credits, S-U, or 1 credit, letter grade, each semester. Prerequisite: permission of instructor. M. Hatch

Performance of diverse musical traditions from the Middle East. Instruction in individual instruments (oud, ney, kanoun, and percussion) and group rehearsals, culminating in one or two performances per semester. Songs are taught in several languages, with the assistance of local language and diction teachers.
MUSIC 433-434(3613) Steel Band 433, fall; 434, spring. Either 0 credits, S-U, or 1 credit, letter grade, each semester. Prerequisite: background in music and permission of instructor. Staff.
This performance group specializes in traditional Caribbean steel drum repertoire and beyond.

MUSIC 435-436(3612) World Drum and Dance Ensemble
435, fall; 436, spring. Either 0 credits, S-U, or 1 credit, letter grade, each semester. Prerequisite: permission of instructor. Staff. This group specializes in traditional music from West Africa and the Caribbean.
Drumming techniques, song, and dance styles are incorporated into each semester's activities. No previous percussion experience is necessary.

## MUSIC 437-438(4631) Chamber Winds

 437, fall; 438, spring. Either 0 credits, S-U, or 1 credit, letter grade, each semester. Corequisites: enrollment in one course drawn from MUSIC 333-344, 439, 440, and permission of instructor. Coordinator: C. Johnston Turner.Flexible instrumentation ensembles perform original woodwind, brass, and percussion music. The ensembles participate in Wind Symphony and Wind Ensemble concerts in addition to several chamber concerts throughout the year.
MUSIC 439-440(4615) Jazz Ensemble I 439, fall; 440, spring. Either 0 credits, S-U, or 1 credit, letter grade, each semester.
Prerequisite: successful audition. P. Merrill. Study and performance of classic and contemporary big band literature. Rehearsals twice a week with two to four performances per semester.

## MUSIC 441-442(4651) Chamber Music

 Ensembles441, fall; 442, spring. Either 0 credits, S-U, or 1 credit, letter grade, each semester. Prerequisite: successful audition. Coordinator: Staff.
Study and performance of chamber music works from duos to octets, for pianists, string, and wind players.

## MUSIC 443-444(3604) Chorale

443, fall; 444, spring. Either 0 credits, S-U, or 1 credit, letter grade, each semester.
Prerequisite: successful audition. Staff.
Study and performance of selected choral music for mixed voices.

## MUSIC 445-446(4641) Gamelan

 Ensemble445, fall; 446, spring. Either 0 credits, S-U, or 1 credit, letter grade, each semester.
Prerequisite: permission of instructor. Fall, staff; spring, M. Hatch.
Advanced performance on the Indonesian gamelan. Tape recordings of gamelan and elementary number notation are provided. Some instruction by visiting Balinese artist.
MUSIC 447-448(4601) Chamber Singers 447, fall; 448, spring. Either 0 credits, S-U, or 1 credit, letter grade, each semester.
Prerequisite: successful audition. Staff.
A mixed-voice chamber choir specializing in
Renaissance and 20th-century music.

## Graduate Courses

Open to qualified undergraduates by permission of instructor.
MUSIC 601(6201) Introduction to Bibliography and Research
Fall. 4 credits. B. Boettcher.
This course explores the nature of the discipline and introduces the many types of bibliographic tools, both printed and electronic, needed to pursue research in music.
[MUSIC 602(6101) Analytical Technique (also MUSIC 4524102])
Spring. 4 credits. Next offered 2009-2010. J. Webster.]
[MUSIC 603(6202) Editorial Practice Spring. 4 credits. Next offered 2008-2009. Staff.]

## MUSIC 604(6301) Introduction to Ethnomusicology

Fall. 4 credits. Also open to graduate students in anthropology, linguistics, psychology, sociology, Africana, Asian Studies, and other cognate fields by permission of instructor. S. Pond.
This course surveys a spectrum of issues central to the field, including but not limited to issues of identity and representation, methods of musical and cultural analysis, area studies, applied ethnomusicology, and intersections with other fields in the

## humanities and social sciences.

## MUSIC 620(6420) Techniques for

 Computer MusicFall. 4 credits. Prerequisite: permission of instructor. K. Ernste.
Intended principally for doctoral students in music composition but open to others by permission. The course presents a practical overview of both classical and state-of-the-art techniques for computer music including digital synthesis, signal processing and sound manipulation, analysis and resynthesis, spatialization, and real-time and/or interactive applications. Students will produce several short studio projects as well as one larger piece to be presented in a final concert.

## [MUSIC 653(7101) Topics in Tonal Theory and Analysis

Spring. 4 credits. Next offered 2008-2009. J. Webster.]

MUSIC 654(7102) Topics in Post-Tonal Theory and Analysis (also MUSIC 457[4103])
Spring. 4 credits. K. Taavola.
Topic: Set theory and 12-tone theory.

## [MUSIC 656(7121) Advanced Orchestral

 TechniqueFall. 4 credits. Next offered 2008-2009. S. Stucky.

Intensive analysis of orchestral scores by such composers as Debussy, Ravel, Stravinsky, Dutilleux, Boulez, Lutoslawski, Berio, Takemitsu, Druckman, Knussen, Benjamin, Adams, Saariaho, and Lindberg, with an emphasis on modern instrumental techniques, gestures, and textures. Composition exercises aimed at harnessing these discoveries for the students' own work. Designed for doctoral candidates in composition; others admitted by permission only.]
MUSIC 657-658(7111) Composition
657, fall; 658 , spring. 4 credits each
semester. R. Sierra and S. Stucky.

## MUSIC 659(6421) Electroacoustic Composition

Spring. 4 credits. Prerequisite: permission of instructor. K. Ernste.
Intended principally for doctoral students in music composition but open to others by permission. Depending on students'
backgrounds and interests, the course may include an introduction to electroacoustic composing, an emphasis on aesthetic issues associated with the field, interactivity and realtime performance, software instrument design, performance controllers, or other topics.

## [MUSIC 677(7221) Mozart: His Life,

 Works, and TimesFall. 4 credits. Next offered 2008-2009.
N. Zaslaw.]

## [MUSIC 680(7301] Topics in Ethnomusicology

Spring. 4 credits. Also open to graduate students in anthropology, linguistics, psychology, sociology, Africana Studies, Asian Studies, and other cognate fields by permission of instructor. Next offered 2008-2009. S. Pond.]
[MUSIC 681(7201) Seminar In Medioval Music
Fall. 4 credits. Next offered 2008-2009.
J. Peraino.]

## [MUSIC 683(7231) Music and Postmodern

 Critical TheoryFall. 4 credits. Next offered 2008-2009. J. Peraino.]

## Music 684(7202) Seminar in

 Renalssance MusicSpring. 4 credits. R. Harris-Warrick.
Topic: Josquin Desprez.

## mUsic 686(7203) Seminar in Baroque Music

Fall. 4 credits. D. Yearsley.
Topic: The Wondrous Machine: The Organ in Musical Culture. Once at the center of the ' humanistic study of music, not to mention keyboard culture, the organ now occupies a shadowy position on the fringes of musical scholarship and performance. This course will examine the changing status of the organ from the late Gothic to the present, and will argue that our understanding of the European musical past and present is fundamentally enriched by a host of musical, social, cultural, and technological perspectives on the King of Instruments.
[MUSIC 688(7204) Sominar in Classical Music
Spring. 4 credits. Next offered 2008-2009. J. Webster.

## Topic: Haydn.]

MUSIC 689(7205) Seminar in Music of the Romantic Era
Spring. 4 credits. Next offered 2009-2010. Staff.]

MUSIC 690(7206) Seminar In Music of the 20th Century
Spring. 4 credits. B. Boutwell.
Topic: The American Experimental Tradition from Ives to Zorn. Mostly broadly, this course will survey the modernist/post-modernist lineage in 20th-century American art music; more specifically, it will chart the genealogy of what's become known in recent musicological literature as the "American experimental tradition," in the process parsing the definition of that label and assessing its usefulness as an historical category. Readings from period sources, from the body of recent music scholarship, and from social theory will complement musical analysis and an abundance of listening assignments.

## MUSIC 691-692(7501) Historical Performance

691, fall; 692, spring. 4 credits each
semester. Prerequisite: permission of instructor. M. Bilson.
Lessons on the major instrument with supplementary study and research on related subjects.

## MUSIC 693(7211) Seminar in Performance Practice

Fall. 4 credits. N. Zaslaw. Topic: Controversies in the study and implementation of historical performance practices. Prerequisite: Reading knowledge of at least one western European language

## [MUSIC 695(7311) Gender, Sexuality, and Glam Rock (also FGSS 695[6950])

Fall. 4 credits. Next offered 2009-2010. J. Peraino.

This course will examine the history and legacy of glam rock, with a focus on the use of music, fashion, and performance as a means of exploring non-normative gender and sexual identities. Key artists and groups include the Velvet Underground, Marc Bolan David Bowie, Roxy Music, Queen, Iggy pop, and the New York Dolls. Cinematic treatments of glam rock, such as Velvet Goldmine and Hedwig and the Angry Inch, will also be considered. Readings will be drawn from cultural, gender and sexuality studies as well as musicology.]

## MUSIC 697-698(7901) Independent Study

 and Research697, fall; 698, spring. Credit TBA. Staff.

## [MUSIC 785(7103) History of Music

 TheoryFall. 4 credits. Next offered 2009-2010. K. Taavola.

Issues and problems in the history of music theory; topics vary from year to year. Topic for 2006: Esoteric French and German theory in the 19 th and 20 th centuries.]

MUSIC 787(7232) History and Criticism Spring. 4 credits. A. Richards.
Topic: Music, performance, visual culture: critical intersections, 1750-1800.

Music 901-902(9901) Thesis Research
901, fall; 902, spring. Up to 6 credits each semester, TBA. S-U grades only.
Limited to doctoral students in music who have passed the Admission to Candidacy exam.

## NEAR EASTERN STUDIES

K. Haines-Eitzen, chair, L. Allred, I. Begen, R. Brann (director of graduate studies), R. Daneshvar, Z. Fahmy, A. Gadotti, I. Gocheleishvili, F. Hijazi, C. Monroe L. Monroe, D. I. Owen (director of Program of Jewish Studies); D. S. Powers, N. Scharf, S. Shoer, D. Starr (director of undergraduate studies), S. M. Toorawa, M. Younes, J. Zorn. Joint faculty: G. Holst-Warhaft, C. Robinson

## The Department

The Department of Near Eastern Studies (409 White Hall, 255-6275) offers courses in Near Eastern civilization including archaeology, history, religions, languages, and literatures These course offerings treat the Near East from the dawn of history to the present and emphasize methods of historical, cultural, and literary analysis. Students are encouraged to take an interdisciplinary approach to the religions and cultures of the region and their articulation during antique, late antique, medieval, and modern times. For more information, please visit www.arts.cornell.edu/ nes/.

## Distribution Requirements

Any two Near Eastern Studies history or archaeology courses at the 200,300 , or 400 level that form a reasonable sequence or combination satisfy the distribution requirement in the social sciences/history. Any two Near Eastern Studies civilization or literature courses at the 200,300 , or 400 level that form a reasonable sequence or combination satisfy the distribution requirement in the humanities. NES 197 or 251 plus any other Near Eastern Studies course will constitute a sequence to fulfill the distribution requirement in either social sciences/history or humanities, depending on the second course used in combination with 197 or 251. All 200- or 300 -level language courses may fulfill the humanities requirement.

## The Major

A major in Near Eastern Studies offers students the opportunity to explore the languages, literatures, cultures, religions, and history of the Near East/Middle East from antiquity to the modern day. The major is designed both to acquaint students broadly with the region and its cultures as well as to study a particular subfield in depth.

## Prarequisites

- The applicant for admission to the major in Near Eastern Studies must have completed at least two Near Eastern Studies content courses, one of which can be a language course. Students are strongly encouraged to enroll in language courses and/or NES 251 or 254 either before signing into the major or early on in their major.
- Prospective majors must meet with the director of undergraduate studies before submitting a major application.
- To qualify as a major, a cumulative grade average of C or better is required.


## Major Requirements

For students graduating in the Classes of 2006 or earlier, consult the department. The precise sequence and combination of courses chosen to fulfill the major is selected in consultation with the student's advisor. All majors must satisfy the following requirements (no course may be used to satisfy two requirements; S-U option not permitted):

1. Two years of one Near Eastern language or, in exceptional cases, one year of two Near Eastern languages
2. Nine 3- or 4-credit NES courses, which must include the following:
a. NES 251 Judaism, Christianity, and Islam or NES 254 Introduction to Near Eastern Civilizations
b. NES 460 Junior/Senior Proseminar: Theory and Method in Near Eastern Studies
c. Seven additional courses, of which three must fulfill temporal breadth, defined as: one course whbse chronological parameters fall within the period 3000 bCe to 600 CE , one course whose chronological parameters fall within the period 600 CE to 1800 CE , and one course whose chronological parameters fall between 1800 CE and the present. The following are examples (a
complete list may be obtained in the department office):

## 3000 bCE to 600 CE

NES 223 Introduction to the Hebrew Bible
NES 229 Introduction to the New
Testament
NES 244 Introduction to Ancient Judaism
NES 261 Ancient Seafaring
NES 266 Jerusalem through the Ages
NES 320 Women in the Hebrew Bible
NES 360 Ancient Iraq
NES 323 Reinventing Biblical Narrative
NES 394 Gender, Sexuality, and the Body in Early Christianity
600 ce to 1800 CE
NES 214 Qur'an and Commentary
NES 234 Muslims and Jews in
Confluence and Conflict
NES 256 Introduction to the Qur'an
NES 273 History of the Middle East: 13th to 18 th Centuries
NES 339 Islamic Spain
NES 351 Law, Society, and Culture in the Middle East
NES 418 Seminar in Islamic History
1800 ce to the present
NES 235 Jews and Arabs in Contact and Conflict: The Modern Period
NES 274 History of the Modern Middle East: 19th to 20th Centuries
NES 319 Crime and Conflict in the Modern Arabic Novel
NES 385 Middle Eastern Cities
NES 393 History of Jews and Christians in the Modern Middle East
NES 397 History of the Israeli-Palestinian Conflict

## NES 493 Cosmopolitan Alexandria

ii. A maximum of three of these seven
courses can be at the 200 level; a minimum of four must be at the 300 level or above.
iii. One of the 300-level or above courses must be a research seminar (courses are designated with (®) The following are examples (a complete list can be found in the department office):
339 Islamic Spain: Culture and Society @ \# (CA) ®
385 Middle Eastern Cities: History,
Society, and Culture @ \# (HA) ©
394 Gender, Sexuality, and the Body in Early Christianity \# (CA) (8)
427 New York, Paris, Baghdad: Poetry of the City) ${ }^{\circledR}$
457 Formation of Islamic Law @ \# (HA) ®
466 History of Israelite Religion @ (CA) ®
iv. Note: a maximum of two independent studies can be applied to the major; a maximum of two non-cross-listed courses may be applied to the major; a maximum of two courses may receive credit for more than one major; a maximum of 15
credits of relevant, departmentally approved course work taken overseas or at another university may be applied to the major.
For students graduating in the classes of 2006 or earlier, consult the department.
Honors. Candidates for the degree of Bachelor of Arts with honors in Near Eastern Studies must fulfill the requirements of the appropriate major study and enrol! in the honors course, NES 499, in the fall and spring semesters of their senior year. For admission to the honors program, candidates must have a cumulative average of $13+$ or better and have demonstrated superior performance overall in Near Eastern Studies courses. After consulting their major advisor, candidates should submit an outline of their proposed honors work to the department during the second semester of their junior year. The Near Eastern Studies main office has more specific guidelines for the honors thesis.
Study abroad. Near Eastern Studies majors may choose to study in the Near East during their junior year. There are various academic programs in the countries of the Near East that are recognized by the Department of Near Eastern Studies and that allow for the transfer of credit Archaeological fieldwork on Cornell-sponsored projects in the Near East may also qualify for course credit

## First-Year Writing Seminars

For descriptions, consult the John S. Knight Institute brochure for times, instructors, and descriptions.

## Language Courses

## Arabic

NES 111-112(1201-1202) Elementary Arabic I and II (also AS\&RC 111/112[1104/1105])
111, fall; 112, spring. 4 credits each semester. Limited to 18 students per section. Prerequisite: for NES 112, NES 111 or permission of instructor. M. Younes and staff.
Provides a thorough grounding in all language skills: listening, speaking, reading, and writing. It starts with spoken Arabic and gradually integrates Modern Standard Arabic in the form of listening and reading texts. Emphasis is on learning the language through using it in meaningful contexts. Students who successfully complete the two-semester sequence are able to (1) understand and actively participate in simple conversations involving basic practical and social situations (e.g., introductions, greetings, school, home and family, work, simple instructions; (2) read Arabic material of limited complexity and variety (e.g., simple narrative and descriptive texts, directions); (3) write notes and short letters describing an event or a personal experience. An important objective of the course is to familiarize students with basic facts about the geography, history, and culture of the Arab world.

NES 113-210(1203-2200) Intermediate Arabic I and II (also AS\&RC 113/212[1106/2101])
113, fall; 210 , spring. 4 credits each semester. NES $210 @$ satisfies Option 1. Limited to 18 students per section. Prerequisites: for NES 113, one year of Arabic or permission of instructor; for NES 210, NES 113 or permission of instructor. Letter grades recommended. M. Younes and staff.
Sequel to NES 111-112. Continued development of the four language skills through extensive use of graded materials on a wide variety of topics. Increased attention is given te) developing native-like pronunciation and graminatical accuracy, but the main focus is on developing comnunication skills. The student who successfully completes 210 is able to: (1) understand and express himself or herself in Arabic in situations beyond the basic needs; (2) read and comprehend written Arabic of average difficulty; (3) write a letter, a summary of a report, or a reading selection. An appreciation of Arabic literature and culture is sought through the use of authentic materials.

## NES 125(1205) Elementary Arabic for Native Speakers (also AS\&RC 125[1125])

Fall. 4 credits. M. Younes.
This course is designed for students who can speak and understand a spoken Arabic dialect (Egyptian, Lebanese, Syrian, Iraqi, etc.) but have little or no knowledge of written Aralbic known as Classical Arabic, Modern Standard Arabic, or Fusha. The focus of the course will be on developing the reading and writing skills through the use of graded, but challenging and interesting materials. As they develop their reading and writing skills, students will be learning about Arab history, society, and culture. Classroom activities will be conducted totally in Arabic. Students will not be expected or pressured to speak in Classical Arabic, but will use their own dialects for speaking purposes. However, one of the main goals of the course will be to help the development of the skills to communicate and understand Educated Spoken Arabic, a form of Arabic that is based on the spoken dialects but uses the educated vocabulary and structures of Fusha.

NES 133-134(1211-1212) Introduction to Qur'anic and Classical Arabic (also RELST 133-134[1211-1212]) (LA-AS)
133, fall; 134, spring. 4 credits each
semester M. Younes.
This course is designed for students who are interested in reading the Qur'an and other texts in Classical Arabic. By the end of the semester, students will have mastered many of the common grammatical structures and will have a good working vocalulary. This course, and its follow-up in the Spring. provide a firm foundation on which to build an advanced study of Classical Arabic. No prior knowledge of Arabic is required.

NES 311-312(3201-3202) Advanced Intermediate Arabic I and II (also AS\&RC 308-312[3100-3101]) 웅
 semester. NES 311 satisfies Option 1. Limited to 15 students. Prerequisite: for NES 311, NES 210 or permission of instructor; for NES 312, NES 311 or permission of instructor. Letter grades recommended. M. Younes and staff.

Introduces students to authentic, unedited Arabic language materials ranging from poems, short stories, and plays to newspaper articles dealing with social, political, and cultural issues. Emphasis is on developing fluency in oral expression through discussion of issues presented in the reading selections. There is more focus on the development of native-like pronunciation and accurate use of grammatical structures than on elementary and intermediate Arabic. A primary objective of the course is the development of writing skill through free composition exercises in topics of interest to individual students.

NES 414(4211) Readings in Arabic Literature \# @ (LA-AS)
Fall. 4 credits. Prerequisite: NES 312, a 400-
level Atabic course, or permission of instructor. S. M. Toorawa.
This course introduces students to Aralsic prose literature througli a close reacling of selections by classical, medieval, and moxdern writers. The emphasis is on grammar and vocabulary

## NES 419(4203) Readings in Arabic Poetry (LA-AS)

Fall. 4 credits. Prerequisite: NES 312, a $400-$ level NES Arabic course, or permission of instructor. S. M. Toorawa.
This course introduces students to Arabic poetry through a close reading of unedited selections by major Arab poets. The emphasis is on grammar.

## Hebrew

## NES 101-102(1101-1102) Elementary Modern Hebrew I and II (also JWST 101-102[1101-1102])

I01, fall; 102, spring. 4 credits each semester. Limited to 18 students per section. Prerequisite: for NES 102, NES 101 with grade of C - or better or permission of instructor. Letter gractes only. S. Shoer. Intended for beginners. Provides a thorough grounding in reacting, writing, grammar, oral comprehension, and speaking. Students who complete the course are able to function in basic situations in a Hebrew-speaking environment.

## NES 103(1103) Elementary Modern Hebrew III (also JWST 103[1103])

Fall. 4 credits each semester. Limited to 15 students per section. Prerequisite: NES 102 with grade of C - or better or permission of instructor. Letter grades recommended. N. Scharf.

Sequel to NES 101-102. Continued development of reading, writing, grammar, oral comprehension, and speaking skills.
NES 200(2100) Intermediate Modern Hebrew (also JWST 200[2100]) © Spring. 4 credits. Satisfies Option 1. Prereculisite: NES 103 with grade equivalent to C - or above or permission of instructor. Letter grades recommended. N. Scharf.

Introduces Hebrew literature and Israeli culture through the use of texts and audiovisual materials.

NES 301-302(3101-3102) Advanced Intermediate Modern Hebrew I and II (also JWST 301-302[3101-3102]) ©
301, fall; 302, spring 4 credits. Satisfies Option 1. Limited to 15 students Prerequisites: for 301 , NES 200 with grade of C - or above or permission of instructor; for 302, NES/JWST 301. N. Scharf. Advanced study of the Hebrew language both orally and through the analysis of mostly unedited texts of social, political, and cultural relevance, with less emphasis on the study of grammar. Students are introduced to articles published in Israeli newspapers and magazines, works by authors, and movies Students develop composition and advanced writing skills by studying language structure, idioms, and various registers of style

NES 305(3105) Conversational Hebrew (also JWST 305[3105])
Spring. 2 credits. Limited to 15 students.
Prerequisite: NES 302, 400, or permission of instructor; non-native speakers only Letter grades recommended. N. Scharf. Intended to continue the development of all aspects of the language. Emphasis, however, is placed on speaking skills and understanding by using text material relevant to Israeli contemporary society. The instructor is sensitive to individual student needs.

## NES 401(4101) Modern Hebrew Literature (also JWST 401[4101]) 융 (LA-AS)

Spring. 4 credits. D. Starr
For description, see NES 401 under "NES Topics Courses."

## NES 420(4102) Biblical Hebrew ProseJudges (also JWST/RELST

 420[4102]) © \# (LA-AS)Spring. 4 credits. Satisfies Option 1. Prerequisite: one year of biblical or modern Hebrew. L. Monroe.
The biblical book of Joshua recounts miraculous stories of the Israelite conquest and settlement of the land of Canaan under the leadership of Joshua ben Nun. The details of these accounts have drawn the attention of biblical scholars and archaeologists alike, who are interested in questions of who the Israelites were, how they came to occupy the land of Canaan, and how they understood themselves in relation to their Canaanite neighbors. In this class we will read the book of Joshua in the original Hebrew, with a particular focus on how the language of the text illuminates the Israelites own evolving understanding of their origins and collective identity. Close attention will be paid to matters of grammar, syntax, and vocabulary in order to develop students' skills in reading biblical Hebrew prose and to enhance their understanding of the Hebrew language itself as a window on ancient Israelite thought. Students will be expected to utilize commentaries, biblical Hebrew grammars and lexicons in their preparation of assigned texts. Prior training in Hebrew is required.

## Hindi-Urdu

## NES 201-202(2201/2202) Intermediate Written Urdu (also URDU 201-202[2201-2202])

201, fall; 202, spring. 2 credits. Prerequisite: HINDI 102 or HINDI 110; and URDU 125 or permission of instructor. Letter grades only. S. Singh.
For description, see URDU 201-202.

## Persian

NES 115-116(1320-1321) Elementary Persian I and II
115 , fall; 116, spring. 4 credits each semester. Limited to 15 students.
I. Gocheleishvili.

Designed for students who want an effective and comprehensive approach to learning Persian that will enable them to progress in the language skills of speaking, listening, reading, and writing. At the completion of this course, students are prepared to deepen their comprehension of Persian through literature and the media.

## NES 119-219(1319-2319) Intermediate

 Persian I and II119 , fall; 219 , spring. 4 credits. NES $219 @$ satisfies Option 1. Prerequisite: one year (two semesters) elementary Persian or permission of instructor. I. Gocheleishvili A continuation of NES 115-116. Continued development of speaking, listening, reading, and writing skills.

## Turkish

## NES 117-118(1330-1331) Elementary

 Turkish I and II117, fall; 118, spring. 4 credits each semester. Limited to 15 students. I. Begen Intended for students with no experience in Turkish. The goal is to provide a thorough grounding in Turkish language with an emphasis on communication. Small class size provides intensive practice in speaking, writing, and listening/comprehension. The course is co-sponsored by the Institute for European Studies.

## Ancient Near Eastern Languages

## Akkadian

NES 333-334(3410-3411) Elementary Akkadlan I and II (also NES 633-634[6410-6411])
333, fall; 334, spring \# @ (LA-AS). 4 credits each semesrer. Prerequisite: for NES 334, NES 333 or permission of instructor. Recommended: knowledge of another Semitic language. A. Gadotti and L. Allred. Introduction to the Semitic language of the Akkadians and Babylonians of ancient Mesopotamia. Using the inductive method, students are rapidly introduced to the grammar and the cuneiform writing system of Akkadian through selected readings in the Code of Hammurabi, the Descent of Ishtar, and the Annals of Sennacherib. Secondary readings in comparative Semitic linguistics, the position of Akkadian in the family of Semitic languages and on the history and culture of Mesopotamia provide a background for study of the language.

## Topics Courses

## NES 123(1111) Introduction to Biblical Hebrew I (also JWST/RELST 123[1111]) <br> Fall. 3 credits. L. Monroe

This course is designed to introduce students to the language, grammar, and vocabulary of the Hebrew Bible/Old Testament. By the end of the semester students will be able to read and understand a number of biblical narrative passages. This course will benefit students interested in ancient Israel and the ancient

Near East. It will also permit students to read and understand the grammar of medieval and modern Hebrew. Emphasis will be placed on learning vocabulary in context so that students begin to understand the language of the Bible as a window on ancient Israelite religion, culture, and experience.

## NES 224(2624) Introduction to Hebrew Bible-Prophecy (also JWST/RELST 224[2624]) (LA-AS)

Fall. 3 credits. L. Monroe
The purpose of this course is to examine the phenomenon of prophecy in the religion of ancient Israel, as it is revealed through prophetic texts within the Hebrew Bible. We will seek to understand the social reality that underlies both the content and composition of these texts, and the relationship of the prophet to the Israelite institutions of the temple/cult and palace. We will implement literary critical, historical, sociological and anthropological approaches in an effort to reconstruct the development of Israelite prophecy from its earliest appearance in narrative sources to its alleged cessation during the Second Temple Period.

## NES 247(2747) Introduction to Art

 History: Islamic Art (also ART H 250[2350]) (HA-AS)Fall. 4 credits. C. Robinson.
For description, see ART H 250.
NES 251(2651) Moly War, Crusade, and Jihad in Judaism, Christianity, and Islam (also HIST 269[2691], JWST/ RELST 251[2651], COM L 231[2310]) \# © (HA-AS)
Fall. 3 credits. R. Brann Articulating and elaborating religious justifications for war is a cultural practice unique to the three monotheistic traditions and their respective textual communities. This notion and its practice have had profound historical consequences in the past that extend to and inform present-day global sociopolitical conflicts. The first part of this course will examine the origins of the concept of holy war, crusade and jihad and trace their cultural histories. The second part of the course will be devoted to discussing the ways in which contemporary discourses such as a "clash of civilizations," "the Evil Empire," "The Great Satan," and the "Axis of Evil" draw upon these respective cultural histories and explicitly or implicitly positing political conflict as a "battle for God."

## NES 256(2556) Introduction to the Quran (also JWST/RELST 256[2556]) \# © (CA-AS)

Fall. 3 credits. S. M. Toorawa In 7th-century Arabia, a merchant by the name of Muhammad shared with his followers the Book of God as revealed to him through the archangel Gabriel. That book has since become a source of spiritual guidance and law for over a billion people the world over. In this course, a literary, historical and religious introduction to that book, the Quran, we explore: the circumstances of the Quran's revelation (asbaab an-nuzuul); its written compilation (or redaction); its narrative structure; its major themes; its connections to and departures from the Hebrew Bible (Tawraat) and the New Testament (Injeel); Qur'anic commentary (tafseer); translation and the problems associated with it; the impact of the Qur an on political and religious thought; and the influence of the Qur an on literature.

NES 261(2661) Ships and SeafarlngIntroduction to Nautical Archaeology (also ARKEO 275[2661], JWST 261[2661]) \# (HA-AS)
Spring. 4 credits. C. Monroe
A survey of the history and development of ships and seafaring as revealed by shipwrecks, boat burials, texts, art, and other evidence The role of nautical technology and seafaring among the maritime peoples of the ancient Mediterranean world-Canaanites, Minoans, Mycenaeans, Phoenicians, Hebrews, Greeks, and Romans-as well as the riverine cultures of Mesopotamia and Egypt, is addressed. The survey stretches from the earliest evidence for Mediterranean seafaring around $10,000 \mathrm{BCE}$ to the first transatlantic voyages in the 15 th century, including Arab, Viking, and European explorers, and the birth of modern capitalism in the Italian Maritime Republics. Along the way, economics, war, exploration, cult, life at sea, and colonization are discussed

## NES 263(2663) Introduction to Biblical History and Archaeology (also JWST/ ARKEO/RELST 263[2663]) (HA-AS)

Fall. 3 credits. J. Zorn
There are no prerequisites for this class. A survey of the principal historical and archaeological developments in Canaan/Israel from the Neolithic period (ca. 9000 BCE ) to the Babylonian Exile ( 586 BCE ), with a focus on the origins and evolution of the Israelite people. Includes an introduction to archaeological and historical methodologies utilized in the reconstruction of ancient cultures in the area, as well as the basic bibliography of the field. Emphasis will be placed on the use of archaeological and historical data for the understanding of some major problems in Israelite history and archaeology. Topics to be covered include: the Neolithic Revolution, the rise of the Canaanite city states, the dating of the cultural milieu of the Patriarchs, the question of the Israelite conquest, and the role of the Philistines. There will be weekly lectures on aspects of daily life, such as food production, metallurgy and Israelite religion. Recommended for students planning to participate in excavations in Israel.

## NES 268(2668) Ancient Egyptian Civilization (also ARKEO/JWST 268[2668]) \# (HA-AS)

Spring. 3 credits. C. Monroe
The course surveys the history and culture of pharaonic Egypt from its prehistoric origins down to the early first millennium BCE. Within a chronological framework, the following themes or topics will be considered: the development of the Egyptian state (monarchy, administration, ideology); social organization (class, gender and family, slavery); economic factors; empire and international relations.

## NES 272(2672) Imperialism and the History of the Modern Middle East (also JWST 272[2672])

Spring. 3 credits. Z. Fahmy.
This introductory course examines the historical impact that western imperialism and anti-colonial resistance had on the shaping of society, culture and politics in the modern Middle East. Through tracing the dynamics of Middle Eastern responses to European dominance, we hope to better understand the history of the region.

NES 274(2674) History of the Modern Middle East: 19th-20th Centuries (also JWST 274[2674], GOVT 274[2747], HIST 276[2674] (HA-AS)
Fall. 3 credits. Z. Fahmy
This course examines major trends in the evolution of the Middle East in the modern era. Focusing on the 19th and 20th centuries, we will consider Middle East history with an emphasis on four themes: imperialism, nationalism, modernization, and Islam. Readings will be supplemented with translated primary sources, which will form the backbone of class discussions.

## NES 275(2675) The Religions of Ancient lsrael (also JWST/RELST 275[2675], ARKEO 276[2675]) (HA-AS)

Spring. 3 credits. J. Zorn.
A casual reading of the Hebrew Bible might suggest that the Iron Age Israelites were normative monotheists, with occasional deviations. However, a religion approaching society-wide, true monotheism began to emerge only with the return from the Babylonian Exile, after 539 BC . Before that, Israelite religious beliefs and practices were much more complex and their society anything but strictly monotheistic. This class, through the use of archaeological and epigraphic data and a closer reading of the Biblical text, will explore topics like: temple worship, private religion, religion of women, cult prostitution, burial practices and beliefs about the afterlife, the role of prophets, the roles of "foreign" gods like Baal, Asherah, and Tammuz, human sacrifice, and more.
NES 293(2793) Middle Eastern Cinema (also JWST 291[2793], FILM/COM L 293[2930], VISST 293[2193]) © (LA-AS)
Fall. 4 credits. D. Starr.
We frequently see representations of "Middle Easterners" in the American media, whether on the news, or in TV dramas and film. But there are far fewer opportunities to see how the media from the Middle East represent their own cultures. Students in this course view films from the Arab world, including North Africa and the Eastern Mediterranean, as well as from Iran and Israel. The films range from musical comedies, to dramas, to experimental genres. Readings provide background on the particular cultural and historical contexts in which the films are produced and familiarize students with techniques for critically interpreting visual media. Films are screened on Mondays at 7:30 p.m. and also are available on reserve
NES 303(3703) Cosmopolitan Alexandria (also NES 603[6703])
Spring. 4 credits. D. Starr
Alexandria, the Egyptian port city, has a long history of rich cultural interaction. In this course we will examine literary and artistic representations of modern Alexandria which have played an important role in creating, disseminating and immortalizing the city as a cosmopolis. Readings and discussions will interrogate the relationship between the city's cosmopolitan character and its colonial history. Texts may include works by: E. M. Forster, Constantin Cavafy, Lawrence Durrell, Fausta Cialente, Edwar al-Kharrat, Ibrahim Abdel Meguid, André Aciman, and Harry Tsalas. We will also discuss Youssef Chahine's semi-autobiographical Alexandria films.

## NES 309(3709) Modern Arabic Drama

 Spring. 4 credits. S. M. Toorawa. An introduction to the richness of Arabic drama in the 20th century. We will use our readings (silent and performed) and discussions to broach such topics as Arabic theatre's antecedents, its relationship to the cinema. the influence of the West, the role of religion, and the avant-garde. All texts in English translation.
## NES 320(3720) Women in Ancient Israel (also RELST/JWST 320[3270]) Spring. 4 credits. L. Monroe.

NES 350(3850) Middle Eastern Politics (also GOVT 331[3313])
Spring. 4 credits. D. Patel.
For description, see GOVT 331
NES 365(3665) Ancient Iraq II (also JWST/ARKEO 365[3665]) (HA-AS)
Fall. 4 credits. D. I. Owen
An introduction to the history, culture, literature, and archaeology of \$yroMesopotamia from the emergence of the Babylonians around 2000 BCE through the Persian period, which was brought to an end by the conquest of Alexander the Great in 331 BCE. The inter-relationships between the various political entities during this long period, the Amorites, Hittites, Hurrians, Syrians, and Elamites (Iranians), will be emphasized

## NES 392(3792) The Discovery of

 Modernity in Iranian LiteratureSpring. 4 credits. R. Daneshvar. Contemporary Persian literature in English translation. No prior knowledge of Persian needed. The focus of the course is on the writing of two authors who essentially founded modern Iranian literature: Sadehg Hedayat and Jamalzadeh. Hedayat, who began publishing in the 1920 s, is considered the first modern Iranian author. His celebrated novel The Blind Owl has been translated into many languages. Although each of the men wrote a novel, their chief works were short stories, which will be the focus of this course. Both men were influenced by world literature and also by Iranian literature at the very beginning of the 20th century. In the early 1900s, a new kind of writing-a political prose-had emerged in Iran, by writers highly influenced by the French revolution and the literature of the French Enlightenment (Voltaire, Diderot, etc.). This political literature was in part born of the country's constitutional revolution. We will read some of this material as background to better understand the fiction of Hedayat and jamalzadeh.

## NES 400(4100) Advanced Readings in Modern Hebrew (also JWST 400[4100]) (LA-AS)

Fall. Satisfies Option 1. Limited to 15 students. Prerequisite: NES 302 or permission of instructor.
This course is designed to hone the reading skills of advanced Hebrew-language students. We will read authentic, unedited texts from a variety of sources including newspapers (news and cultural features), journals, graphic novels, and short stories. Written assignments will include short analytic essays, op-ed articles and fictional pieces in Hebrew. Students are also expected to engaging in regular translation exercises. Class discussion is conducted in Hebrew

NES 401(4101) Modern Hebrew Literature (also JWST 401[4101]) © (LA-AS)
Spring. 4 credits. Satisfies Option 1. Prerequisite: NES 400 or equivalent. Students who successfully completed 302 may enroll with permission of instructor. Literature has held a privileged place in the revival of modern Hebrew and the formation of Israeli culture. This course affords students the opportunity to read a sampling of this exciting literature. Each semester features a different theme, topic, or period in the development of modern Hebrew literature Readings may include short stories, novels, poetry, and drama. Readings, writing assignments, and discussions are in Hebrew.

NES 405(4605) Contesting Identities in Modern Egypt (also HIST 409[4091]) © (HA-AS)
Fall. 4 credits. Z. Fahmy.
This seminar examines the dynamics of modern collective identities that dominated. the Egyptian public sphere in the long 20th century. We will explore the underpinnings and formation of territorial Egyptian nationalism, pan-Arabism and Islamism through close readings and class discussions of important theoretical, historiographical and primary texts

## NES 414(4211) Readings in Arabic

 Literature (LA-AS)Spring. 4 credits. S. M. Toorawa

## NES 423(4523) Visualizing Sacred Iberia (also NES 623[6523], ART 415/615[4315/6315]) <br> Fall. 4 credits. C. Robinson. <br> For description, see ART H 415.

NES 438(4738) Imagining the Medíterranean (also JWST 438[4738], COM L 496[4960]) © (LA-AS)
Fall. 4 credits. G. Holst-Warhaft. Through a series of readings in poetry and prose from Greece, Spain, Morocco, Turkey, Israel and Egypt, the course examines how Mediterranean writers interact with the sensuous aesthetics of landscape, music, and ritual in the Mediterranean. We will be concerned with how poetry, music, dance and image interact in the region, and how this relationship is reflected in 20th-century literature from and about the Mediterranean. The readings will focus on particular cases, such as the relationship of Lorca's poetry to the of Andalusia, lowbrow musical form in Greece, and the nostalgia for the mythical city of Alexandria in Cavafy and other Alexandrian authors. We will also consider how the myth of the Mediterranean has affected modern literary imagination within and beyond the region.

## NES 440(4540) Maimonides and Averroes [JWST/RELST 440[4540], SPAN 438[4380])

Spring. 4 credits. R. Brann.
Moses Maimonides, who was born in Cordoba (1138), moved to Fez as a youth, and died in Cairo (1204), is regarded by Jewish, Islamic, and Christian tradition alike as the most important Jewish religious intellectual of the classical age of Islam/the High Middle Ages. This seminar will examine Maimonides as the product of his time and place and, because of his stature as a communal figure, rabbinic scholar, court physician and philosopher, as a catalyst for cultural developments including
his complex relationship with Arabo-Islamic culture.
NES 447-448(4947-4948) Middle Eastern Music Ensemble (also MUSIC 431432[3614])
447, fall; 448 , spring. 1 credit each semester. Limited to 40 students.
Prerequisite: permission of instructor.
M. Hatch and staff.

Performance of diverse musical traditions from the Middle East. Instruction in percussion, oud, ney, and kanoun, among others.

## NES 449(4549) The Mediterranean in the

 Age of Cervantes (also S HUM 424, COM L $411[4111]$, SPAN 4340, HIST 429[4290])Spring, 4 credits. M. Garces.
For description, see S HUM 424.

## NES 460(4560) Theory and Method in

 Near Eastern Studies (CA-AS)Spring. 4 credits. Requirement for NES majors. K. Haines-Eitzen.
Seminar offering advanced Near Eastern Studies students the opportunity to read and discuss the range of theories and methods that have been employed by scholars in the interdisciplinary area of Near Eastern Studies. After giving attention to the historical development of area studies programs-and their current status and relevance-students read a wide range of highly influential works in Near Eastern Studies. Literary theory, historiography, post-colonialism, archaeology, gender theory, and comparative religions are a few of the approaches, methods, and theories explored. Authors include Talal Asad, Homi K. Bhabha, Mircea Eliade, Timothy Mitchell, Mary Douglas, Zachary Lockman, Edward Said, J. Z. Smith.

## NES 470(4670) Wealth and Power in Early Civilizations (also JWST 470[4670]) © \# (HA-AS)

Fall. 4 credits. C. Monroe.
How were wealth and power created and distributed in ancient Mesopotamia, Egypt, and the Aegean? Using archaeological, anthropological, sociological and historical approaches, several case studies will be considered: the emergence of urbanism in the Uruk and Minoan worlds; the construction of bureaucracy in the Ur III state; the organization of empire under Hittite, Egyptian and Assyrian rulers; and the economic strategies of resistance used in smaller kingdoms and city-states like Israel and Phoenicia. The role of the trader in these societies will be examined, as will the role of certain polities within larger economic systems. The case studies are approached after students are introduced to the intellectual foundations of historical materialism in early authors (like Smith, Marx, and Weber) and are versed in current approaches to political economy in early states.

## NES 472(4672) Nationalism(s) and Nation-States in the Arab World

Spring. 4 credits. Z. Fahmy.
This seminar examines the emergence of national identities, nationalist movements, and nation-states in the modern Arab world. First, we will examine various approaches to the question of nationalism, using Benedict Anderson's Imagined Communities as our basic reference. We will then test the applicability of these general theories to the Arab World through our examination of specific cases studies.

NES 491-492(4991-4992) Independent Study, Undergraduate Level
Fall and spring. Variable credit.
Prerequisite: permission of instructor: Staff,

## NES 498-499(4998-4999) Independent

 Study, HonorsFall and spring. 8 credits. Prerequisite: permission of instructor. Staff.

## NES 620(6112) Readings in Medieval

 Hebrew Poetry and Prose (also JWST 620[6112])Fall. 4 credits. R. Brann.
Critical readings in medieval Hebrew lyrical and liturgical poetry and imaginative rhymed prose from 10th-century Muslim Spain to Renaissance and Baroque Italy. Course may be repeated for credit.

## NES 691-692(6991-6992) Independent

 Study: Graduate LevelFall and spring. Variable credit.
Prerequisite: permission of instructor. Staff.

## Related Courses in Other Departments

Africana Studies
Archaeology
Asian Studies
Classics
Comparative Literature
Economics
English
Feminist, Gender, and Sexuality Studies
German Studies
Government
English
History
History of Art
Linguistics
Medieval Studies
Music
Philosophy
Religious Studies
Romance Studies
Russian Literature
Society for the Humanities
Sociology
Theatre, Film, and Dance
Visual Studies

## NEPALI

See "Department of Asian Studies:"

## PALI

See "Department of Asian Studies."

## PHILOSOPHY

S. MacDonald, Chair, K. Bennett, R. Boyd, W. Breckenridge, T. Brennan (on leave fall 2007), A. Chignell, M. Eklund, G. Fine (on leave spring 2008), H. Hodes, T. Irwin (on leave fall 2007-2008), M. Kosch, C. Mag Uidhir, R. W. Miller (on leave Fall 2007), M. Moody-Adams, D. Pereboom, N. Sethi, C. Shields, N. Silins, N. Sturgeon,
B. Weatherson. Emeritus: C. A. Ginet, S. Shoemaker.

The study of philosophy provides students with an opportunity to become familiar with some of the ideas and texts in the history of thought while developing analytical skills that are valuable in practical as well as academic affairs. It affords the excitement and satisfaction that come from understanding and working toward solutions of intellectual problems. The curriculum includes offerings in the history of philosophy, logic, philosophy of science, ethics, social and political philosophy, metaphysics, and theory of knowledge. Any philosophy course numbered in the 100 s or 200s is suitable for beginning study in the field. Sections of PHIL 100, 110, and 111 are part of the first-year writing seminar program; they are taught by various members of the staff on a variety of philosophical topics, and because of their small size ( 17 students at most) they provide ample opportunity for discussion. Students who want a broad introduction to philosophy may take PHIL 101, but many students with special interests may find that the best introduction to philosophy is a 200-level course in some particular area of philosophy; such courses have no prerequisites and are usually open to first-year students.

## The Major

Students expecting to major in philosophy should begin their study of it in their freshman or sophomore year. Admission to the major is granted by the director of undergraduate studies of the department on the basis of a student's work during the first two years. Normally the student must have completed two philosophy courses with grades of B or better. Eight philosophy courses, taken for a letter grade, are required for the major. They must include at least one course on ancient philosophy (PHIL 211, or a course with a large component on Plato or Aristotle), at least one course on classical modern metaphysics and epistemology from Descartes through Kant (e.g., PHIL 212 or a course on the empiricists, the rationalists, or Kant), and a minimum of three courses numbered above 300 . Students admitted to the major (after fall 1996) are required to take a minimum of six philosophy courses numbered above 200, and may not count more than one section of PHIL 100, 110, or 111 toward the major. Courses numbered 191-199 do not count toward the major. A course in formal logic (e.g., PHIL 231), while not required, is especially recommended for majors or prospective majors.
Philosophy majors must also complete at least 8 credits of course work in related subjects approved by their major advisors. Occasionally majors may serve as teaching or research aides, working with faculty members familiar with their work.
Honors. A candidate for honors in phitosophy must be a philosophy major with an average of B - or better for all work in the

College of Arts and Sciences and an average of $\mathrm{B}+$ or better for all work in philosophy. In either or both semesters of the senior year a candidate for honors enrolls in PHIL 490 and undertakes research leading to the writing of an honors essay by the end of the final semester. Honors students normally need to take PHIL 490 both semesters of their senior year to write a satisfactory bonors essay. PHIL 490 does not count toward the eight philosophy courses required for the major. Prospective candidates should apply at the Department of Philosophy office, 218 Goldwin Smith Hall.

## Fees

In some courses a small fee may be charged for photocopying materials to be handed out to students.

## Introductory Courses

First-Year Writing Seminars In Philosophy Fall and spring. 3 credits. Consult John S. Knight Institute brochure for times, instructors, and descriptions.

## PHIL 101(1101) Introduction to

 Phillosophy \# (KCW-AS)Fall and spring. 3 credits. Prerequisite: none. Open to freshmen. Fall: K. Bennett, Spring: M. Eklund.
Fall: An introduction to basic issues and methods in philosophy. Topics will include the following: the existence of God (what evidence would belief in God require? And how can Gods existence be reconciled with the amount of pain and suffering in the world?), knowledge of the external world (can we be sure that we are not dreaming, or in the Matrix?), freedom of the will (do you really have a choice about what classes you take next semester?), some basic questions in ethics (what, if anything, makes an action right or wrong?), and possibly an application thereof (e.g. is vegetarianism morally obligatory?)
Spring: The course aims to give a broad introduction to philosophy - the different types of questions about ourselves, the world, and the relation between ourselves and the world that traditionally have been the focus of philosophy. Among the topics we will consider are questions about the nature of knowledge, the nature of our minds, the existence of free will and the existence of God.

## PHIL 145(1450) Contemporary Moral

 Issues (KCM-AS)Fall. 3 credits. Staff.
For description, see department web site.
PHIL 191(1910) Introduction to Cognitive Sclence (also COGST 101[1101], PSYCH 102[1200], CS 101[1710], LING 170[1170])
Fall. 4 credits. M. Spivey
For description, see PSYCH 102.
PHIL 195(1950) Controversies About Inequality (also SOCD SOC/PAM/ ILROB 222[2220], GOVT 2222225]) (SBA-AS)
Fall. 4 credits. S. Morgan.
For description, see SOC 222.
PHIL 201(2010) Puzzles and Paradoxes
Fall. 4 credits. M. Eklund.
The course provides an overview of a number of famous philosophical puzzles and paradoxes and important attempts to solve
them. Among the paradoxes we will discuss are Zeno's paradoxes of space, time and motion, the paradox of the heap, the liar paradox, Russell's set-theoretic paradox, and paradoxes of knowledge and fationality.

## PHIL 211(2110) Ancient Philosophy (also CLASS 231[2661]) ( (KCM-AS)

 Fall. 4 credits. Prerequisite: none. Open to freshmen. G. Fine.This course examines the origin and development of Western philosophy in Ancient Greece and Rome. We will study some of the central ideas of the Pre-Socratics, Socrates, Plato, Aristotle, and the Hellenistic philosophers (Epicureans, Stoics, and Skeptics). Questions to be considered include What are the nature and limits of knowledge? Is knowledge even possible? How reliable is perception? What are the basic entities in the universe: atoms, Platonic Forms, or Aristotelian substances? Is moral knowledge possible?
What is the nature of happiness and what sort of life will make people happy? Do human beings have free will? Ought we to fear death?

## PHIL 212(2120) Modern Philosophy *

 (KCM-AS)Spring. 4 credits. Prerequisite: none. Open to freshmen. A. Chignell.
A survey of Westem philosophy in the 17th and 18th centuries: Descartes, Locke, Spinoza, Leibniz, Berkeley, Hume, and Kant. We will focus largely on epistemology (ideas, skepticism, belief, knowledge, science) and metaphysics (bodies, minds, God, causation, natural laws, afterlife, personal identity). Some of the ethical implications of these systems will also be mentioned in passing. Best taken in conjunction with PHIL 211 (Ancient Philosophy), although this is not a prerequisite.
PHIL 217(2170) 19th- and 20th-Century European Thought (also GERST 353[3550]) (KCM-AS)
Spring. 4 credits. M. Kosch.
Survey of European social theory from Hegel to Foucault (via Marx, Nietzsche, Freud, Weber, and the Frankfurt School)

PHIL 231(2310) Introduction to Deductive Logic (MOR)
Spring. 4 credits. Prerequisite: none. Open to freshmen. H. Hodes.
The logic of truth-functional connectives, identity, and the universal and existential quantifiers; a formal language; translation between it and English; constructing worlds and models; and constructing proofs. We ll use a textbook accompanied by a software package, Language, Proof, and Logic by J. Barwise and J. Etchemendy.

## PHIL 241(2410) Ethics (KCM-AS)

Spring. 4 credits. Prerequisite: none. Open
to freshmen. N. Sturgeon.
An introduction to the philosophical evaluation of moral theories and moral arguments. Ethical relativism, ethical egoism, ethical skepticism, utilitarianism, and durybased theories; some application to controversial contemporary issues.

## PHIL 242(2420) Social and Political Philosophy (KCM-AS)

Spring. 4 credits. K. Bennett
For description, see department web site.

## PHIL 245(2450) Ethics and Health Care

 (KCM-AS)Spring. 4 credits. Prerequisites: none. Open to freshmen. N. Sethi.
An introduction to the philosophical study of ethical problems that arise from the practice of medicine as such or that arise in response to developments within medicine and the larger world. Does it require that all have access to approximately the same level of health care? In addition to learning how to arrive at and defend ethical positions, we reflect on the techniques and methods we use.

## PHIL 246(2460) Ethics and the Environment (also BeSOC/S\&TS 206[2061]) (KCM-AS)

Spring, 4 credits. Limited to 40 students.
Open to all undergraduates; freshmen by permission of instructor. Staff.
For description, see B\&SOC 206.
PHIL 249(2490) Feminism and Philosophy (also FGSS 249[2490]) (KCM-AS)
Fall. 4 credits. Prerequisite: none. Open to freshmen. N. Sethi.
This class will examine a variety of feminist attempts to understand and explain the various ways in which traditional philosophy reflects bias against women. We will also consider a variety of feminist viewpoints and examine how these are used to address "real life" issues regarding sexuality, violence, family structure, identity, peace, and war.

## PHIL 251(2510) introduction to Phllosophy of Art (KCM-AS)

Fall. 4 credits. C. Mag Uidhir.
This course will be an introduction to the core issues in contemporary analytic philosophy of art. The areas covered will include definitions of art, the ontology of art, the nature of art interpretation and evaluation, aesthetic properties, and fictionality. Special attention will be given to issues in the philosophy of literature and the philosophy of music.

## PHIL 261(2610) Knowledge and Reality

 (KCM-AS)Spring. 4 credits. Prerequisite: none. Open to freshmen. N. Silins.
An introduction to philosophical questions about the nature of knowledge and reasonable belief, about sources of knowledge and reasonable belief such as perception, memory, reasoning and testimony, and about the extent and source of our knowledge about our own minds.

## PHIL 262(2620) Phillosophy of Mind

 (KCM-AS)Fall. 4 credits. Prerequisite: none. Open to freshmen. N. Silins.
We will evaluate views about the nature of mental states and about their relation to the brain, behavior, and the world. Questions we will consider include: are mental states the same as states of our brains? If not, what is the relation between them and states of our brains? How is it possible for mental states to cause our behavior? We will pay special attention to questions about the nature of consciousness and about whether consciousness can be understood in physical terms.

## PHIL 263(2630) Rellgion and Reason

 (also RELST 2622630]) (KCM-AS)Fall. 4 credits. Prerequisites: none.
D. Pereboom.

In this course we will examine the most prominent arguments for the existence of

God-the ontological, cosmological, teleological arguments, and the argument from religious experience-and the most significant arguments against the existence of God-the arguments from evil and from divine hiddenness. We will then consider ways in which belief in God might contribute to meaning and fulfilment in life, and whether these ways might provide reasons for believing in God. Course readings will be from both historical and contemporary sources.

PHIL 284(2840) Introduction to Metaphysics
Spring. 4 credits. K. Bennett.
For description, see department web site.
PHIL 270(2700) Truth and Interpretation (also LiNa 270[2270], COGST 270[2700]) (KCM-AS)
Fall. 4 credits. B. Weatherson.
An introduction to a variety of issues in semantics and in the related philosophical literature. Topics include: the nature of semantic representations; the relationship between meaning and the world; wordmeaning; the interaction of semantics and pragmatics.

## Intermediate or Advanced Courses

Some of these courses have prerequisites.
PHIL 308(3080) Hellenistic Philosophy (also CLASS 341[3661])
Spring. 4 credits. T. Brennan.
For description, see department web site.
PHIL 310(3100) Aristotle (also CLASs 340[3664]) ( (KCM-AS)
Fall. 4 credits. Prerequisite: one philosophy course. C. Shields.
For description, see department web site.
PHIL 311(3110) The Ratlonallsts \#
Spring. 4 credits. Prerequisite: one philosophy course. A. Chignell. A mid-level look at the epistemology and metaphysics of some classical continental rationalists. Readings from some (but not all) of the following: Descartes, Malebranche, Spinoza, Leibniz, Wolff, the early Kant. One previous course in philosophy is required, and PHIL 211 or something comparable is recommended.
PHIL 315(3150) Medieval Philosophy * (KCM-AS)
Fall. 4 credits. S. MacDonald. Prerequisite: one previous philosophy course. A selective survey of Western philosophical thought from the 4 th to the 14 th century. Topics include the problem of universals, the theory of knowledge and truth, the nature of free choice and practical reasoning, and philosophical theology. Readings (in translation) include Augustine, Boethius, Anselm, Abelard, Aquinas, Scotus, and Ockham. Some attention will be given to the development of ideas across the period and the influence of nonWestern traditions on the West.

## PHIL 318(3180) Origins of Analytic Philosophy

Fall. 4 credits. M. Eklund. Prerequisite: two previous philosophy courses or permission of instructor.
We will cover some of the important texts from the early years of analytic philosophy. Among the authors we will read are Frege, Russell, the early Wittgenstein, and Frank Ramsey. We will also cover some important
secondary literature. The emphasis will be on are foundational issues in metaphysics, philosophy of language and philosophy of mathematics.

## PHIL 330(3300) Foundations of Mathematics (also MATH 384[3840]) (MOR)

Fall. 4 credits. H. Hodes.
This will be a course on the set theory of Zermelo and Fraenkel: the basic concepts, settheoretic construction of the Natural, Integral, Rational and Real Numbers, cardinality, and time permitting the ordinals. Text: Enderton's "Elements of Set Theory."

## PHIL 331(3310) Deductive Logic (also MATH 281[2810]) (MQR)

Spring. 4 credits. B. Weatherson:
The syntax and model-theory of classical propositional logic and classical predicate logic, including proofs of the soundness and completeness of Natural Deduction formalizations of these logics, with some attention to related material.

## PHIL 332(3320) Philosophy of Language

 (also LING 332[3332])Fall. 4 credits. Prerequisite: one philosophy course or permission of instructor. W. Breckenridge.

For description, see department web site.

## PNIL 347(3470) Clobal Justice (also

 COVT 368[3685]) (KCM-AS)Spring. 4 credits. R. Miller.
A study of the leading debates over the nature of justice among governments and people throughout the world. What are the obligations of people in rich countries to help the foreign poor? What principles of fairness should be observed in international economic arrangements? To what extent do governments have a right to control their territories without foreign intervention? What kinds of wars are just and what conduct in war is morally permissible? What is the moral significance of nationality, patriotism and national selfdetermination? How should international institutions operate, and what is their proper role in global governance? Readings will include work by political philosophers, political scientists, and economists, and will sometimes involve specific case studies.

## PHIL 381(3810) Phllosophy of Sclence: Knowledge and Objectivity (also

 SeTS 381[3811]) (KCM-AS)Spring. 4 credits. R. Boyd.
Topics in the philosophy of science.
PHIL 382(3820) Philosophy of Psychology
Spring. 4 credits. D. Pereboom.
For description, see department web site.
PHIL 387(3870) Philosophy of Mathematics
Spring. 4 credits. Prerequisite: two courses in philosophy. Recommended: at least one course in logic. H. Hodes.
This course will consider several philosophical topics raised by mathematics, attending to the discussion of these topics in the course of the last 120 years; special attention to: the relationships between Mathematics and Logic, and the semantics of mathematical discourse.

## PHIL 390(3900) Independent Study

Fall or spring. Credit TBA.
To be taken only in exceptional circumstances. Must be arranged by the student with his or her advisor and the faculty member who has agreed to direct the study.

## Advanced Courses and Seminars

These courses are offered primarily for majors and graduate students.

## PHIL 409(4090) German Philosophical

 Texts (KCM-AS)Fall and spring. Variable credit.
Prerequisite: basic reading (not necessarily speaking) knowledge of German.
A. Chignell.

Reading and translation of philosophical texts in German.

## PHIL 410(4100) Latin Philosophical Texts (also LATIN 612[7212], RELST

 410[4100]) \# (KCM-AS)Fall and spring. Variable credit.
Prerequisites: knowledge of Latin and
permission of instructor. S. MacDonald.
Reading and translation of philospohical texts in Latin.

## PHIL 411(4110) Greek Philosophical Texts (also GREEK 611[7111]) *

 (KCM-AS)Fall and spring. Variable crectit.
Prerequisites: knowledge of Greek and permission of instructor. C. Shields.
Reading and translation of philosophical texts in Greek.

## PHIL 417(4170) Topics in German Philosophy

Fall. 4 credits. M. Kosch.
For description, see department web site.

## PHIL 419(4190) History of 20th-Century Philosophy

Spring. 4 credits. Prerequisite: two previous philosophy courses or permission of instructor. M. Eklund.
An overview of central issues in mid-20thcentury analytic philosophy. Among the authors we will discuss will be Quine, Carnap, Geach and the later Wittgenstein. The emphasis will be on foundational issues in metaphysics and epistemology.

## PHIL 432(4320) Topics in Logic (also MATH 482[4820]) (MOR)

Fall. 4 credits. Prerequisite: course in logic or permission of instructor. H. Hodes. This course will focus on intuitionistic logic, including (1) its relationships to classical logic, some "intermediate logics" between intuitionistic and classical, and a modal logic. We'll consider (2) both proof-theoretic and model-theoretic characterizations of the consequence relations for these logics, (3) algebraic/topological (and time permitting, categorical) characterizations of intuitionistic consequence. (4) We'll also look at how certain mathematical theories have been developed on the basis of intuitionistic logic.

## PHIL 437(4370) Problems in the Philosophy of Language

Spring. 4 credits. W. Breckenridge.
For description, see department web site
PHIL 441(4410) Contemporary Ethical Theory (KCM-AS)
Fall. 4 credits. N. Sturgeon.
Topic: Moral Realism and its critics.

## PHIL 446(4460) Toples in Political Obligation

Spring. 4 credits. E. Taylor. For description, see department web site

## PHIL 460(4600) Epistemology

Spring. 4 credits. N. Silins.
Testimony and Disagreement. The focus of this course is on how we can gain, or lose, knowledge and reasonable beliefs through
discourse with others. We will first look at when and how we can come to know that something is true on the basis of somebody's saying that it's true. We will then look at whether and how we should revise our beliefs when we learn that someone else, apparently as intelligent and well-informed as us,

## disagrees with us.

## PHIL 464(4640) Metaphysics (KCM-AS)

Fall. 4 credits. D. Pereboom.
What must agents be like in order to be morally responsible for their actions? Plausibly, they must be able to exercise some type of control in action, and this ability has traditionally been conceived as a kind of freedom of the will. In this course we will attempt to discern the exact nature of the freedom of the will required for moral responsibility, and to determine whether we could have this freedom given what we know about ourselves and the world. The course readings will mainly be from the analytic philosophical tradition since 1960 , while there will be some reference to the work of
Spinoza, Hume, and Kant on this topic.

## PHIL 490(4900) Informal Study for

 HonorsFall and spring, 4 credits. Prerequisite: senior honors students.
See "Honors" at the beginning of the Philosophy section.
PHIL 611(6110) Ancient Philosophy (also CLASS 673[7173])
Fall and spring. 4 credits. Fall: C. Shields, spring: Staff
Fall: For description, see department web site.
Spring: A study of Aristotle's Posterior Analytics in the context of his other writings on logic, epistemology, and the philosophy of science.
PHIL 612(6120) Medieval Philosophy Spring. 4 credits. Prerequisite: graduate student in philosophy or permission of instructor. S. Macdonald.
A topic in medieval philosophy.
PHIL 641(6410) Ethics and Value Theory Spring. 4 credits. Prerequisite: this course is a seminar for Philosophy graduate students; others may enroll only with permission of instructor. M. Kosch.
Topic: Relativism, Realism, Subjectivism and Noncognitism in Ethics and Value Theory.

## PHIL 662(6620) Philosophy of Perception

 Fall. 4 credits. N. Silins.A survey of contemporary work in the philosophy of perception.

## PHIL 665(6650) Metaphysics

Spring. 4 credits. D. Boyd and K. Bennett. For description, see department web site.

## PHIL 700(7000) Informal Study

Fall or spring. Credit TBA.
To be taken by graduate students only in exceptional circumstances and by arrangement made by the student with his or her Special Committee and the faculty member who has agreed to direct the study.

## PHYSICS

S. A. Teukolsky, chair (109 Clark Hall, 2556016); C. P. Franck, director of undergraduate studies ( 101 Clark Hall, 255-8158, physicsdus-mailbox@cornell.edu); J. P. Alexander, T. A. Arias, E. Bodenschatz, P. Brouwer, D. G. Cassel, E. Cassel, 1. Cohen,
C. Csaki, J. C. Davis, G. F. Dugan, V. Elser,
E. Flanagan, R. Fulbright, R. S. Galik,
A. Giambattista, L. K. Gibbons, P. Ginsparg,
B. Greene, Y. Grossman, S. M. Gruner,
L. N. Hand, D. L. Hartill, C. L. Henley,
G. Hoffstaetter, P. Krasicky, A. LeClair,
G. P. Lepage, M. U. Liepe, P. L. McEuen,
E. Mueller, M. Neubert, H. Padamsee,
J. M. Parpia, J. R. Patterson, M. Perelstein,
D. C. Ralph, B. Richardson, R. C. Richardson,
D. L. Rubin, A. Ryd, K. Schwab, K. Selby, J. P. Sethna, K. M. Shen, A. J. Sievers, E. Siggia, P. C. Stein, R. M. Talman, J. Thom, R. Thorne, H. Tye, C. Umrigar, M. D. Wang, I. Wasserman, P. Wittich, T-M. Yan, J. York

The Department of Physics offers a full range of university-level work in physics, from general education courses for nonscientists to doctoral-level independent research. Major research facilities are operated by two component organizations, the Laboratory of Atomic and Solid State Physics (LASSP) and the Laboratory for Elementary Particle Physics (LEPP). LASSP carries out extensive research efforts in condensed-matter physics and biophysics. LEPP operates a major high-energy particle physics research facility at Wilson Laboratory, the Comell electron-positron storage ring (CESR). Theoretical work is carried out in many fields of physics, including astrophysics. There is a full schedule of weekly research-oriented seminars and colloquia. Students find many opportunities for research participation and summer employment.
Introductory physics sequences are: 101-102, 207-208, and 112-213-214, or its more analytic version 116-217-218. In addition, there is a group of general-education courses, PHYS 200-206, 209, 210. PHYS 101-102, a self-paced autotutorial course, is designed for students who do not intend to take further physics courses and who do not have preparation in calculus. PHYS 112 and 207 both require calculus (MATH 190 or 191 or 111), and additional mathematics is required for subsequent courses in the sequence. PHYS 101-102 or 207-208 may be taken as terminal physics sequences. The three-semester sequences 112-213-214 or 116-217-218, are recommended for engineers and physics majors.
Courses beyond the introductory level that might be of interest to nonmajors include PHYS 316 Modern Physics I; PHYS 330 Modern Experimental Optics; and PHYS 360 Electronic Circuits.
Advanced placement and credit are offered as outlined in "Advanced Placement of Freshmen," or students may consult the director of undergraduate studies, as should students requesting transfer credit for physics courses taken at another college.

## The Major

The major program is constructed to accommodate students who wish to prepare for professional or graduate work in physics as well as those who wish to complete their major program in the field of physics but have other post-graduation goals. The physics major
provides flexibility to pursue diverse interests through concentrations either within physics or outside physics.
Students who wish to major in physics are advised to start the physics sequence in the first semester of their freshman year. The major program still can be completed with a second-semester start, but flexibility in future course scheduling is reduced.
Prospective majors are urged to make an early appointment at the physics office for advice in program planning. Acceptance into the major program is normally granted upon completion of a year of physics and mathematics courses at Cornell with all course grades at the B minus level or higher. Students wishing to declare the major should meet with the director of undergraduate studies, who will match the student with a major advisor following discussion of the student's interests. Details of the major course program are worked out in consultation between the student and major advisor. For students graduating after 2008, grades of at least C- or S for S-U only courses are required in all courses for the physics major.

## Physics Core

Common to all major programs is a requirement to complete a core of physics courses. In addition to the three-semester introductory sequence (PHYS 112-213-214 and 216 before 316 or $116-217-218$ ), the core includes five upper-level courses- (1) the twocourse sequence in modern physics (PHYS $316-317$ ), (2) at least three semester hours of laboratory work selected from PHYS 310, 330, 360,410 , ASTRO 410, (3) an intermediate course in classical mechanics, and (4) an intermediate course in electromagnetism.
Accompanying these physics courses should be work in mathematics through at least MATH 222 or 294 . Students following the
professional/graduate school channel are expected to complete at least one additional year of applicable mathematics (A\&EP 321322 or appropriate selections from mathematics).

In addition to the core, each physics major must complete 15 semester hours of credit in an area of concentration that has been agreed on by the student and major faculty advisor.

## Concentration within Physics

A student who wishes to pursue professional or graduate work in physics or a closely related field should follow a concentration within the field of physics. For those students with a strong secondary school preparation, the sequence PHYS 116-217-218 is encouraged. Students are strongly encouraged to start the sequence with PHYS 116, even if they qualify for advanced placement credit for PHYS 112 and/or 213. Core courses in mechanics and electromagnetism will normally be PHYS 318 and 327, respectively. The minimum 15 hours beyond the core must be composed of physics courses with numbers greater than 300 and must include the senior laboratory course PHYS 410. This means a physics concentration needs a minimum of 7 credit hours of laboratory work to complete the requirements. The accompanying table shows several typical course sequences by means of which the major requirements may be completed. The primary distinction among students who may follow the different sequences is the amount and level of precollege work in calculus and in physics. Changes in these typical patterns are common, as agreed on between student and major faculty advisor. Research work is encouraged of all majors. If this work is done as an independent project, PHYS 490, up to 8 credits can be applied to the concentration.

Typical Physics Course Sequences (other sequences are also possible)

| Semester | No AP math <br> or physics | 1 year AP <br> calculus and good <br> HS physics | Outside <br> concentrators | Outside <br> concentrators <br> (alternate) |
| :--- | :---: | :---: | :---: | :---: |
| 1st - Fall | 112 | 116 | 112 |  |
| 2nd - Spring | 213 | 217 | 213 | 112 |
| 3rd - Fall | 214,216 | 218 | 214,216 | 213 |
| 4th - Spring | $316,3 \times 0$ | $316,3 \times 0$ | $3 \times 0$ | 214,216 |
| 5th - Fall | $317,327,3 \times 0$ | $317,327,3 \times 0$ | 316 | $3 \times 0,316$ |
| 6th - Spring | $314 / 318,443$ | 318,443 | 314 | $314,3 \times 0$ |
| 7th - Fall | 341,410 | 341,410 | 317,323 | 317,323 |
| 8th - Spring | Elective(s) | Elective(s) |  |  |

- For majors with concentrations outside physics, there is wide variation in individual programs, arranged to best match the field of concentration.
- Crossovers between the two sequences 112-213-214 and 116-217-218 are possible, although the combination 112-213-218 is difficult. PHYS 207 may be substituted for PHYS 112. Students taking 217 after 112 must co-register for 216.
- Students taking the honors sequence 116-217-218 are strongly encouraged to start with PHYS 116. Exceptionally well-prepared students may be able to begin work at Cornell with PHYS 217. Such students should visit the department office for advice in planning a course program.
- Physics electives for the major include $360,444,454,455,480,490,525,553,561,572$, the senior seminars 481-489, ASTRO 332 or 431-432, and A\&EP 434.
- One semester of intermediate laboratory, listed here as $3 \times 0$, is required.
- Well-prepared sophomores wishing to take PHYS 318 should consult the instructor before registering.


## Concentration outside Physics

Such a concentration will reflect the student's interest in some area related to physics. The array of courses that comprise the concentration must have internal coherence. The array will normally be worked out in conference with the major faculty advisor and must be approved by the advisor. Of the required 15 hours credit beyond the core, at least 8 credits must be in courses numbered above 300 . Students in the past have chosen to concentrate in a wide variety of fields, including (but not limited to) astronomy, business, chemical physics, computer science, econometrics, education, geophysics, history, and philosophy of science, law, meteorology, or public policy. A combined biologychemistry concentration is common for premedical students or those who wish to prepare for work in biophysics.
The department particularly wishes to encourage students with an interest in science education. Physics majors can obtain teaching certification by concentrating in education and then completing a one-year master of arts in teaching (MAT) degree. Information about the education concentration and MAT can be obtained from the Department of Education's Cornell Teacher Education Program or from the director of undergraduate studies in physics. For students with concentrations outside physics, the core requirements in mechanics and electromagnetism can be appropriately met with PHYS 314 and 323, respectively.
Students with an astronomy concentration who might continue in that field in graduate school should use ASTRO 410, 431, 432 as part of the concentration; they are encouraged to use PHYS 318 and 327 to satisfy the core requirements in mechanics and electromagnetism.

## Honors

A student may be granted honors in physics upon the recommendation of the Physics Advisors Committee of the physics faculty. There is no particular course structure or thesis requirement for honors.

## Double Majors

Double majors including physics are possible and not at all uncommon. It should be noted, however, that any course used to satisfy a requirement of another major may be used in satisfaction of physics major requirements only if the student's concentration is within physics.

## Courses with Overlapping Content

Because the department offers several courses with overlapping content, students should select courses carefully to meet the needs of their academic programs and to ensure credit for each course they take. Listed below are groups of courses with largely similar content. In general, students may receive credit for only one of the courses in each group.

PHYS 101, 112, 116, 207
PHYS 102, 208, 213, 217
PHYS 214, 218
PHYS 314, 318
PHYS 323, 327
PHYS 116, 216
In addition, students with credit for PHYS 101, 112,116 , or 207 , or an advanced placement equivalent who wish to enroll in PHYS 200-

206,209 , or 210 should obtain written permission from the instructor and the director of undergraduate studies in physics.

## Course Prerequisites

Prerequisites are specified in physics course descriptions to illustrate the materials that students should have mastered. Students who wish to plan programs different from those suggested by the prerequisite ordering are urged to discuss their preparation and background with a physics advisor or with the instructor in the course. In many cases an appropriate individual program can be worked out without exact adherence to the stated prerequisites.

## Courses

PHYS 012(1012) PHYS $112(1112)$ Supplement
Spring. 1 credit. S-U grades only. R. Lieberman.

Provides backup instruction for PHYS 112. Recommended for students who either feel insecure about taking PHYS 112 or simply want to develop their problem-solving skills. Emphasis is on getting the student to develop a deep understanding of basic concepts in mechanics. Much class time is spent solving problems and applications.

## PHYS 013(1013) PHYS 213(2213) Supplement

Fall. 1 credit. S-U grades only.
R. Lieberman

Provides backup instruction for PHYS 213. Description is the same as for PHYS 012, except the material covered is electricity and magnetism.

## PHYS 101(1101) General Physics I (PBS)

Fall, summer (eight-, six, or first four weeks only for those during PHYS 102 in the second four weeks). 4 credits Enrollment may be limited and freshmen are excluded. General introductory physics for nonphysics majors. Prerequisites: three years high school mathematics, including some trigonometry. Students without high school physics should allow extra time for PHYS 101. Includes less mathematical analysis than PHYS 207 but more than PHYS 200-206, 209, 210. B. Richardson. Emphasizes quantitative and conceptual understanding of the topics of introductory physics developed without use of calculus. The course is mostly self-paced in a masteryoriented format including eight subject units and a final retention (review) unit. Most instruction occurs in the learning center with personal tutoring by staff, assigned readings, problems, laboratory exercises, videotaped lectures, and solutions of sample test questions at our web site. Unit testing is designed to measure mastery with a limit of three test tries. Major topics for 101: kinematics, forces and dynamics, momentum, energy, fluid mechanics, waves and sound, thermal physics, kinetic theory, and thermodynamics. At the level of College Pbysics, second edition, by
Giambattista. Richardson, and Richardson.
PHYS 102(1102) General Physics II (PBS)
Spring, summer (eight-week, six-week, or second four weeks only for those doing PHYS 101 in first four weeks). 4 credits. Enrollment may be limited. Prerequisite: for PHYS 102, PHYS 101 or 112 or 207. Includes less mathematical analysis than PHYS 208 but more than PHYS 200-206,
209, 210. B. Richardson.

Emphasizes quantitative and conceptual understanding of the topics of introductory physics developed without use of calculus. The course is mostly self-paced in a masteryoriented format including eight subject units and a final retention (review) unit each semester. Most instruction occurs in the learning center with personal tutoring by staff, assigned readings, problems, laboratory exercises, videotaped lectures, and solutions of sample test questions at the course web site. Unit testing is designed to measure mastery with a limit of three test tries taken at the time of the student's choice. Major topics for 102: electricity and magnetism, optics, relativity, quantum, nuclear, and particle physics. At the level of College Pbysics, second ed., by Giambattista, Richardson, and Richardson
[PHYS 103(1103) General Physics (PBS)
Summer. 4 credits. Prerequisite: three years high school mathematics, including trigonometry. Students without high school physics should allow extra time for PHYS 103. Introductory physics taught through interactive lectures; not recommended for students majoring in physics or engineering fulfills same requirements as PHYS 101 Next offered 2008-2009
Basic principles treated quantitatively but without calculus. Topics include kinematics; forces and Newton's Laws; momentum, angular momentum, and energy; thermal physics and fluid mechanics; sound and waves, thermodynamics. Text is College Pbysics, by Giambattista, Richardson, and Richardson.]

## PHYS 112(1112) Physics I: Mechanics

 (PBS)Fall, spring, summer (six-week session). 4 credits. Primarily for engineering students and prospective physics majors.
Prerequisite: MATH 191. Recommended: co-registration in MATH 192. Students coregistered in MATH 191, 112, or equivalent may enroll, but PHYS 112 employs some math concepts before their completion in these calculus courses. Fall, A. LeClair: spring, E. Mueller; summer, R. Wheeler. Covers the mechanics of particles with focus on kinematics, dynamics, conservation laws, central force fields, periodic motion. Mechanics of many-particle systems: center of mass, rotational mechanics of a rigid body, and static equilibrium. At the level of University Pbysics, Vol. 1, by Young and Freedman.

## PHYS 116(1116) Physics I: Mechanics

 and Special Relativity (PBS)Fall, spring. 4 credits. More analytic than PHYS 112; intended for students who are comfortable with deeper, somewhat more abstract approach; intended mainly but not exclusively for prospective majors in physics, astronomy majors, or applied and engineering physics majors. Prerequisites: good secondary school physics course, familiarity with basic calculus, and enjoyment of puzzle-solving. Corrective transfers between PHYS 116 and PHYS 112 (in either direction) are encouraged during first three weeks of instruction. Fall,
L. Gibbons; spring, staff.

At the level of An Introduction to Mechanics by Kleppner and Kolenkow.

## PHYS 117(1117) Concepts of Modern

 PhysicsFall. 1 credit. Enrollment may be limited. Corequisite: PHYS 112 or 116 or 213 or 217. For freshmen who plan to major in physics, applied and engineering physics, or astronomy. S-U grades only. A. Sadoff. Intended for freshmen who plan to major in physics or a closely related field (i.e., applied and engineering physics or astronomy) and would like to learn about the concepts of modern physics early in their physics education. Possible topics of discussion are methodology, symmetry and conservation laws, quantum theory, the unification of forces and matter, and big-bang cosmology.

## PHYS 190(1190) Supplemental

 Introductory Laboratory Fall, spring. 1 credit. Times TBA with instructor. Limited enrollment. S-U grades only. Prerequisites: 3 transfer credits for introductory physics lecture material; a degree requirement for laboratory component of that introductory course; approval of director of undergraduate studies; and permission of lecturer of that course at Cornell. Students must file PHYS 190 permission form 121 Clark Hall with physics department course coordinator. Students perform the laboratory component of one of the introductory courses (PHYS 112, $207,208,213,214)$ to complement the lecturerelated course credit acquired elsewhere. Those wishing to take equivalent of one of these introductory courses at another institution should receive prior approval from the physics director of undergraduate studies.
## PHYS 201(1201) Why the Sky Is Blue: Aspects of the Physical World (PBS)

Fall. 3 credits. A. Sadoff.
Descriptive physics course aimed specifically at the nonscience student. There is an emphasis on the ideas of modern physics where the approach is both historical and thematic. The methodology of science and the nature of evidence is emphasized. An overriding theme is the unification and character of physical laws as shown, for example, through the great principles of symmetry and conservation. While a few computational problems are assigned, the purpose is to help students to understand the concepts rather than to master problemsolving techniques.

## PHYS 202(1202) How Physics Works

 (PBS)Spring. 3 credits. Intended for nonphysics majors. No background in either science or mathematics beyond high school algebra assumed. P. Stein.
Introduces students who are not majoring in scientific or quantitative disciplines to the techniques and ways of reasoning employed in physics. By gaining an understanding of two milestones in the history of physics (the discoveries of Newton and the application of the laws of laws of probability to physical problems), students learn about the interaction of experiment, mathematics, and conjecture that has fueled the advance of physics.

## PHYS 203(1203) Physics of the Heavens and the Earth-A Synthesis (PBS)

Spring. 3 credits. Prerequisite: none; uses high school algebra and geometry. For nonscience majors. H. Padamsee.
Shows how the unification of apparently distinct areas of physics leads to an explosion in the growth of our knowledge and
understanding. The material is divided into three parts: the physics of motion on earth: motion in the heavens: and synthesis. Trace how ideas about celestial and terrestrial motion evolved separately at first, from the ancient ideas of Greek philosophers to the dynamics and telescopic discoveries of Galileo during the Renaissance. The two arenas finally melded under Newton's Universal Gravitation. Einstein's special and general theories of relativity eventually supplanted Newton's ideas. There is an emphasis throughout on "how do we know the laws?" These are the stories of breakthrough discoveries and brilliant insights made by fascinating people, offering a humanistic perspective.

## PHYS 204(1204) Physics of Musical

 Sound (also MUSIC 204[2111]) (PBS)Spring. 3 credits. Intended for nonscientists: does not serve as prerequisite for further science courses. Assumes no scientific background but uses high school algebra. K. Selby.

Explores musical sound from a physics point of view. Topics include: how various musical instruments work; pitch, scales, intervals and tunings; hearing; room acoustics; reproduction of sound. Science writing and physics problemsolving skills are developed through weekly assignments. Student activities include hands-on investigations of musical instruments, and field trips. Students write a term paper investigating a topic of their choice. At the level of Tbe Science of Sound by Rossing. Mbore, and Wheeler.

## PHYS 207(2207) Fundamentals of Physics I (PBS)

Fall. 4 credits. Prerequisites: high school physics plus MATH 111, 190, or 191, or solid grasp) of basic notions of introductory calculus. Corequisite: math course approved by instructor. M. Liepe. A two-semester introduction to physics, intended for students majoring in an analytically oriented biokgical science, a physical science, or mathematics. The combination of lectures illustrated with applications from the sciences, meclicine, and everyday life, weekly labs tightly coupled to lectures that introduce computer-aided data acquisition and analysis, and recitations that emphasize cooperative problem-solving, provide a rich exposure to the methods of physics and the basic analytical and scientific communication skills required by all scientists. Course covers mechanics, conservation laws, waves, and topics from thermal physics, fluids, acoustics, and materials physics. At the level of Fundamentals of Pbysics, Vol. I, seventh ed.. by Halliday, Resnick, and Walker.

## PHYS 208(2208) Fundamentals of

 Physics II (PBS)Spring. 4 credits. Prerequisites: PHYS 207 or 112 or 101 ; substantial contact with introductory calculus (e.g., MATH 111, 190, or 191). 207-208 is a two-semester introduction to physics with emphasis on tools generally applicable in sciences, intended for students majoring in physical science, mathematics, or analytically oriented biological science. R. Fulbright. Covers electricity and magnetisin, and topics from geometrical and physical optics, quantum and nuclear physics. At the level of Fundamentals of Physics, Vol. II, seventh ed. by Halliday, Resnick, and Walker.

PHYS 213(2213) Physics II: Heat/ Electromagnetism (PBS)
Fall, spring, summer (six-week session). 4 credits. Primarily for students of engineering and prospective physics majors. Prerequisite: PHYS 112 and MATH 192. Students co-registered in MATH 192, 221, or equivalent may enroll, but PHYS 213 employs some math concepts before their completion in these callculus courses. Fall, M. Perelstein; spring, D. Krasicky; summer, R. Wheeler.
Topics include temperature. heat, the laws of thermodynamics, electrostatics, behavior of matter in electric fields. DC circuits, magnetic fields, Faraday's law, AC circuits, and electromagnetic waves. At the level of Unilersity Pbysics, Vols. 1 and 2, by Young and Freedman, 11th ed.

## PHYS 214(2214) Physics III: Optics,

 Waves, and Particles (PBS)Fall, spring, summer (six-week session). 4 credits. Primarily for engineering students and prospective physics majors. Prerequisites: PHYS 213 and MATH 293. Students co-registered in MATH 293, 222, or equivalent may enroll, but PHYS 214 employs some math concepts before their completion in these calculus courses. Fall, A. Giambattista; spring, staff; summer, D. Briota.

Physics of oscillations and wave phenomena, mechanical waves, sound waves,
electromagnetic waves, reflection and transmission of waves, interference and diffraction effects, transport of momentum and energy, wave properties of particles, and introduction to quantum physics.
PHYS 216(2216) Introduction to Special Relativity
Fall, spring, weeks 5-7. 1 credit. Enrollment may be limited. Co-registration in this course is requirement for registration in PHYS 217, unless the student has taken a relativity course at level of PHYS 116 or ASTRO 106. Students cannot get credit for PHYS 216 if they have taken PHYS 116. Prerequisites: PHYS 112 or 207 or permission of instructor. $\$$-U grades only
Introduction to Einstein's Theory of Special Relativity, including Galilean and Lorentz transformations, the concept of simultaneity, time dilation and Lorentz contraction, the relativistic transformations of velocity, momentum and energy, and relativistic invariance in the laws of physics. At the level of An Introduction to Mechanics by Kleppner and Kolenkow.

## PHYS 217(2217) Physics II: Electriclty and Magnetism (also A\&EP 217[2170]) (PBS)

Fall, spring. 4 credits. Enrollment may be limited. Intended for students who have done very well in PHIYS 112 or 116 and in mathematics and who desire more analytic treatment than that of PHYS 213. Prospective physics majors encouraged to register. Prerequisites: approval of student's advisor and permission of instructor. Corequisite: MATH 293 or equivalent. Placement quiz may be given early in semester, permitting students who find PHYS 217 too abstract or analytical to transfer into PHYS 213. Vector calculus is taught in this course, but previous contact, especially with the operations grad, die. and curl, is helpful. It is assumed the student has seen special relativity at level of PHYS 116 or is currently enrolled in

PHYS 216 and that student has covered material of MATH 192. Fall, M. Wang; spring, L. Pollack
At the level of Electricity and Magnetism, Vol.
2, by Purcell (Berkeley Physics Series).

## PHYS 218(2218) Physics III: Waves and

 Thermal Physics (PBS)Fall, spring. 4 credits. Enrollment may be limited. Intended for students who have done very well in PHYS 116 and 217 and in mathematics and who desire more analytic treatment than that of PHYS 214. Prospective physics majors are encouraged to register. Prerequisites: PHYS 217 (with grade of B or higher) and course in differential equations or permission of instructor. Fall, J. C. Davis; spring, staff. The first part of the course gives a thorough discussion of wave equations, including traveling waves, standing waves, energy, momentum, power, reflection and transmission, interference and diffraction. Derives wave equations on strings, sound, elastic media, and light. Covers solutions of these wave equations and Fourier series and transforms. The second part introduces thermodynamics and statistical mechanics, including heat engines, the Carnot cycle, and the concepts of temperature and entropy. Evening exams may be scheduled. At the level of Pbysics of Waves by Elmore and Heald and Thermal Pbysics by Schroeder.

## PHYS 310(3310) Intermediate

 Experimental Physics (PBS)Spring. 3 credits. Enrollment may be
limited. Prerequisite: PHYS 208 or 213. Students select from a variety of experiments. An individual, independent approach is encouraged. Facilities of the PHYS 410 lab are available for some experiments.

## PHYS 314(3314) Intermediate Mechanics

 (PBS)Spring. 4 credits. Prerequisites: PHYS 208 or 214 (or equivalent) and MATH 294 (or equivalent). Assumes prior introduction to linear algebra and Fourjer analysis. Intended for physics majors with concentration outside of physics or astronomy; PHYS 318 covers similar material at more analytical level. J. C. Davis.

Likely topics include Lagrangian mechanics; Newtonian mechanics'based on a variational principle; conservation laws from symmetries; two-body orbits due to a central force; analysis of scattering experiments; small amplitude oscillating systems including normal mode analysis; parametrically driven systems; rigid body motion; motion in non-inertial reference frames; and nonlinear behavior including bistability and chaos. Students not only become more familiar with analytic methods for solving problems in mechanics but also gain experience with computer tools. At the level of Classical Dynamics by Marion and Thorton.

## PHYS 316(3316) Basics of Quantum Mechanics (PBS)

Fall, spring. 3 credits. Prerequisites: PHYS 214 or 218 ; PHYS 116 or 216 ; and coregistration in at least MATH 294 or equivatent. Assumes that majors registering in PHYS 316 will continue with PHYS 317. Fall. G. Dugan; spring, staff.
Topics include breakdown of classical concepts in microphysics; light quanta and matter waves; Schrödinger equation and solutions for square well, harmonic oscillator, and the hydrogen atom; angular momentum,
spin, and magnetic moments. At the level of An Introduction to Quantum Pbysics by French and Taylor.

## PHYS 317(3317) Applications of

 Quantum Mechanics (PBS)Fall. 3 credits. Prerequisite: PHYS 316. K. Schwab.

Covers a number of applications of quantum mechanics to topics in modern physics. Topics include: the physics of single and multielectron atoms, quantum statistical mechanics, molecular structure, quantum theory of metals, band theory of solids, superconductivity, nuclear structure, radioactivity, nuclear reactions, and elementary particle physics.

## PHYS 318(3318) Analytical Mechanics

 (PBS)Spring. 4 credits. Prerequisites: PHYS 116 or permission of instructor; A\&EP 321 or appropriate course(s) in mathematics. Intended for junior physics majors concentrating in physics or astronomy. PHYS 314 covers similar material at less demanding level. Assumes prior exposure to Fourier analysis, linear differential equations, linear algebra, and vector analysis. E. Flanagan.
Newtonian mechanics of particles and systems of particles, including rigid bodies; oscillating systems; gravitation and planetary motion; moving coordinate systems; Euler's equations; Lagrange and Hamilton formulations; normal modes and small vibrations; introduction to chaos. At the level of Classical Mechanics by Goldstein, Classical Dynamics by Marion and Thorton, and Analytical Mecbanics by Hand and Finch. Supplementary reading is assigned.

## PHYS 323(3323) Intermediate Electricity and Magnetism (PBS)

Fall. 4 credits. Prerequisites: PHYS 208 or 213/214 (or equivalent) and MATH 293/294 (or equivalent). Recommended: coregistration in A\&EP 321 or appropriate mathematics course. Intended for physics majors with concentration outside of physics or astronomy; PHYS 327 covers similar material at more analytical level. A. Sievers.

Topics include electro/magnetostatics, boundary value problems, dielectric and magnetic media, Maxwell's Equations, electromagnetic waves, including guided waves, and sources of electromagnetic radiation. At the level of Introduction to Electrodynamics by Griffiths.

## PHYS 327(3327) Advanced Electricity

 and Magnetism (PBS)Fall. 4 credits. Prerequisites: PHYS 217/218 or permission of instructor. Corequisite: A\&EP 321 or appropriate mathematics course(s). Intended for physics majors concentrating in physics or astronomy. PHYS 323 covers similar material at less demanding level. Assumes knowledge of material at level of PHYS 217 and makes extensive use of vector calculus, and some use of Fourier transforms and complex variables. P. Brouwer.
Covers electro/magnetostatics, vector and scalar potentials, multipole expansion of the potential solutions to Laplace's Equation and boundary value problems; time-dependent electrodynamics; Maxwell's Equations, electromagnetic waves, reflection and refraction, wave guides, retarded potential, antennas; relativistic electrodynamics, four vectors, Lorentz, transformation of fields. At
the level of Classical Electromagnetic Radiation by Heald and Marion.

## PHYS 330(3330) Modern Experimental

 Optics (also A\&EP 330[3300]) (PBS)Fall. 4 credits. Limited enrollment.
Prerequisite: PHYS 214 or equivalent.
G. Hoffstaetter.

Practical laboratory course in basic and modern optics. The six projects cover a wide range of topics from geometrical optics to classical wave properties such as interference, diffraction, and polarization. Each
experimental setup is equipped with standard, off-the-shelf optics and opto-mechanical components to provide the students with hands-on experience in practical laboratory techniques currently employed in physics, chemistry, biology, and engineering. Students are also introduced to digital imaging and image processing techniques. At the level of Optics by Hecht.

## PHYS 341(3341) Thermodynamics and Statistical Physics (PBS)

Fall. 4 credits. Prerequisites: PHYS 214, 316, and MATH 294. I. Cohen. Covers statistical physics, developing both thermodynamics and statistical mechanics simultaneously. Also covers concepts of temperature, laws of thermodynamics, entropy, thermodynamic relations, and free energy. Applications to phase equilibrium, multicomponent systems, chemical reactions, and thermodynamic cycles. Application of statistical mechanics to physical systems, and introduction to treatment of MaxwellBoltzmann, Bose-Einstein, and Fermi-Dirac statistics with applications. Elementary transport theory. At the level of Fundamentals of Statistical and Thermal Pbysics by Reif.

## PHYS 360(3360) Electronic Circuits (also A\&EP 363[3630]) (PBS)

Fall, spring. 4 credits. Prerequisites: undergraduate course in electricity and magnetism (e.g., PHYS 208, 213, or 217) or permission of instructor. No previous electronics experience assumed, although course moves quickly through introductory topics such as basic dc circuits. Fall semester usually has smaller enrollment. S-U grade option available by permission of instructor for students who do not require course for major. Fall, E. Kirkland; spring, R. Thorne.
Practical electronics as encountered in a scientific or engineering research/development environment. Analyze, design, build, and test circuits using discrete components and integrated circuits. Analog circuits: resistors, capacitors, filters, operational amplifiers, feedback amplifiers, oscillators, comparators, passive and active filters, diodes and transistor switches and amplifiers. Digital circuits: combinational and sequential logic (gates, flipflops, registers, counters, timers), analog to digital (ADC) and digital to analog (DAC) conversion, signal averaging, computer architecture and interfacing. Additional topics may include analog and digital signal processing, light wave communications, transducers, and noise reduction techniques. At the level of Art of Electronics by Horowitz and Hill.

## PHYS 400(4400) Informal Advanced

 LaboratoryFall, spring. 1-3 credits, variable. Prerequisites: two years physics or permission of instructor. Fall, P. McEuen; spring, D. Hartill.

Experiments of widely varying difficulty in one or more areas, as listed under PHYS 410, may be done to fill the student's special requirements.
PHYS 410(4410) Advanced Experimental Physics (PBS)
Fall, spring. 4 credits. Prerequisite: senior standing or permission of instructor; PHYS 214 (or 310 or 360 ) plus 318 and 327 , or permission of instructor. Fall, P. McEuen; spring, D. Hartill.
Selected topics in experimental concepts and techniques. About 60 different experiments are available in acoustics, optics, spectroscopy, electrical circuits, electronics and ionics, magnetic resonance, X-rays, low temperature, solid state, cosmic rays, and nuclear physics. The student performs three to four different experiments, depending on difficulty, selected to meet individual needs and interests. Independent work is stressed. Lectures are on experimental techniques used in experiments in the laboratory and on current research topics.

PHYS 443(4443) Intermediate Quantum Mechanics (PBS)
Spring. 4 credits. Prerequisites: PHYS 327 or 323; and PHYS 316 and A\&EP 321 or appropriate mathematics course(s); coregistration in PHYS 314 or 318; or permission of instructor. Assumes prior experience in linear algebra, differential equations, and Fourier transforms. Staff. Provides an introduction to concepts and techniques of quantum mechanics, at the level of An Introduction to Quantum Mechanics by Griffiths.
PHYS 444(4444) Introduction to Particle Physics (PBS)
Spring. 4 credits. Prerequisite: PHYS 443 or permission of instructor. Staff.
The standard model of particle physics; behavior of high-energy particles and radiation; elementary particles; basic properties of accelerators and detectors; general symmetries and conservation laws. At the level of Introduction to Elementary Particles by Griffiths or Modern Elementary Particle Pbysics by Kane.

PHYS 445(4445) Introduction to General Relativity (also ASTRO 445[4445]) (PBS)
Fall. 4 credits. Offered as alternative to more comprehensive, two-semester graduate sequence PHYS 553 and 554. E. Flanagan.

One-semester introduction to general relativity, which teaches physics concepts and phenomenology while keeping mathematical formalism to a minimum. General relativity is a fundamental cornerstone of physics that underlies several of the most exciting areas of current research. These areas include theoretical high-energy physics and the search for a quantum theory of gravity, relativistic astrophysics, and in particular, cosmology, where there have been several groundbreaking observations over the last few years. It uses the new textbook Gravity: An Introduction to Einstein's General Relativity by Hartle.

PHYS 454(4454) Introductory Solid-State Physics (also A\&EP 450[4500]) (PBS)
Fall. 4 credits. Prerequisite: PHYS 443 ,
A\&EP 361, or CHEM 793 highly desirable but not required. J. Silcox.

Introduction to modern solid-state physics, including crystal structure, lattice vibrations, electron theory of metals and semiconductors, and selected topics from magnetic properties, optical properties, superconductivity, and defects. At the level of Introduction to Solid State Physics by Kittel and Solid State Physics by Ashcroft and Mermin.

## PHYS 455(4455) Geometrical Concepts

 in Physics (PBS)Spring. 4 credits. Prerequisite: PHYS 323 or equivalent and at least co-registration in PHYS 318 or permission of instructor. Usually offered every other spring.
Most non-quantum physical theories are based on one or another form of geometry: Newtonian mechanics on Euclid, electromagnetism on Minkowski, general relativity on Riemann, string theory on higher dimensionality. This course surveys the unification of classical physics that accompanies the application of Hamilton's principle of least action to these various geometries. At the level of A First Course in String Theory, Part I by Zwiebach or Geometric Mecbantcs by Talman.

## [PHY8 456(4458) Introduction to

 Accelerator Physics and Technology (also PHYS 656[7656]) (PBS)Fall. 3 credits. Prerequisites: PHYS 323 or 327 and PHYS 314 or 318. Next offered 2008-2009. G. Hoffstaetter.
Fundamental physical principles of particle accelerators and enabling technologies, with a focus on basic effects in linear and circular accelerations as high-energy physics colliders and x -ray sources.]

## PHYS 480(4480) Computational Physics (also PHYS 680[7680], AsTRO 690[7690]) (PBS) <br> Spring. 3 credits. Assumes familiarity with

 standard mathematical methods for physical sciences and engineering, differential equations and linear algebra in particular and with computerprogramming in general (e.g., Fortran or C). S-U grades only. T. Arias.

Covers numerical methods for ordinary and partial differential equations, linear algebra and eigenvalue problems, nonlinear equations, and fast Fourier transforms and nonlinear optimization problems from the hands-on perspective of how they are used in modern computational research in the era of open software and the web. Depending on the instructor, the course emphasizes different areas of computational science. Emphasis ranges from general methods for tackling PDEs, including finite-difference and spectral methods, to developing students' awn working ab initio computer program for calculating the properties of molecules and materials with the methods that won Walter Kohn and John Pople the Nobel Prize in Chemistry in 1998.

## PHYS 481(4481) Quantum Information Processing (also PHYS 681[7681], CS 483[4812])

Spring. 2 credits. S-U grades only. Prerequisite: familiarity with theory of finite-dimensional vector spaces over complex numbers.
A technology that successfully exploits fundamental principles of quantum physics can spectacularly alter both the nature of computation and the means available for the transmission of information.

## [PHYS 487(4487) Selected Topics in Accelerator Technology |also PHYS 687[7687]

Fall. 2 credits. Prerequisite: PHYS 323 or 327. S-U grades only. Next offered 20082009.

Fundamentals of accelerator technology.
Consists of a series of topical seminars
covering the principal elements of accelerator technology.]

## PHYS 488(4488) Advanced Topics in Accelerator Physics (also PHYS 688[7688])

Spring. 3 credits. S-U grades only.
G. Hoffstaetter.

After an introduction to the history of particle accelerators and to their fundamental physical principles, special topics in accelerator physics will be covered. Such topics are: microwave structures in particle acceleration, linear and nonlinear beam dynamics, collective effects and beam instabilities, characteristics of synchrotron radiation and $x$-ray experiments, a project in storage ring design, and experiments with the beam in Cornell's storage ring CESR.

## PHYS 490(4490) Independent Study in

 PhysicsFall or spring. Variable to 4 credits; max. of 8 credits may be applied to physics major. Prerequisite: permission of professor who will direct proposed work. Copy of Request for Independent Study form must be filed with physics department course coordinator, 121 Clark Hall. Individual project work (reading or laboratory) in any branch of physics.

## PHYS 500(6500) Informal Graduate

 LaboratoryFall, spring. Variable to 2 credits.
Prerequisite: permission of instructor. Fall, P. McEuen; spring, D. Hartill.

Experiments of widely varying difficulty in one or more areas, as listed under PHYS 510, may be done to fill special requirements.

## PHYS 510(6510) Advanced Experimental Physics <br> Fall, spring. 3 credits. Optional lec

 associated with PHYS 410 available M. Fall P. McEuen; spring, D. Hartill.About 60 different experiments are available in acoustics, optics, spectroscopy, electrical circuits, electronics and ionics, magnetic resonance, X-rays, low temperature, solid state, cosmic rays, and nuclear physics. Students perform three to four experiments selected to meet individual needs.
Independent work is stressed. Lectures include techniques used in experiments in the advanced laboratory and on current research topics.

## PHYS 520(6520) Projects In Experimental Physles

Fall, spring. Variable to 3 credits. Prerequisite: PHYS 510. To be supervised by faculty member. Students must advise department course coordinator of faculty member responsible for project.
Projects of modern topical interest that involve some independent development work by student. Opportunity for more initiative in experimental work than is possible in PHYS 510.

## [PHYS 525(6525) Physlcs of Black Holes, White Dwarfs, and Neutron Stars (also ASTRO 511[6511])

Spring. 4 credits. Prerequisite: none. D. Lai Next offered 2008-2009.
For description, see ASTRO 511.]
[PHYS 553-554(6553-6554) General Relativity (also ASTRO 509-510[6509-6510])
553, fall; 554, spring. 4 credits. Prerequisite: knowledge of special relativity and methods of dynamics at level of Classical Mechanics by Goldstein. Next offered 2008-2009. J. York.
Introductory study of Einstein's theory using methods of vector analysis, differential geometry, and tensor calculus. Topics include moving frames, connections and curvature, equivalence principle, variational principle. electrodynamics, hydrodynamics,
thermodynamics, statistical mechanics in the presence of gravitational fields, special. relativity from the viewpoint of GR, GR as a dynamical theory, and experimental tests of GR. At the level of Gravitation by Misner, Thorne, and Wheeler and General Relatitity by Wald. Hartles's book Gravity: An Introduction to Einstein's General Relativity' may also be useful. PHYS 554 is a continuation of 553, which emphasizes applications to astrophysics and cosmology. Topics include gravitational collapse and black holes, gravitational waves, elementary cosmology, and the use of active gravitational dynamics as a fundamental element of astrophysical and cosmological research.]

## PHYS 561(6561) Classical

## Electrodynamics

Fall. 3 credits. C. Csaki.
Covers Maxwell's equations, electromagnetic potentials, electrodynamics of continuous media (selected topics), special relativity, and radiation theory. The practical application of appropriate mathematical methods is emphasized. At the level of Classical Electrodynamics by Jackson.

## PHYS 562(6562) Statistical Mechanics

Spring. 4 credits. Primarily for graduate students. Prerequisites: good knowledge of quantum mechanics, classical mechanics, and undergraduate-level thermodynamics or statistical mechanics class. Staff.
Starts with the fundamental concepts of temperature, entropy, and free energy, defining the microcanonical, canonical, and grand canonical ensembles. Touches upon Markov chains, random walks, diffusion equations, and the fluctuation-dissipation theorem. Covers Bose-Einstein and Fermi statistics, black-body radiation, Bose condensation, superfluidity, metals, and white dwarves. Discusses fundamental descriptions of phases, and introduce Landau theory, topological order parameters, and the homotopy classification of defects. Briefly studies first-order phase transitions and critical droplet theory and concludes with a discussion of critical phenomena, scaling, universality, and the renormalization group.

## PHYS 572(6572) Quantum Mechanics I

## Fall. 4 credits. V. Elser.

Covers the general principles of quantum mechanics, formulated in the language of Dirac. Covers systems with few degrees of freedom such as hydrogen atom, including fine and hyperfine structure. Theory of angular momentum, symmetries, perturbations and collisions are developed to analyze phenomena displayed by these systems. At the level of Quantum Mechanics: Fundamentals by Gottfried and Yan. A knowledge of the subject at the level of PHYS 443 is assumed, but the course is self-contained.

## PHYS 574(6574) Applications of

 Quantum Mechanics IISpring. 4 credits. Knowledge of concepts and techniques covered in PHYS 561 and 572 and of statistical mechanics at undergraduate level assumed. Possible topics include identical particles, many electron atoms, second quantization, quantization of the electromagnetic field, scattering of complex systems, radiative transitions, and introduction to the Dirac equation.

## PHYS 599(6599) Cosmology (also ASTRO 599[6599]) <br> For description, see ASTRO 599

PHYS 635(7635) Solid-State Physics I
Fall. 3 credits. Prerequisites: good undergraduate solid-state physics course (e.g., PHYS 454), as well as familiarity with graduate-level quantum mechanics. D. Ralph.

Survey of the physics of solids: crystal structures, $x$-ray diffraction, phonons, and electrons. Selected topics from semiconductors, magnetism, superconductivity, disordered materials, dielectric properties, and mesoscopic physics. The focus is to enable graduate research at the current frontiers of condensed matter physics.

## PHYS 636(7636) Solid-State Physics II

Spring. 3 credits. Prerequisite: PHYS 635. Staff.
Continuation of PHYS 635. Topics from quantum condensed matter physics not included in that course, which may include Fermi Liquid Theory, magnetism, superconductivity, broken symmetries, elementary excitations, topological defects, superfluids, the quantum Hall effect, mesoscopic quantum transport theory, Anderson localization, and other metal insulator transitions.

## PHYS 645(7645) An Introduction to the Standard Model of Particle Physics

Spring. 3 credits. A. Ryd.
This course is an introduction to the Standard Model of particle physics. Familiarity with Feynman rules, Lagrangians, and relativistic wave equations at the level of PHYS 651 is assumed. Topics covered include strong and electro-weak interactions, Higgs mechanism, and phenomenology of weak interactions, the quark model, particle accelerators and detectors. The course is taught at the level of Electroweak Interactions: An Introduction to the Pbysics of Quarks and Leptons by Peter Renton and Introduction to High-Energy Physics by Donald H. Perkins.

## PHY\$ 646|7646) Topics in Hlgh-Energy Particle Physics

Spring. 3 credits. Staff.
Covers topics of current interest, such as highenergy electron and neutrino interactions, electron positron annihilation, and highenergy hadronic reactions.

## PHYS 651(7651) Relativistlc Quantum Field Theory I

Fall. 3 credits. S-U grades only.
Y. Grossman.

Topics include consequences of causality and Lorentz invariance, quantization of KleinGordon and Dirac fields, perturbation theory, Feynman diagrams, calculation of cross sections and decay rates, and an introduction to radiative corrections and renormalization with applications to electromagnetic and
interactions. At the level of An Introduction to Quantum Field Theory by Peskin and Schroeder.

## PHYS 652(7652) Relatlvistic Quantum

 Fleid Theory IISpring. 3 credits. S-U grades only. C. Csaki. A continuation of PHYS 651. Introduces more advanced methods and concepts in quantum field theory. Topics include renormalization, non-abelian gauge theories, functional integral methods, and quantization of non-abelian gauge theories, spontaneous symmetry breaking, anomalies, solitons, and instantons. At the level of An Introduction to Quantum Field Theory by Peskin and Schroeder.

PHYS 653(7653) Statistical Physics
Fall. 3 credits. Prerequisites: quantum mechanics at level of PHYS 572, statistical physics at level of PHYS 562. S-U grades only. C. Henley.
Survey of topics in modern statistical physics selected from phase transitions and the renormalization groups, linear response and fluctuations-dissipation theories; quantum statistical mechanics; and nonequilibrium statistical mechanics.

## PHYS 654(7654) Basic Training in Condensed Matter Physics

Spring. 3 credits. Prerequisites: PHYS 562, $574,635,636$, and 653 or permission of instructor. S-U grades only. Staff. Advanced topics in condensed-matter physics are taught by several members of the faculty. Past modules include random matrix theory, the quantum Hall effect, disordered systems and computational complexity, and asymptotic analysis. Future topics may include dilute cold gases and exotic quantum phenomena, thermodynamic Green's functions, $1 / \mathrm{N}$ expansions, density functional theory, instantons, dynamical mean-field theory, conformal field theory, Fermi liquid theory and superconductivity, localization and disordered metals, renormalization groups, duality transformations, Luttinger liquids, frustrated and quantum magnetism, and Chern-Simons gauge theory. Detailed course content will be announced at the end of the fall semester.

## [PHYS 656(7656) Introduction to

 Accelerator Physlcs and Technology (also PHYS 456[4456])Next offered 2008-2009.
For description, see PHYS 456.]

## [PHYS 661(7661) Advanced Toples In

 High-Energy Particle TheoryFall. 3 credits. Prerequisite: PHYS 652. S-U grades only. Next offered 2008-2009. Presents advanced topics of current research interest. Subject matter varies from year to year. Some likely topics are two-dimensional conformal field theory with applications to string theory.]

## [PHYS 665(7665) Sominar: Astrophy Gas

 Dynamics (also AsTRO 699[7699])Next offered 2008-2009
For description, see ASTRO 699.]

## [PHYS 667(7667) Theory of Stellar

 Structure and Evolution (also ASTRO 560[6560])Next offered 2008-2009.
For description, see ASTRO 560.]

PHYs 680(7680) Computational Physics (also PHYS 480[4480], ASTRO 690[7690])
For description, see PHYS 480.

## PHYS 681-689(7681-7689) Special

 ToplesOfferings are announced each semester. Typical topics are group theory, analyticity in particle physics, weak interactions, superfluids, stellar evolution, surface physics, Monte Carlo methods, low-temperature physics, magnetic resonance, phase transitions, and the renormalization group.

PHYS 681(7681) Quantum Information Processing (also PMYS 481[4481], C8 483[4812])
For description, see PHYS 481.

## PHYS 682(7682) Computational Methods for Nonlinear Systems (also CIS 629[6229]

Fall. 4 credits. Enrollment may be limited. Graduate computer laboratory, focusing on the next generation of tools for computation, simulation, and research in a broad range of fields of interest to the IGERT program and the Life Sciences Initiative. The course is pitched at a high level of computational sophistication, but is designed to fit into the busy schedules of first-year graduate students.

## [PHYS 687(7687) Selocted Topics In Accelerator Technology (also PHYs 487[4487]

Next offered 2008-2009.
For description, see PHYS 487.]

## PHY8 688(7688) Advanced Toplcs in Accelerator Physics (also PHYS 486[4488]]

For description, see PHYS 488.
PHYS 690(7690) Independent Study in Physics
Fall or spring. Variable to 4 credits.
Students must advise department course
coordinator, 121 Clark Hall, of faculty
member responsible for grading their
project. S-U grades only.
Special graduate study in some branch of physics, either theoretical or experimental, under the direction of any professorial member of the staff.

## POLISH

See "Department of Russian."

## PORTUGUESE

See "Department of Romance Studies."

## PSYCHOLOGY

S. L. Bem, M. Christiansen, J. E. Cutting, T. J. DeVoogd, D. A. Dunning, S. Edelman, M. Ferguson, D. J. Field, B. L. Finlay, T. D. Gilovich, M. Goldstein, B. P. Halpern, A. M. Isen, R. E. Johnston, C. L. Krumhansl, D. A. Levitsky, J. B. Maas, D. A. Pizarro,
H. S. Porte, D. T. Regan, E. A. Regan, H. Segal, D. Smith, M. Spivey, B. J. Strupp, V. Zayas

The major areas of psychology represented in the department are perceptual and cognitive psychology, biopsychology, and personality and social psychology. These areas are very broadly defined, and the courses are quite diverse. Biopsychology includes animal learning, neuropsychology, interactions between hormones, other biochemical processes, and behavior. Perceptual and cognitive psychology includes such courses as cognition, perception, memory, and
psycholinguistics. Personality and social psychology is represented by courses in social psychology and personality (e.g., Psychology and Law, Judgment and Decision Making), as well as courses in fieldwork and psychopathology. In addition to the three major areas mentioned above, the department emphasizes the statistical and logical analysis of psychological data and problems.

## The Major

Admission to the major is usually granted to any student in good standing in the college who has passed three or more psychology courses with grades of $\mathrm{C}+$ or better.
Provisional admission requires two such courses. To apply to the major and receive an advisor, a major application form may be obtained from the department office ( 211 Uris Hall) and should be completed and taken to one of the faculty members whose name is listed on the form.
Requirements for the major are:

1. a total of 40 credits in psychology (including prerequisites), from which students majoring in psychology are expected to choose, in consultation with their advisors, a range of courses that covers the basic processes in psychology (laboratory and/or field experience is recommended); and
2. demonstration of proficiency in statistics before the beginning of the senior year. (See the section below on the statistics requirement.)
Normally it is expected that all undergraduate psychology majors will take at least one course in each of the following three areas of psychology:
3. Perceptual cognition and development (PCD)

## 2. Behavioral and evolutionary neuro science (BEN)

## 3. Personality and social psychology

The following classification of Department of Psychology offerings is intended to help students and their advisors choose courses that will ensure that such breadth is achieved.

1. Perceptual cognition and
development: PSYCH 205, 209, 214, 215, $281,305,316,342,412,414,416,418,426$, $427,428,436,465,492$.
2. Behavioral and evolutionary neuro science: PSYCH 223, 322, 324, 326, 332, $361,396,424,425,429,431,435,440,492$
3. Personality and social psychology: PSYCH 265, 275, 280, 325, 327, 328, 380, $385,452,481,482,485,491$
4. Other courses: PSYCH 101, 199, 282, $347,350,410,440,441,470,471,472,473$, 478. The major advisor determines to which group, if any, these courses may be applied.
With the permission of the advisor, courses in other departments may be accepted toward the major requirements.

## Fieldwork, independent study, and

teaching. The department requires students to observe the following limits on fieldwork, independent study, and teaching.

1. Undergraduates may not serve as teaching assistants for psychology courses if they are serving as teaching assistants for any other course during the same semester.
2. An undergraduate psychology major cannot apply more than 12 of the credits earned in independent study (including honors work) and fieldwork toward the 40 credits required by the major.
Statistics requirement. Proficiency in statistics can be demonstrated in any one of the several ways listed below.
3. Passing PSYCH 350.
4. Passing an approved course or course sequence in statistics in some other department at Cornell.
5. Passing a course or course sequence in statistics at some other college, university, or college-level summer school. The course or sequence must be equivalent to at least 6 semester credits. The description of the course from the college catalog and the title and author of the textbook used must be submitted to Professor Gilovich for approval.
6. Passing an exemption examination. This examination can be given at virtually any time during the academic year if the student gives notice. at least one week before. Students who have completed a theoretical statistics course in a department of mathematics or engineering and who wish to demonstrate competence in applied statistics usually find this option the easiest. Students planning this option should discuss it in advance with Professor Gilovich.

## Concentration in biopsychology.

Psychology majors interested in psychology as a biological science can elect to specialize in biopsychology. Students in this concentration must meet all of the general requirements for the major in psychology and must also demonstrate a solid background in biology; the physical sciences, including at least introductory chemistry; and mathematics. Students will design with their advisors an integrated program in biopsychology built around courses on physiological, chemical, anatomical, and ecological determinants of human and nonhuman behavior offered by the Department of Psychology. Additional courses in physiology, anatomy, biochemistry, neurochemistry, neurobiology, and behavioral biology may be designated as part of the psychology major after consultation between the student and his or her biopsychology advisor.

Concentration in personality and social psychology. Psychology majors who wish to specialize in social psychology are expected to meet the general requirements set by their department, including statistics. To ensure a solid interdisciplinary grounding, students in the concentration are permitted to include some major courses in sociology and related fields. Advisors will assist students in the selection of a coherent set of courses from social organization, cultural anthropology, experimental psychology, social methodology, and several aspects of personality and social psychology. Seniors in the concentration may elect advanced and graduate seminars, with the permission of the instructor.
Undergraduate honors program. The honors program is designed for exceptional students who wish to pursue an intensive and independent program of research in psychology. Successful participation serves as evidence of the student's facility in the two most important skills required of an academic psychologist: namely, the capacity to acquire and integrate a substantial body of theoretical and factual material and the ability to devise and execute a creative empirical research project.
The honors program offers students the closest contact and consultation with faculty they will likely experience while at Cornell, and all qualified majors who are planning graduate work in any academic field should consider applying. However, it should also be noted that conducting honors research and completing a thesis is an extremely demanding undertaking, both in time and effort. Due to the demands of both research and writing, it is expected that after the Christmas break, honors students will return to campus as early as possible to continue their work, as well as remain on campus through all of spring break.
The focus of the honors program is conducting an experiment, analyzing the data that result, and describing the project in a thesis that closely approximates a professional-level research report both in form and quality. The research project is to be conducted under the close sponsorship of a faculty member. Subject to approval, the sponsor need not be in the psychology department per se. Students that successfully complete the honors program graduate with one of levels of honors, which is noted on their diplomas. The customary level is cum laude, awarded to approximately two-thirds of psychology honors graduates. Approximately one-third receive the next higher level of honors, which is magna cum laude. A student who has both an unusually strong academic record in psychology and completes a thesis of exceptionally high quality will be considered for summa cum laude, the highest level of honors. However, those are unusual cases. The T. A. Ryan Award, accompanied by a cash prize, is awarded to the student who conducts the best honors project in a given year. Students in the program register for 3 or 4 credits of PSYCH 471 Independent Study in both fall and spring semesters. Format and binding of the thesis follows guidelines for the doctoral dissertation and master's thesis, outlined by the Cornell University Graduate School. Stylistic format is APA style. Alternative style formats are possible, if approved in advance.

## Computing in the Arts Undergraduate Concentration

A concentration in Computing in the Arts with an emphasis on psychology is available both
to psychology majors and to students majoring in other subjects. For more information, see pages

## Courses

PSYCH 101(1101) Introduction to Psychology: The Frontiers of Psychological Inquiry (SBA-AS)
Fall, summer (six-week). 3 credits.
Attendance at lec mandatory. Students who
wish to take disc seminar should also
enroll in PSYCH 103. M W F. J. B. Maas
The study of human behavior. Topics include brain functioning and mind control, psychophysiology of sleep and dreaming, psychological testing, perception, learning, cognition, memory, language, motivation, personality, abnormal behavior, psychotherapy, social psychology, and other aspects of applied psychology. Emphasis is on developing skills to critically evaluate claims made about human behavior.
PSYCH 102(1200) Introduction to Cognitive Science (also COAST 101[1101], CS 101[1710], LING 170[1170], PHIL 191[1910]) (KCM-AS)
Fall, summer (six-week). 3 or 4 credits (4-credit option involves writing sec instead of exams). T R. M. Spivey.
For description, see COGST 101.

## PSYCH 103(1103) Introductory

 Psychology SeminarsFall. 1 credit. Limited to 200 students. Corequisite: PSYCH 101. 12 different time options. J. B. Maas and staff.
Weekly seminar that may be taken in addition to PSYCH 101 to provide an in-depth exploration of selected areas in the field of psychology. Involves extensive discussion and a semester paper related to the seminar topic. Choice of seminar topics and meeting times are available at the second lecture of PSYCH 101.
PSYCH 111(1110) Brain, Mind, and Behavior (also BIONB/COGST 111[1110]) (PBS)
Spring. 3 credits. Letter grades only.
Prerequisite: freshmen and sophomores in humanities and social sciences; juniors and seniors not allowed. Not recommended for psychology majors; biology majors may not use for credit toward major. M W F.
E. Adkins Regan and R. Hoy.

For description, see COGST 111.

## PSYCH 165(1650) Computing in the Arts

 (also CS/CIS/ENGRI 165[1650], MUSIC 165[1465])Fall. 3 credits. G. Bailey.
For description, see CS 165.
PSYCH 205(2050) Perception (also PSYCH 605[6050])
Spring. 3 credits. Open to all students. Graduate students, see PSYCH 605. T R. J. E. Cutting.

One of four introductory courses in cognitive psychology. Basic perceptual concepts and phenomena are discussed with emphasis on stimulus variables and sensory mechanisms. All sensory modalities are considered. Visual and auditory perception are discussed in detail.

PSYCH 209(2090) Developmental Psychology (also PsYCH 709[7090]) (KCM-AS)
Spring. 4 credits. Graduate students, see PSYCH 709. M W. M. Goldstein.
One of four introductory courses in cognition and perception. A comprehensive introduction to current thinking and research in developmental psychology that approaches problems from both psychobiological and cognitive perspectives. We will use a comparative approach to assess principles of development change. The course focuses on the development of perception, action, cognition, language and social understanding in infancy and early childhood.
PSYCH 214(2140) Cognitive Psychology (also PSYCH 614[6140], COGST 214[2140], COGST 614[6140]) (KCM-AS)
Fall. 3 credits. Limited to 175 students.
Prerequisite: sophomore standing.
Graduate students, see PSYCH 614. M W F. S. Edelman.

Introduces the idea of cognition as information processing or computation, using examples from perception, attention and consciousness, memory, language, and thinking. Participants acquire conceptual tools that are essential for following the current thought on the nature of mind and its relationship to the brain.

## PSYCH 215(2150) Psychology of

 Language (also COGST $215[2150]$, LING 215[2215]) (KCM-AS)Spring. 3 credits. Prerequisites: sophomore, junior, or senior standing; any one course
in psychology or human development. T R. M. Christiansen.

Provides an introduction to the psychology of language. The purpose of the course is to introduce students to the scientific study of psycholinguistic phenomena. Covers a broad range of topics from psycholinguistics, including the origin of language, the different components of language (phonology, morphology, syntax, and semantics), processes involved in reading, computational modeling of language processes, the acquisition of language (both under normal and special circumstances), and the brain bases of language.
PSYCH 223(2230) Introduction to Biopsychology (PBS: supplementary IIst)
Fall. 3 credits. Prerequisites: none. May be used to satisfy psychology major breadth requirement and as alternative prerequisite for upper-level biopsychology courses. D. Smith.

Introduction to psychology from a biological perspective, including both evolutionary and physiological approaches to behavior. Topics include the structure and function of the nervous system, genetic and biochemical models of behavior, hormones and behavior, biological bases of learning, cognition, communication, and language, and the evolution of social organization.
Introductory courses in social and personality psychology. Each of the following three courses (265, 275, 280) provides an introduction to a major area of study within social and personality psychology. These courses are independent of one another, and none have any prerequisites. Students may take any one of the courses or any combination of them (including all three). Courses may be taken in any order or simultaneously.

## PSYCH 231(2310) Borges and If A Quest

 for Self-Knowledge (KCM-AS)Spring. 4 credits. Limited to 15 students. S. Edelman.

This seminar will survey the state of the art in theoretical neuroscience, a discipline whose ultimate goal is finding the mind in the brain. Our journey through the scientific literature on minds and brains, covering topics such as memory and identity, love, solitude and society, language, creativity, religion, and morality, will be accompanied by a choice of short stories by Jorge Luis Borges.

## PSYCH 265(2650) Peychology and Law

 (SBA-AS)Fall. 3 credits. M W F. D. A. Dunning. Examines the implications of psychological theory and methods for law and the criminal justice system. Concentrates on psychological research on legal topics (e.g., confession, eyewitness testimony, jury decision making, homicide, aggression, the prison system), social issues (e.g., death penalty, affirmative action), and on psychologists as participants in the legal system (e.g., assessing insanity and dangerousness and for expert testimony).

## PSYCH 27512750) Introduction to

## Personality Psychology (also ND

 260(2600]) (SBA-AS)Fall. 3 credits. Recommended: introductory psychology or human development. V. Zayas.

A shared assumption among personality psychologists is that each person possesses a personality-i.e., characteristic ways of thinking, feeling, and behaving-that uniquely distinguishes him or her from other people. Each individual's personality is the culmination of his or her genetic makeup, biology, early life experiences, learning and culture. In this undergraduate-level course, we will review the major theories and research paradigms (e.g., trait, biological, cognitive) of modern-day personality psychology. The course will emphasize contemporary research, theory, and methodology, as well as provide a review of historical accounts that have significantly contributed to current conceptualizations.

## PSYCH 280(2800) Introduction to Social

 Psychology (8BA-AS)Spring, summer (three-week). 3 credits. T R. T. D. Gilovich and D. T. Regan.

Introduction to research and theory in social psychology. Topics include social influence, persuasion, and attitude change; social interaction and group phenomena; altruism and aggression; stereotyping and prejudice; and everyday reasoning and judgment.

## [PSYCH 282(2820) Community Outreach (also HD 28242820])

Fall. 2 credits. Prerequisites: PSYCH 101 or HD 115. Next offered 2008-2009. T. H. Segal.

Provides students with information and perspectives essential to volunteer fieldwork with human and social service programs in the community. Readings are drawn from the field of community psychology and include analyses of successful programs, such as Head Start, as well as a review of the methods by which those programs are developed and assessed. Although students are not required to volunteer, the instructor provides students with a list of local agencies open to student placements.]

## [PSYCH 305(3050) Visual Perception

 (also VISST 305[3305])Fall. 4 credits. Limited to 25 students. Prerequisite: PSYCH 205 or permission of instructor. M W F. Next offered 2008-2009 J. E. Cutting.

Detailed examination of pictures and their comparison to the real world. Linear perspective in Renaissance art, photography, cinema, and video is discussed in light of contemporary research in perception and cognition.]
PSYCH 313(3130) Problematic Behavior in Adolescence (also HD 313[3130])
Fall. 3 credits. Prerequisite: HD 115 or PSYCH 101. Recommended: HD 216. M W J. Haugaard.

For description, see HD 313
[PSYCH 316(3160) Auditory Perception (also PSYCH 716[7160]) (KCM-AS)
Fall. 3 or 4 credits; 4 -credit option involves lab project or paper. Limited to 30 students. Prerequisite: PSYCH 102, 205, 209 , or 214 (or other psychology, linguistics, or biology courses by permission of instructor). Graduate students, see PSYCH 716. M W. Next offered 2008-2009. C. L. Krumhansl.
Covers the major topics in auditory perception including: physics of sound; structure and function of the auditory system; perception of loudness, pitch, and spatial location, with applications to speech production and perception; and music and environmental sounds.]

## PSYCH 322(3220) Hormones and Behavior (also BIONB 322[3220], PSYCH 722[7220]) (PBS)

Fall. 3 credits. Two lec plus sec in which students read and discuss original papers in the field, give an oral presentation, and write a term paper: Prerequisites: junior or senior standing; any one of the following: PSYCH 223, BIONB 221 or 222, or one year introductory biology plus psychology course. Graduate students, see PSYCH 722. M W F. E. Adkins Regan
Comparative and evolutionary approaches to the study of the relationship between
reproductive hormones and sexual behavior in vertebrates, including humans. Also hormonal contributions to parental behavior, aggression, stress, learning and memory, and biological rhythms.

## [PSYCH 324(3240) Blopsychology Laboratory (also BIONB 324[3240]) (PBS)

Fall. 4 credits. Limited to 20 students Prerequisites: junior or senior standing PSYCH 223 or BIONB 221 or 222, and permission of instructor. Next offered 2008-2009, T R. T. J. DeVoogd.
Experiments designed to provide experience in animal behavior (including learning) and its neural and hormonal mechanisms. A variety of techniques, animal species, and behavior patterns are included.]

## PSYCH 325(3250) Adult Psychopathology

 (also HD 370[3700]) (SBA-AS)Spring. 3 credits. Prerequisite: sophomore, junior, or senior standing; any one course in psychology or human development. T R No S-U option. M W. H. Segal.
A theoretical and empirical approach to the biological, psychological, and social (including cultural and historical) aspects of aclult psychopathology. Readings range from Freud
to topics in psychopharmacology. The major mental illnesses are covered, including schizophrenia as well as mood, anxiety, and personality disorders. Childhood disorders are not covered.

## PSYCH 326(3260) Evolution of Muman

 Behavior (also PSYCH 626[6260]) (PBS: Supplementary Llst)Spring. 4 credits. Prerequisite: PSYCH 223, or introductory biology, or introductory anthropology. Graduate students, see PSYCH' 626. T R. R. E. Johnston.
Broad comparative approach to the behavior of animals and humans with special emphasis on the evolution of human behavior. Topics vary but include some of the following: human evolution, evolutionary and sociobiological theory, animal communication, nonverbal communication, language, cognitive capacities, social behavior and organization, cooperation and altruism, sexual behavior, mating and marriage systems, aggression, and warfare.

## [PSYCH 327(3270) Field Practicum I

 (also HD 327[3270]) (SBA-AS)Fall only. 3 credits. Limited enrollment. Prerequisites: PSYCH 325 or HD 370 (or taken concurrently), and permission of instructor. Students must commit to taking PSYCH 328 in spring semester. Letter grades only. Next offered 2008-2009. M W H. Segal.

Composed of three components that form an intersive undergraduate field practicum. First, students spend three to six hours a week at local mental health agencies, schools, or nursing facilities working directly with children, adolescents, or adults; supervision is provided by host agency staff. Second, the instructor provides additional weekly individual, clinical supervision for each student. Third, seminar meetings cover issues of adult and developmental psychopathology, clinical technique, case studies, and current research issues. Students write one short paper, two final take-home exams, and present an account of their field experience in class.]

## PSYCH 328(3280) Field Practicum II

 (also HD 328[3280]) (SBA-AS)Spring. 3 credits. Limited enrollment. Prerequisites: PSYCH 327 taken previous semester, PSYCH 325 or HD 370 (or taken concurrently), permission of instructor Letter grades only. M W. H. Segal.
Continues the field practicum experience from PSYCH 327.

PSYCH 330(3300) Introduction to Computational Neuroscience (also BIONB/COGST 330[3300]) (PBS| Fall. 3 credits. Limited to 25 students. Prerequisite: BIONB 222 or permission of instructor. S-U or letter grades. Offered alternate years. C. Linster.
For description, see BIONB 330.

## PSYCH 332(3320) Biopsychology of

 Learning and Memory (also BIONB 328[3280], PSYCH 632[6320]) (PBS) Spring. 3 credits. Limited to 60 students. Prerequisites: one year of biology and either a biopsychology course or BIONB 222. Graduate students, see PSYCH 632. M W F. T. J. DeVoogd.Surveys the approaches that have been or are currently being used to understand the biological bases for learning and memory Topics include invertebrate, "simple system" approaches, imprinting, avian song learning,
hippocampal and cerebellar function, or research using fMRI pathology in humans. Many of the readings are from primary literature.

## PSYCH 340(3400) Autobiographical

 MemorySpring. 3 credits. Limited to 20 students
Prerequisites: any one course in psychology or human development. Staff. Much recent research has focused on people's ability to remember-and often to misremember-cheir own life experiences. This course reviews that research, including such topics as "flashbulb" memories, "childhood amnesia," the development of memory in children, cultural differences, the "false memory syndrome," eyewitness testimony, prospective memory, sex differences, recall of school learning, the amnesic syndrome, and the relation between memory and self

## PSYCH 342(3420) Human Perception:

 Applications to Computer Graphics, Art, and Visual Display (also PSYCH 642[6420], COGST 342[3420], VISST 342[3342])Fall. 3 or 4 credits; 4 -credit option involves term paper. Highly recommended: PSYCH 205. Graduate students, see PSYCH 642. T R. D. J. Field.
Our present technology allows us to transmit and display information through a variety of media. To make the most of these media channels, it is important to consider the limitations and abilities of the human observer. The course considers a number of applied aspects of human perception with an emphasis on the display of visual information Topics include "three-dimensional" display systems, color theory, spatial and temporal limitations of the visual systems, attempts at subliminal communication, and "visual" effects in film and television.

## PSYCH 347(3470) Psychology of Vlsual

 Communications (SBA-AS)Spring. 3 credits. Limited to 15 students.
Prerequisites: PSYCH 101 and permission of instructor. R. J. B. Maas.
Exploration of theories of education,
communication, perception, attitude, and behavior change as they relate to the effectiveness of visually based communication systems. Emphasis is on the use of photography and computer graphics to deliver educational messages. A digital camera with manual control of f-stops and shutter speed is mandatory.

## PSYCH 350(3500) Statistics and

 Research Design (MQR)Fall, summer (three-week). 4 credits. Limited to 120 students. M W F. Staff Acquaints the student with the elements of statistical description (e.g., measures of average, variation, correlation) and, more important, develops an understanding of statistical inference. Emphasis is placed on those statistical methods of principal relevance to psychology and related behavioral sciences.

## [PSYCH 361(3610) Blopsychology of

 Normal and Abnormal Behavior (also NS 361[3610]) (PBS: Supplementary List)Spring. 3 credits. Limited to 50 students in psychology and 50 students in nutritional sciences. Prerequisites: junior or senior standing; introductory biology and introductory psychology or permission of instructor. S-U or letter grades. M W F. Next offered 2008-2009. B. J. Strupp.

Critical evaluation of factors thought to underlie normal and abnormal behavior and or cognitive functioning. Psychological, biological, and societal influences are integrated. Topics include the psychobiology of learning and memory; nutritional influences on behavior/cognition (e.g., sugar, food additives, choline); cognitive dysfunction (e.g. amnesia, Alzheimer's disease); developmental exposure to environmental toxins and drugs of abuse; and psychiatric disorders (depression, eating disorders).]

## PSYCH 380(3800) Social Cognition (SBA-AS)

Fall. 3 credits. Prerequisites: junior or senior standing; PSYCH 280. T R.

## M. Ferguson.

What are the causes and consequences of our own and other's judgments, feelings, attitudes, and behaviors? This course introduces students to social cognition, which is a research perspective that uses both cognitive and social psychological theories and methodologies to explain such social phenomena.

## PSYCH 385(3850) The Psychology of Emotion (SBA-AS)

Fall. 3 credits. D. Pizarro.
We've all been mad, sad. happy, and disgusted. Some of us get nostalgic at times, and some of us are easily embarrassed. We've been feeling these emotions nearly our whole lives, and this makes us all emotion experts of a sort. Nonetheless, these feelings can be mysterious. Where do they come from? Do people across all cultures experience similar emotions? How can we regulate our emotions? Do emotions make us less rational? Do they make us smarter? What triggers certain emotions? Are there gender differences in emotions? The science of emotion is fairly young, but there has been an enormous amount of progress in understanding emotional phenomena in the last few decades. In this course, we will tackle the aforementioned questions and more. By the end of the course you should be familiar with the most influential theories of emotion-from the evolutionary explanations of emotion to the developmental and social factors involved in making us emotional creatures. So while we are all intuitive experts on emotion, by the end of the course you will have a different kind of expertise-one grounded in the most recent scientific discoveries in this exciting field.

## [PSYCH 396(3960) Introduction to

 Sensory Systems (also BIONB 396[3960]) (PBS)Spring. 4 credits. Limited to 35 students.
Next offered 2009-2010. B. P. Halpern. Somesthetic, auditory, and visual system neuroscience principles and methods of study are taught using the Socratic method. Original literature read and discussed.]

## [PSYCH 405(4050) Intuitive Judgment

 (SBA-AS)Fall. 4 credits. Limited to 18 students by application. Priority given to senior psychology majors. Prerequisites: at least one course in each of social and cognitive psychology. Next offered 2009-2010. T. Gilovich.

Judgment pervades everyday experience. Can this person be trusted? Does this relationship have promise? Is the economy likely to flourish? This course examines how people answer such questions by examining-in depth-classic and contemporary scholarship
on the subject. Readings are mostly primary sources.]

## PSYCH 410(4101) Undergraduate Seminar in Psychology

Fall or spring. 2 credits. Priority given to psychology majors. Staff. Information on specific sections for each semester, including instructor, prerequisites, and time and place, may be obtained from the Department of Psychology office, 211 Uris Hall.

## PSYCH 412(4120) Laboratory in

 Cognition and Perception (also PSYCH 612[6120]) (KCM-AS)Spring. 4 credits. Limited to 15 students. Prerequisite: statistics and one course in cognition or perception recommended. Graduate students, see PSYCH 612. M W. D. J. Field.

Laboratory course designed to introduce students to experimental methods in perception and cognitive psychology. Students take part in a number of classic experiments and develop at least one independent project. Computers are available and used in many of the experiments although computer literacy is not required. Projects are selected from the areas of visual perception, pattern recognition. memory, and concept learning.

## [PSYCH 414(4140) Comparative

 Cognition (also PSYCH 714[7140], COGST 414[4140]) (KCM-AS)Spring. 3 or 4 credits; 4 -credit option involves annotated bibliography or creation of relevant weh site. Prerequisites: PSYCH $205,209,214,223,292$ or permission of instructor. Graduate students, see PSYCH
714. T R. Next offered 2008-2009. Staff. Examines some of the conceptual and empirical work resulting from and fueling the recent surge of interest in animals thinking. Specific topics may include whether nonhumans behave intentionally; whether they show concept and category learning, memory, and abstract thinking similar to that of humans; the role of social cognition in the evolution of intelligence; and whether animals are conscious or self-aware. Evidence from communication studies in which animal signals provide a "window on the mind" plays a strong role in the deliberations, including studies of naturally occurring signaling in various species and experiments in which nonhumans are trained in human-like language behavior. Cognition in nonhuman primates is a specific focus throughout. The course is a mix of lecture and discussion, emphasizing the latter as much as possible.]
PSYCH 416(4160) Modeling Perception and Cognition (also PSYCH 616[6160], COGST 416[4160])
Spring. 4 credits. Prerequisites: PSYCH 205 , 209,214 . or 215 , or permission of instructor. Graduate students, see PSYCH 616. M W F. M. Spivey.

Offers a survey of several computational approaches to understanding perception and cognition. Explores linear systems analysis connectionist models, dynamical systems, and production systems, to name a few. Emphasis is placed on how complex sensory information gets represented in these models, as well as how it gets processed. Covers computational accounts of language processing, language acquisition, visual perception, and visual development, among other topics. Students complete a final project that applies a computational model to some perceptual/cognitive phenomena.

PSYCH 418(4180) Psychology of Music (also MUSIC 418[4181], PSYCH 618[6180]) (KCM-AS)
Fall. 3 or 4 credits, depending on whether student elects to do independent project. Intended for upper-level students in music, psychology, engineering, computer science, linguistics, physics, anthropology, biology, and related disciplines. Some music background desirable but no specific musical skills required. Graduate students, see,PSYCH 618. M W. C. L. Krumhansl. Covers the major topics in the psychology of music treated from a scientific perspective. Reviews recent developments in the cognitive science of music, beginning with music acoustics and synthesis, and extending to music and its emotional and social effects.

## PSYCH 423(4230) Navigation, Memory, and Context: What Does the Hippocampus Do? (also PSYCH 623[6230]) (SBA-AS)

Spring. 4 credits. Prerequisites: intended for juniors, seniors and graduate students. D. Smith.

Although the hippocampus has been the subject of intense scrutiny, for nearly 50 years, there remains considerable clisagreement about functional contributions the hippocampus makes to learning and memory process. This seminar will examine the cliverse functions attributed to the hippocampus with an eye toward integrating the differing viewpoints in the literature. After a brief historical overview, students will discuss cutting-edge literature on the hippocampal role in spatial navigation, learning, and memory, and context processing.

## PSYCH 424|4240) Neuroethology (aiso

 BIONB 424[4240]) (PBS)Fall. 4 credits. Prerequisites: BIONB 221 or 222 or BIO G 101-102 and permission of instructor. S-U or letter grades. M W F; disc, one hour each week. C. D. Hopkins. For description, see 13IONB 424.

## PSYCH 425(4250) Cognitive Neuroscience

 (also BIONB 423[4230], PSYCH 625[6250]) (KCM-AS)Fall. 4 credits. Prerequisites: introductory biology; biopsychology or neurobiology (e. g., PSYCH 223 or BIONB 221, 222); and an introductory course in perception,
cognition, or language (e.g., PSYCH 102,
209, 214, or 215). Grachate students, see PSYCH 625. S-U or letter grades. M W F. Offered alternate years. B. L. Finlay, Studies the relationship between structure and function in the central nervous system. Stresses the importance of evolutionary and mechanistic approaches for understanding the human behavior and cognition. Focuses on issues in cognitive neuroscience, including mechanisms of perception, particularly vision. and the neuropsychology of everyday acts involving complex cognitive skills such as recognition of individuals, navigation in the world, language, memory, social interaction, and consciousness.
[PSYCH 426(4260) Learning Language (also PSYCH 726[7260], COGST 426[4260]) (KCM-AS)
Spring. 4 credits. Prerequisite: PSYCH 214 or permission of instructor. Letter grades only. Next offered 2008-2009.
S. Edelman.

A survey of a promising new synthesis in the understanding of the cognitive function that is at the core of the human nature: language.

The material focuses on two aspects of the study of language: (1) psycholinguistic data and their interpretation, and (2) algorithmic studies and computational modeling. In psycholinguistics, students will read key papers that shed light on the nature of linguistic knowledge ("grammar") possessed by normal adult speakers, and on the learning of this knowledge by children. In computation, the focus is on learning grammar from raw data. The common thread to this course is realism: in psycholinguistics, we shall consider only those results obtained empirically by established psychological procedures (as opposed to intuition, either of experts or of lay speakers); in computation, the only approaches of interest to us are those that are algorithmically tractable, and that are effective when applied to realistic data.]

## PSYCH 427(4270) Evolution of Language (also COGST 427[4270], PSYCH 627[6270])

Fall. 3 credits. Prerequisite: junior or senior standing; any one course in psychology or human development. Graduate students, see PSYCH 627. S-U or letter grades.
Offered alternate years. M. Christiansen. Seminar surveying a cross-section of modern theories, methods, and research pertaining to the origin and evolution of language. Considers evidence from psychology, the cognitive neurosciences, comparative psychology, and computational modeling of evolutionary processes. Topics for discussion may include: What does the fossil record tell us about language evolution? What can we learn from comparative perspectives on neurobiology and behavior? Can apes really learn language? Did language come about through natural selection? What were the potential preadaptations for language? What is the relationship between phylogeny and ontogeny?

## [PSYCH 428(4280) Connectionist

 Psycholinguistics (also COGST 428[4280], LING 428/628[4428/6628], PSYCH 628[6280])Fall. 3 credits: Prerequisite: senior standing or permission of instructor. Graduate students, see PSYCH 628. Offered alternate years; next offered 2008-2009.
T. M. Christiansen.

Connectionist psycholinguistics involves using (artificial) "neural" networks, which are inspired by brain architecture, to model empirical data on the acquisition and processing of language. As such, connectionist psycholinguistics has had a far-reaching impact on language research. This course surveys the state of the art of connectionist psycholinguistics, ranging from speech processing and word recognition, to inflectional morphology, sentence processing, language production and reading. An important focus of discussion is the methodological and theoretical issues related to computational modeling of psychological data. Furthermore, the course discusses the broader implications of connectionist models of language, not only for psycholinguistics, but also for computational and linguistic perspectives on language.]
[PSYCH 429(4920) Olfaction and Taste: Structure and Function (also BIONB 429[4290], PSYCH 629[6290]) (PBS)
Spring. 4 credits. Next offered 2008-2009. B. Halpern.

Explores structural and functional characteristics of smelling and tasting by reading and discussing current literature in these areas, using the Socratic method.]

## PSYCH 430(4300) Moral Reasoning (also PSYCH 630[6300]) (SBA.AS)

Spring. 4 credits. Prerequisites: open to junior and senior psychology majors and to graduate students; open to others by permission of instructor. D. Pizarro. In recent years there has been a resurgence of interest in the science of morality. Recently, scientists across a wide range of disciplines have made discoveries that bear on the question of how and why humans have a sense of morality. The goals of this course are to offer an introduction to the science behind our moral sense. In order to achieve this goal, we will read articles on almost every area of scientific psychology. By the end of the course you should be well versed in the primary issues and debates involved in the scientific study of morality.

## PSYCH 431(4310) Effects of Aging on Sensory and Perceptual Systems (also PSYCH 631[6310]), BIONB 421[4210]) (PBS)

Fall. 3 or 4 credits; 4 -credit option involves term paper or creation of relevant web site. Limited to 35 students. Prerequisites: introductory biology or psychology, plus second course in perception, neuroscience, cognitive science. Graduate students, see PSYCH 631. T R. B. P. Halpern.
Literature-based examination of postmaturation changes in the perceptual, structural, and physiological characteristics of somesthetic, visual, auditory, and chemosensory systems. Emphasis is on human data, with nonhuman information included when especially relevant. Quality of life issues are included. Current developments in human sensory prosthetic devices, and in regeneration or replacement of receptor structures or organs are examined. Brief written statements by e-mail of questions and problems related to each set of assigned readings are required in advance of each class meeting and are automatically distributed to all members of the class. This course is taught using the Socratic method, in which the instructor asks questions of the students. Students read, analyze, and discuss in class difficult original literature dealing with the subject matter of the course. Readings are from Internet sites, a course packet, materials on reserve, and from the course Blackboard site. Students are expected to come to each class having already done and thought about the assigned readings, and to take an active part in every class. All examinations are takehome.

## PSYCH 435(4350) Olfaction,

## Pheromones, and Behavior

Fall. 4 credits. Prerequisites: introductory biology and course in neurobiology and behavior or biopsychology or 300 -level course in biopsychology or permission of instructor. R. Johnston.
Covers chemical signals, olfaction, and behavior in vertebrates (including humans), as well as the neurobiology of olfaction and odor-mediated behaviors. Behavioral topics may vary from year to year but include
evaluation of and advertisement for mates, aggression and territorial behavior, parentalyoung interactions, social recognition (species, sex, individual, kin reproductive state, status), memory for odors, odor and endocrine interactions, imprinting, and homing and navigation. Basic aspects of the structure and function of the olfactory system are also covered, including the molecular biology of chemo-reception, olfactory coding, and higher-order processing in the central nervous system. The format includes lectures, discussions, and student presentations.

## PSYCH 436(4360) Language <br> Development (also COGST 337[4360], HD 337[3370], LING 436[4436]) (KCM-AS)

Fall. 4 credits. Open to undergraduate and graduate students. Graduate students should also enroll under HD 633/LING $700 / \mathrm{PSYCH} 600$, supplemental graduate seminar. Prerequisite: at least one course in developmental psychology, cognitive psychology, cognitive development, or linguistics. S-U or letter grades. T R. B. Lust.

For description, see COGST 337.
PSYCH 437(4370) Lab Course: Language Development (also COGST 450[4500], LING 450[4500], HD 437[4370]) (in conjunction with COGST 436[4360], HD 339[4360], LING 436[4436], Language Development)
Spring. 2 credits. R. B. Lust.
Optional supplement to the survey course Language Development (HD 337/COGST/ PSYCH/LING 436). Provides students with a hands-on introduction to scientific research, including design and methods, in the area of first-language acquisition.

## PSYCH 440(4400) The Brain and Sleep

 (also PSYCH 640[6400])Fall. 4 credits. Prerequisites: at least PSYCH 223 or BIONB 221. Recommended: additional course in biology, biopsychology, or neurobiology. S-U or letter grades. Graduate students, see PSYCH 640. M W. H. S. Porte.
Taking a comparative evolutionary perspective, "this course examines the neural events that instigate, maintain, and disturb the states and rhythms of sleep in various species. Emphasizing human data where possible, special topics include sleep deprivation and the biological functions of sleep; biologically interesting deviations from normal sleep; and the cognitive neuroscience of sleep, including sleep's possible role in learning and memory.

## PSYCH 441(4410) Laboratory in Sleep

 Research (also PSYCH 641[6420])Spring. 4 credits. Lab fee: $\$ 50$. Graduate students, see PSYCH 641. W. H. S. Porte. Emphasizing the neurobiology of sleep state, this course introduces students to the laboratory study of human sleep and its psychological correlates. Serving as both experimenter and subject, each student learns the physical rationale and techniques of electroencephalography and other bioelectric measures of behavioral state. Using computerized data analysis, students complete weekly laboratory reports and a collaborative term project. Sleep recordings are done during the day or evening when possible. In addition, overnight recording sessions are required.

PSYCH 452(4520) Trauma and Treatment (also PSYCH 652 6520 ]) (SBA-AS)
Fall. 4 credits. Limited to 12 students; priority given to senior psychology and human development majors. Prerequisite: course work in both psychopathology and social development; permission of instructor by e-mail application during preregistration. Letter grades only. S. Bem. An in-depth examination of psychological trauma and its treatment in psychotherapy. Special attention is given to the neuroscience of danger, defense, and emotional dysregulation, the effects of early traumatic attachment on development, the key role of dissociation, and an array of treatments including dialectical behavior therapy, play therapy, sensorimotor therapy, gestalt therapy, and psychoanalytic therapy.

## [PSYCH 465(4650) Topics in High-Level Vision (also COGST 465[4650], PSYCH 665[6650]) (KCM-AS)

Spring. 4 credits. Graduate students, see
PSYCH 665. Offered alternate years; next offered 2008-2009. S. Edelman.
High-level vision is a field of study concerned with functions such as visual object
recognition and categorization, scene understanding, and reasoning about visual structure. It is an essentially cross-disciplinary endeavor, drawing on concepts and methods from neuroanatomy and neurophysiology, cognitive psychology, applied mathematics, computer science, and philosophy. This course concentrates on a critical examination of a collection of research publications, linked by a common thread, from the diverse perspectives offered by the different disciplines. Students write biweekly commentaries on the assigned papers and a term paper integrating the material covered in çlass.]

## PSYCH 470(4700) Undergraduate

 Research in PaychologyFall or spring. 1-4 credits. Prerequisite: written permission from staff member who will supervise the work and assign grade must be included with course enrollment material. Students should enroll in section listed for that staff member; section list available from Department of Psychology. S-U or letter grades. Staff.
Practice in planning, conducting, and reporting independent laboratory, field, and/or library research.

## PSYCH 471(4710) Advanced

 Undergraduate Research in PsychologyFall or spring. 1-4 credits. Prerequisite: written permission of staff member who will supervise work and assign grade must be included with course enrollment material. Students should enroll in sec listed for that staff member; sec list available from Department of Psychology. S-U or letter grades. Staff.
Advanced experience in planning, conducting, and reporting independent laboratory, field, and/or library research. One, and preferably two, semesters of PSYCH 470 is required. The research should be more independent and/or involve more demanding technical skills than that carried out in PSYCH 470.
PSYCH 472(4720) Multiple Regression Spring, weeks 1-7. 2 credits. Prerequisite: one solid semester of introductory statistics. Recommended: analysis of variance. M W F Staff.

Covers uses and pitfalls of multiple regression in causal analysis, path analysis, and prediction. Emphasis is on analyzing data collected under uncontrolled conditions. Includes colinearity, indicator variables, sets, adjusted and shrunken $R^{2}$, suppressors, hierarchical analysis, overcontrol, and experimental design. Students may use the Minitab, SPSS, Stata, SAS, or Systat statistics packages.

## PSYCH 473(4730) General LInear Model

Spring, weeks 8-14. 2 credits. Prerequisite:
PSYCH 472 or equivalent. M W F. Staff. Topics include multicategorical variables, corrections for multiple tests, diagnostic methods, nonlinear relationships, interaction, main and simple effects, and basic power analysis. Student may use Minitab, SPSS, Stata, SAS, or Systat.
[PSYCH 478(4780) Parenting and Child Development (also PSYCH 678[6780], HD 444[4440]) (KCM-AS)
Fall. 4 credits. Limited to 25 students. Intended for seniors and graduate students. Graduate students, see PSYCH 678. Next offered 2008-2009: M W. M. Goldstein. Explores the influence of parenting skills and styles on the development of infants and children. By studying parents and their infants together, the family can be viewed as a system in which the members engage in reciprocal stimulation and regulation of learning and behavior. Patterns of interaction within a family serve as a source of developmental change in infants. Such a system is influenced by internal and external forces. This course examines internal factors such as the biology of parenting and mechanisms of social learning in infants. Also studies the influence of external factors on family life, such as socioeconomic status and changes in family structure (e.g. single vs. dual parenting). Finally, it examines and evaluates the role of public policies and intervention strategies that impact parents and children.]

## PSYCH 481(4810) Advanced Social

 Psychology (also PSYCH 681[6810])Fall. 4 credits. Limited to 15 students, by application. Priority given to senior
psychology majors. Graduate students, see PSYCH 681. T R. D. T. Regan.
Readings are primary sources, namely selected articles from very recent issues of the best social psychological journals. Readings are chosen for their importance, their readability, and the likelihood that they will generate stimulating discussion.

## PSYCH 482(4820) Automaticity (also PSYCH 682[6820]) (SBA-AS)

Spring. 4 credits. Prerequisites: PSYCH 280;
at least one course in cognitive psychology or permission of instructor. R. M. Ferguson. What is automaticity? This is a topic that has gained considerable momentum in social psychology over the past 10 to 15 years and has been broadly applied to classic social psychological phenomena, including judgments, attitudes, emotion, motivation, and behavior. The crux of this momentum has been the controversial argument that such phenomena can occur without a person's awareness, intention, effort, or control. Although there is an abundance of empirical work on this topic, there still remain a number of unanswered and interesting questions. The objective of the course is twofold. The first is for students to learn the automaticity literature in social psychology; the second is to identify
such critical questions, and speculate on possible answers. The course reviews the wide range of theoretical and empirical work on automaticity and examines contemporary definitions of automaticity within social and other areas of psychology. The analysis of automaticity is necessarily closely linked with issues such as unconscious vs. conscious processing, attention, control, intentionality, and free will.

## PSYCH 485(4850) The Self (also PSYCH 685[6850])

Spring. 4 credits. Limited to 15 students. Prerequisite: permission of instructor, with priority given to seniors and graduate students. D. Dunning.
An enduring task in psychological inquiry has been to survey the ways in which a person's self-image influences emotion, thought, and action. What is self-esteem, and is it a good or a bad thing? How do concerns over self-image motivate people? Do people really know themselves accurately? How does a person's sense of self develop, and does it differ across cultures? Students will be introduced to these and other topics by reading original research articles, and should expect take part in class discussions of the issues raised.

## [PSYCH 489(4890] Seminar: Beliefs, Attitudes, and Ideologies (also PSYCH 689[6890]) (CA-AS)

Fall. 4 credits. Prerequisites: admission by application during spring pre-registration period for fall semester. Priority given to juniors, seniors, and graduate students. Next offered 2008-2009. M. Staff. Course in cultural analysis examining the properties of beliefs and attitudes, how they are formed and changed, the psychological functions they serve, and how they get organized into ideologies. Several specific issues involved in America's "culture wars" are examined, such as abortion, gender, sexual orientation, and affirmative action. Other topics include deaf culture, utilitarian ethics, and the ideology of science. Participants write weekly commentaries on the readings and a term paper examining a particular ideology.]

## PSYCH 491(4910) Research Methods in Psychology (also COGST 491[4910], PSYCH/COGST 691[6910])

Prerequisite: permission of instructor V. Zayas.

Research methods are the tools that allow psychologists to test the validity of hypotheses. This course provides a survey of the methods used by scientists in personality and social psychology as well as related behavioral sciences to empirically test hypotheses. Specifically, this course will discuss the following topics: (i) philosophy of science, (ii) research designs and methods, (iii) data collection, analysis, and validity, (iv) report writing, and (v) recurrent and emerging trends and issues in the field of research methods and quantitative analysis. Students concentrate on completing a small research project in which they conduct an experiment, interpret its data, and write up the results.
[PSYCH 492(4920) Sensory Function (also BIONB 49244920], PSYCH 692[69201) (PES)
Spring. 4 credits. Limited to 25 students. Prerequisite: 300-level neuroscience course, or BIONB 222 or BIOAP 311, or equivalent; knowledge of elementary physics, chemistry, and behavior. S-U or letter grades. Graduate students, see PSYCH 692. M W F. Offered alternate years; next offered 2009-2010.
B. P. Halpern and H. C. Howland

In general, this course has covered classical topics in sensory function such as vision, hearing, touch, and balance, as well as some more modern topics like sensory processing, location of stimulus sources in space, the development of sensory system, and nonclassical topics such as electroreception and internal chemoreceptors.]

## Advanced Courses and Seminars

Advanced seminars are primarily for graduate students, but with the permission of the instructor they may be taken by qualified undergraduates. The selection of seminars to be offered each semester is determined by the needs of the students.
A supplement describing these advanced seminars is available at the beginning of each semester and can be obtained from the department office ( 211 Uris Hall). The following courses may be offered either semester and carry 4 credits unless otherwise indicated.

## PSYCH 510-511(6100-6110) Perception

PSYCH 512-514(6120) Visual Perception

## PSYCH 518(6181) Toples in

 PaycholingulsticsPSYCH 519-520|6830) Affects and Cognition (also NRE 507)
Fall. 4 credits. A. M. Isen.
PSYCH 521(6210) Behavioral and Brain Sclences
Fall and spring. 4 credits each semester.
PSYCH 522(6220) Topics In Perception and Cognition
PSYCH 523(6230) Hormones and Behavior

PsYCH 527(6270) Topics in Blopsychology
[PSYCH 530(6300) Structure in Vision and Language (also COGST 530[6300], LING 530[5530])
Spring. 4 credits. Graduate seminar. Limited to 20 graduate students. Prerequisites: graduate standing; course each in cognitive psychology, linguistics, computer science, or permission of instructor. Offered alternate years; next offered 2008-2009. S. Edelman.

One of the central puzzles of cognition is the manner in which brains deal with structured information such as scenes composed of a variety of objects, or sentences composed of words and phrases. The processing of structure by the brain is constrained by the neuronal architecture, as well as by general principles of information processing that are studied in computer science. This course focuses on insights from these different disciplines, striving for understanding couched in abstract computational terms, yet compatible with the basic neurobiological constraints, with behavioral data, and with philosophical intuition.]

PSYCH 535(6350) Evolutionary Perspectives on Behavior

PSYCH 541(6410) Statistics In Current Psychological Research
PSYCH 550(6500) Special Topics in Cognitive Science (also COGST 550[5500])
Fall. 4 credits. M. Spivey
PSYCH 580(6800) Experimental Social Psychology
PSYCH 600(6000) Ceneral Research Seminar
Fall or spring. 0 credits.
PSYCH 605(6050) Perception (also PSYCH 205[2050])
Spring. 4 credits. Non-arts graduate students only. T R. J. E. Cutting.
PSYCH 612(6120) Laboratory in Cognition and Perception (also PSYCH 412[4120])
Spring. 4 credits. M W. D. J. Field.
PSYCH 613(3150) Obesity and the Regulation of Body Weight (also NS $315[3150])$
Spring. 3 credits. Limited to 30 students. Prerequisites: one course each in psychology and nutrition; undergraduates by permission of instructor. S-U or letter grades. Offered alternate years. T R. D. A. Levitsky.

Multidisciplinary discussion of the causes, effects, and treatments of human obesity.
Topics include the biopsychology of eating behavior, the genetics of obesity, the role of activity and energy metabolism, psychosocial determinants of obesity, anorexia nervosa,
therapy and its effectiveness, and social discrimination.

PSYCH 614(6140) Cognitive Paychology (also PSYCH 214[2140], COGST 214[2140], cocst 614[6140])
Fall. 3 credits, M W. F. S. Edelman.
PSYCH 616(6160) Modelling Perception and Cognition (also PSYCH 416[4160], C008t 416[4160])
Spring. 4 credits, M. Spivey.
PSYCH 618/6180) Psychology of Music [also PSYCH 418[4180], MUSIC 418[4181])
Fall. 4 credits. M W. C. Krumhansl.
PSYCH 623(6230) Navigatlon, Memory, and Context: What Does the Hippocampus Do? (also PSYCH 423[4230])
Spring. 4 credits. D. Smith.
PSYCH 625(6250) Cognitive Neuroscience (also PSYCH 425[4250])
Fall. 4 credits. M W F. B. L. Finlay.
PSYCH 626(6260) Evolution of Human Behavior (also PSYCH 326[3260]) Spring. 4 credits. T R. R. E. Johnston.
PSYCH 627(6270) Evolution of Language (also CoGst/PSYCH 427[4270])
Fall. 3 credits. M. Christiansen.
[PSYCH 628(6280) Connectionist Psycholinguistics (also LING 428/628[4428,6628], PSYCH 428[4280], COGSt 428[4280])
Fall. 3 credits. Next offered 2009-2010. W. M. Christiansen.]
[PSYCN 629(6290) Olfaction and Taste: Structure and Function (also PSYCH/ BIONE 429[4290])]

PsYCH 630(6300) Moral Reasoning
Spring. 4 credits. T R. D. Pizarro.
PSYCH 631(6310) Effects of Aging on Sensory and Perceptual Systoms (also PSYCH 431[4310], BIONB 421[4210])
Fall. 4 credits. T R. B. P. Halpern.
PSYCH 632(6320) Biopsychology of Learning and Memory (also PSYCH 332[3320], BIONB 328[3280]]
Spring. 4 credits. M W F. T. J. DeVoogd.
PSYCH 640(6400) The Brain and Sleep (also PSYCH 440[4400])
Fall. 4 credits. M W. H. S. Porte.
PSYCH 641(6410) Laboratory In Sleep Research (also PSYCH 441[4410]) Spring. 4 credits. W. H. S. Porte.
PsYCH 642(6420) Muman Perceptlon: Appllcations to Computer Graphics, Art, and Visual Display (also PSYCH) COGST 342[3420], VIS8T 34243342])
Fall. 4 credits. T R. D. J. Field.
PSYCH 652(6520) Treuma and Troatment [also PSYCH 452[4520])
Fall. 4 credits. S. Bem.
[PSYCH 665(6650) Topics in Migh-Level Vision (also PSYCH 465[4650], COOST 465[4650]]
Spring. 4 credits. Next offered 2008-2009. S. Edelman.]
[PSYCH 678(6780) Parenting and Child Development (also PSYCH 478[4780], HD 444[4440])
Fall. 4 credits. M. Goldstein.]
PSYCH 681(6810) Advanced Social Psychology (also PSYCH 481[4810]) Fall. 4 credits. T R. D. T. Regan.
PSYCH 682(6820) Automatlcity (also PSYCH 482[4820])
Spring. 4 credits. R. M. Ferguson.
PSYCH 685(6850) The Self (also PSYCH 485[4850]
Spring. 4 credits. D. Dunning
[PSYCH 689(6890) Seminar: Beliefs, Attitudes, and Ideologies (also PSYCH 489[4890])]
PSYCH 691(6910) Research Mothods in Psychology (also PSYCH 491[4910], coast 491[4910])
Spring. 4 credits. T R. V. Zayas.
[PSYCH 692(6920) Sensory Function (also PSYCH/BIONB 492[4920])
Spring. 4 credits. M W F. Next offered 2009-2010. B. P. Halpern and H. C. Howland.]
[PSYCH 696(6960) Introduction to Sensory Systems (also PSYCH/ BIONB 396[3960])
Spring. 4 credits. M W F. Next offered 2009-2010. B. P. Halpern.]
PSYCH 700(7000) Research In Biopsychology
PSYCH 709(7090) Developmental Psychology (also PSYCH 209[2090]) Spring. 4 credits. MW. M. Goldstein.

## PSYCH 71077100) Research in Human Experimental Psychology <br> PSYCH 713(7130) Information Processing: Conscious and Nonconsclous <br> Spring. 4 credits. R. Staff.

## [PSYCH 714(7140) Comparative

 Cognition (also PSYCH/COaST 414[4140])Spring. 4 credits. T R. Next offered 20082009. Staff.]

## [PSYCH 716(7160) Auditory Perception

 (also PSYCH 316[3160])Fall. 4 credits. M W. Next offered 20082009. C. L. Krumhansl.J

PSYCH 72017200) Research in Social Psychology and Porsonality
PSYCH 722(7220) Hormones and Behavior (also PSYCH/BIONB 322[3220]
Fall. 4 credits. M W F. E. A. Regan.

## PSYCH 726(7260) Learning Language (also PSYCH/COGST 426[4260]) <br> Spring. 4 credits. S. Edelman.

## PSYCH 775(7750) Proseminar In Social

 Psychology IFall. 2 credits. Limited to 10 students. Prerequisite: graduate students in social psychology; permission of instructors.
D. Dunning, M. Ferguson, T. Gilovich,
D. Pizarro, and D. Regan.

First semester of a yearlong discussion-seminar course intended to give graduate students an in-depth understanding of current research and theory in social psychology. Emphasizes social cognition, but other topics, such as group dynamics, social influence, the social psychology of language, and emotional experience, are covered.

## PsYCH 776(7760) Proseminar in Social Psychology I!

Spring. 2 credits. Limited to 10 students. Prerequisite: graduate students in social psychology; permission of instructors.
D. A. Dunning, M. Ferguson,
T. D. Gilovich, D. Pizarro, and D. T. Regan. Second semester of a yearlong discussionseminar course intended to give graduate students an in-depth understanding of current research and theory in social psychology. Emphasizes social cognition, but other topics, such as group dynamics, social influence, the social psychology of language, and emotional experience are covered.

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PsYCH 900(9000) Doctoral Thesis
    Research In Biopsychology
PSYCH 910(9100) Doctoral Thesis
        Research In Human Experimental
        Psychology
PSYCH 920(9200) Doctoral Thesis
        Research in Social Psychology and
        Personallty
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## Summer Session Courses

The following courses are also frequently offered in the summer session, though not necessarily by the same instructor as during the academic year. Not all of these courses are offered in a particular summer. Information regarding these courses and additional summer session offerings in psychology is available from the department before the end of the fall semester.

PSYCH 101 Introduction to Psychology: The Frontiers of Psychological Inquiry
PSYCH 102 Introduction to Cognitive Science

PSYCH 128 Introduction to Psychology: Personality and Social Behavior
PSYCH 223 Introduction to Biopsychology
PSYCH 280 Introduction to Social Psychology
PSYCH 350 Statistics and Research Design

## QUECHUA

See "Romance Studies."

## RELIGIOUS STUDIES MAJOR

D. Boucher, director; A. Blackbum, R. Brann, C. M. Carmichael, K. Clinton, J. Fajans, D. Fredericksen, D. Gold, S. Greene, K. Haines-Eitzen, J. S. Henderson, T. D. Hill, T. J. Hinrichs, D. Holmberg, P. R. Hyams, C. V. Kaske, W. J. Kennedy, J. M. Law, S. MacDonald, K. S. March, L. Monroe, R. L. Moore, D. I. Owen, D. S. Powers, C. Robinson, P. S. Sangren, S. Toorawa, M. Washington, A. Willford

The Religious Studies Program, an academic unit providing a major in the scholarly study of religion, offers a wide variety of courses addressing various approaches to, and topics in, the study of religion.
The Religious Studies Program is designed to meet the needs of three classes of students: (1) students planning to pursue advanced degrees in the academic study of religion or allied disciplines or subdisciplines (e.g., history of religions, religion and literature, religion and psychology, ethics, theology, area studies); (2) students seeking courses on topics relating to religion to fulfill distribution requirements; and (3) students desiring a more systematic exposure to the academic study of religion as a significant component of a liberal arts education. To all students, our program offers an excellent opportunity to develop a deeper understanding and appreciation of the complex ways in which religious traditions inform human thought and behavior. The courses offered through our program are built on the established scholarly tradition of the study of religion as an academic, as opposed to confessional, pursuit. Religious traditions are explored in all of their complexity through comparative, contextual (in specific historical or cultural contexts), and thematic studies.
The program also hosts lecture series, conferences, symposia, and periodic social gatherings for faculty members and students throughout the academic year to foster a sense of intellectual community.

## The Major in Religious Studies

Signing into the major: To sign into the major in Religious Studies, a student must have completed at least one course in Religious Studies before scheduling an appointment with the program director. Here is the process:

1. Schedule an appointment with the director of the Religious Studies Program, whose name and e-mail address can be found on the Religious Studies web site.
2. In addition to a copy of the current Cornell transcript (the informal one students regularly receive is acceptable), students should bring to their meeting with the director all of these forms, available in the Religious Studies office, 409 White Hall:
a. a completed Religious Studies major application form
b. a proposed "course of study," which will be used as a guide in the student's conversation with the director and revised for formal submission to the program upon your entrance as a major
c. a College of Arts and Sciences advisor/major form, which will be signed by the director and advisor. The advisor will be assigned in the student's meeting with the director based on interest.

## Advising in the Religious Studies

Program: Upon entering the major in Religious Studies, a student is assigned a faculty advisor whose area of expertise most closely matches the proposed interest of the student. An up-to-date approved advisor list is available in the Religious Studies office. Note that not all faculty members who cross-list courses with RELST can serve as RELST advisors. Working closely with one's RELST advisor when selecting courses is an important component of this program, enabling students to fulfill the requirements for the major while creating an integrated and coherent course of study out of our large number of multidisciplinary course offerings.
To graduate as a major in Religious Studies, a student must (1) complete with letter grades the program's three core courses, RELST 250 Introduction to Asian Religions, RELST 251 Introduction to Judaism, Christianity, and Islam, and RELST 449 History and Methods of the Academic Study of Religion; and (2) complete with letter grades seven additional courses approved for the major.
Students must complete 10 courses cross-listed with Religious Studies:

## Three Core Courses:

RELST 250 Introduction to Asian Religions
RELST 251 Introduction to Judaism,
Christianity, and Islam
RELST 449 History, Theory, and Methods in the Academic Study of Religion
The requirement for either or both RELST 250/251 may be satisfied by taking two or more courses in the relevant traditions with some attention to breadth:
The requirement for RELST 250 may be satisfied by taking at least one course on South Asian traditions AND one course on East Asian traditions.
The requirement for RELST 251 may be satisfied by taking at least one course in each of two or more of the traditions of Near Eastern origin (Judaism, Christianity, and Islam).
Absolutely no student will be exempted from RELST 449.

## Seven Additional Courses

In selecting their additional courses for the major, students are expected to consult closely with their advisors to ensure that their programs have adequate breadth in Religious Studies generally and depth in a particular tradition, cultural area, or approach to the field.

Most courses approved for the major are offered by cooperating departments within the College of Arts and Sciences. A comprehensive up-to-date list of these courses is maintained at the office of the Religious Studies Program, 409 White Hall.

## Graduating with Honors in Religious Studies:

## GENERAL INFORMATION

1. Eligibility. 30 cumulative average and 3.5 average inside the major with no grade in the major below B-. Program director notifies eligible candidates during the spring semester of the junior year or before commencement of final year.
2. Honors Courses. Candidates must sign into RELST 495 Senior Honors Essay for 8 credits (two courses) for two semesters. After the first semester, an R in the transcript indicates that this course (usually for 8 credits) is a yearlong course. When the project is completed at the end of the second semester, the grade recorded counts for all 8 credits. (The 8 credit limit is the result of the conviction/ belief that earning more than 8 credits for a single "piece" of one's undergraduate education is unwise.)
The student submits the honors proposal (with and according to the program's instruction/cover sheet) to the Religious Studies administrator before the end of the spring semester of the junior year, or not later than Sept. 15 of the final year. The administrator then approves the student's signing into the honors courses.
3. Honors Committee-three faculty members. While students are required to have three faculty members on their. committee at the time of the submission of the final draft, only two of them must be identified when the proposal is submitted. In the event the advisor is on leave, the program will assign a committee member from the list of approved RELST advisors. The three members should be:
a. The professor who has agreed to work closely with the student over the year and to be the supervisor/grader of the project is chair of the committee.
b. The student's Religious Studies major advisor (required)
c. Another knowledgeable faculty member Sometimes the advisor is the supervisor/ chair. If that is the case, the student needs two additional knowledgeable professors for the committee of three

## Courses Approved for the Major Sponsored by Religious Studies

RELST 123(1111) Introduction to Biblical Hebrew 1 (also JWST/NES 123[1111])
Fall. 4 credits. L. Monroe.
For description, see NES 123
RELST 133-134(121t-1212) Introduction to Qur'anic and Classical Arabic (also NES 133-134[1211-1212])
133, fall; 134, spring. 4 credits. M. Younes. For description, see NES 133-134.

## [RELST 202(2105) The Greek New

 Testament (also CLASS 202[2105])Spring. 3 credits. Prerequisites: at least one year of Ancient Greek (CLASS 101-103 or 104, or permission of instructor). Next offered 2008-2009. E. Rebillard
For description, see CLASS 202.]
RELST $211(2110)$ Black Religious Traditions: Sacred and Secular (also AM ST 251[2110], HIST 211 [2110])
Spring 4 credits. M. Washington
For description, see HIST 211.
[RELST 215(2150) Crusade, Heresy, and Inquisition in the Medieval Mediterranean (also H1ST 214[2141])
Spring. 4 credits. Limited to 15 students.
Next offered 2009-2010. P. Hyams.
For description, see HIST 214.$]$
RELST 224(2724) Introduction to the Hobrew Blble II (also JWST/NES 224[2724])
Fall. 4 credits. L. Monroe.
For description, see NES 224
[RELST 225(2261) Society and Rellgion In China (also HIST 226[2261])
Fall, 4 credits. Next offered 2008-2009
T. J. Hinrichs.

For description, see HIST 226.]
[RELST 226(2646) Atheism Then and Now (also CLASS 226[2646])
Spring. 3 credits. Next offered 2009-2010.
J. Coleman.

For description, see CLASS 226.]
[RELST 242(2420) Rellgion and Politics In American History (also HIST/AM ST 242[2420])
Spring. 4 credits. Sophomore seminar. Limited to 15 students. Prerequisite: permission of instructor. Next offered 2008-2009. R. L. Moore.
For description, see HIST 242.]
RELST 250(2250) Introduction to Asian Rellgions (also AsIAN 250[2250])
Spring. 3 credits. D. Boucher.
For description, see ASIAN 250.
RELST 251(2651) Holy War, Crusade, and Jlhad (also HIST 269[2691], NES 251[2651], JWST 251[2651], COM L 231[2310])
Fall. 3 credits. R. Brann.
For description, see NES 251.
RELST 256(2556) Introduction to the Qu'ran (also JWST/NES 256[2556])
Fall. 4 credits. S. Toorawa.
For description, see NES 256.
RELST 262(2630) Religlon and Reason (also PHIL 263[2630])
Fall. 4 credits. D. Pereboom.
For description, see PHIL 263.

RELST 263(2663) Introduction to Blblical History and Archaeology (also ARKEONES 263[2863])
Fall. 4 credits. J. Zorn.
For description, see NES 263.
RELST 275(2675) Religions of Anclent Israel (also ARKEO 276[2765], JWST/ NES 275[2675]]
Spring. 4 credits. J. Zorn.
For description, see NES 275.
[RELST 277(2277) Meditation in Indian Culture (also ASIAN 277[2277])
Spring. 3 credits. Next offered 2008-2009. D. Gold.

For description, see ASIAN 277.]
RELST 315(3150) Medieval Philosophy (also PHIL 325[3150])
Fall. 4 credits. S. Macdonald.
For description, see PHIL 315.
RELST 320(3720) Women in the Hobrew Bible (also NES 320[3720])
Spring. 4 credits. L. Monroe
For description, see NES 320.
RELST 323(3230) Myth, Ritual, and Symbol (also ANTHR 320[3230])
Spring. 4 credits. D. Holmberg.
For description, see ANTHR 320.
RELST 328(3260) Christlanity and Judaism (also COM L 326[3260])
Spring. 4 credits. C. Carmichael.
For description, see COM L 326.
[RELST 328(3280) Literature of Oid Testament (also COM L 328[3280])
Fall. 4 credits. Next offered 2009-2010.
C. Carmichael.

For description, see COM L 328.]
[RELST 332(3644) Sages and Sainte/ Ancient World (also HIST 338[3644], CLASS 332[3644])
Spring, 4 credits. Next offered 2008-2009. E. Rebillard.

For description, see CLASS 332.J
[RELST 347(3347) Tantric Traditions (also ASIAN 347[3347])
Fall. 4 credits. Next offered 2009-2010. D. Gold.

For description, see ASIAN 347.)
RELST 348(3348) Indian Devotional Poetry (also ASIAN 348[3348])
Spring. 4 credits. D. Gold.
For description, see ASIAN 348.
RELST 349(3460) Modernization of the American Mind (also AM ST/HIST 346[3460])
Fall. 4 credits. L. Monroe
For description, see HIST 346.
[RELST 351(3351) Indian Rollglous Worlds (also A8IAN 351[3351])
Fall. 4 credits. Next offered 2008-2009.
D. Gold.

For description, see ASIAN 351.]
RELST 354(3354) Indian Buddhism (also RELST 654[6654], ASIAN
354/654[3354/6654])
Fall. 4 credits. D. Boucher.
For description, see ASIAN 354.
RELST 355(3355) Japanese Religions: A Study of Practice (also ASIAN 355[3355])
Spring. 4 credits. J. M. Law.
For description, see ASIAN 355.
[RELST 359(3359) Japanese Buddhism (also AsIAN 359[3359])
Spring. 4 credits. Next offered 2008-2009. J. M. Law.

For description, see ASIAN 359.]

## [RELST 368(3680) Marriage and

 Sexuallty in Medieval Europe (also HIST/FaSS 368[3680])Fall. 4 credits. Next offered 2008-2009. P. Hyams.

For description, see HIST 368.]

## [RELST 405(4665) Augustine's

 Confessions (also CLASS 405[4665])Spring. 4 credits. Next offered 2008-2009. C. Brittain.

For description, see CLASS 405.]
RELST 410(4100) Latin Philosophlcal Texts (also PHIL 410[4100], LATIN 612[7212])
Fall. Variable credit. Prerequisite:
knowledge of Latin and permission of instructor. Staff.
For description, see PHIL 410.

## RELST 420/4102) Biblical Hebrew Prose-Judges (also NES/JWST 420[4102]) <br> Spring. 4 credits. L. Monroe.

For description, see NES 420.
[RELST 421(4421) Religious Reflectlons on the Human Body (also ASIAN 421[4421])
Fall. 4 credits, Next offered 2009-2010. J. M. Law.

For description, see ASIAN 421.]

## RELST 426(4260) Now Testament

 Seminar (also COM L 426[4260])Spring. 4 credits. C. Carmichael.
For description, see COM L 426.

## RELST 427(4280) Blblical Seminar (also COM L 428[4280])

Fall. 4 credits. C. Carmichael.
For description, see COM L 428.
RELST 429(4290) Adam's Rib and Other Dlvine Signs: Reading Blblical Narrative (also ENGL 429[4290]\}
Spring. 4 credits. L. Donaldson.
For description, see ENGL 429.
RELST 438(4438) Monks, Texts, and Relics: Transnational Buddhism in Asia (also ASIAN 438[4438])
Spring. 4 credits. A. Blackburn.
For description, see ASIAN 438.
RELST 440(4540) Maimonides and Averroes (also NES 440[4540])
Spring. 4 credits. R. Brann.
For description, see NES 440.

## RELST 441(4441) Mahayana Buddhism

 (also ASIAN 441[4411])Spring. 4 credits. D. Boucher.
For description, see ASIAN 441.
RELST 449(4449) Mistory and Methods of the Academic Study of Rellgion (also ASIAN 449[4449])
Spring. 4 credits. Requirement for Religious Studies majors. J. M. Law.
For description, see ASIAN 449.

## [RELST 460(4460) Indian Meditation

 Toxts (also ASIAN 460[4460])Fall. 4 credits. Next offered 2008-2009. D. Gold.

For description, see ASIAN 460.]
[RELST 475(4625) Christlanization/ Roman World (also CLASS 475[4625], HIST 483[4831])
Fall. 3 credits. Next offered 2008-2009.
E. Rebillard.

For description, see CLASS 475.]
[RELST 489(4489) Religion and Sustalnability (also ASIAN 489)

## (CA-AS]

Fall. 4 credits. Next offered 2009-2010. J. M. Law.

For description, see ASIAN 489.]

## RELST 490-491(4990-4991) Directed

 Study490, fall; 491, spring. $2-4$ credits each semester. For majors in Religious Studies; permission of director required. Staff.
RELST 495(4995) Senior Honors Essay
Fall and spring (two semesters). 8 credits. Requirement for honors in Religious Studies. Staff.

## [RELST 650(6650) Seminar on Aslan

 Religions (also ASIAN 650[6650])Fall. 4 credits. Limited to 10 students. Prerequisite: graduate standing. Reading knowledge of modern Japanese desirable.
Next offered 2008-2009. J. M. Law.
For description, see ASIAN 650.]
RELST 654(B654) Indian Buddhism (also RELST 354[3354], ASIAN
354/654[3354/6654])
Fall. 3 credits. D. Boucher.
For description, see ASIAN 354/654.
Additional courses offered by cooperating departments may also be approved through petition for the major in Religious Studies. For details see the program director, whose name and e-mail address can be found on the Religious Studies web site.

## ROMANCE STUDIES

T. Alkire, S. Amigo-Silvestre, I. Auffret, M. Baraldi, K. Battig von Wittelsbach, A. Berger, T. Beviâ, B. Bosteels, T. Camphell, F. Cervesi, D. Castillo, W. Cohen (chair), L. Dubreuil, M. A. Garcés, M. Greenberg,
L. Home, C. Howie, R. Klein, C. Lawless,
S. LoBello, K. Long, J. Luks, N. MaldonadoMendez, T. McNulty, L. Meza-Riedewald, M. Migiel, S. Moralez-Rivera (visiting), L. Moratō-Peña, J. Oliveira, J. E. Paz-Soldãn, S. Pinet, R. Possen, K. Proux-García,
M. K. Redmond, J. M. Rodriguez-Garcia, J. Routier-Pucci, E. Sānchez-Blake, C. Sparfel, A. Stratakos-Tió, M. Stycos, P. Swenson, B. Teutli (associate chair), S. Tun, M. C. Vallois, C. Waldron. Emeriti; C. Moron Arroyo, J. Beereaud, A. Colby-Hall, N. Furman, A. Grossvogel, P. Lewis, A. Seznec. Adjunct Associate Professor: S. Tarrow.
The Department of Romance Studies offers courses in the following areas: Catalan, French, Hispanic, Italian, and Luso-Brazilian literatures; French, Italian, Portuguese, Quechua, and Spanish language; Francophone, Italian, Luso-Brazilian, and Hispanic cultures; and linguistics and semiotics. Through its course offerings and opportunities for independent study, the department seeks to encourage study of the interactions of the Romance literatures among themselves, with other literatures, and with other fields of inquiry.

## Catalan

[CATAL 121-122(1210-1220) Elementary Catalan
121, fall; 122, spring. 4 credits each semester. 121 must be taken before 122 . Recommended: knowledge of another Romance language. Next offered 20082009. Staff

Catalan is a Romance language spoken by some 10 million people in four European states (Andorra, France, Italy, and Spain). This course provides a thorough grounding in all language skills: speaking, listening, reading, and writing, and is designed to provide students with the basis for establishing linguistic contact with Catalan culture.]

## French

T. Alkire, A. Berger, L. Dubreuil, M. Greenberg, C. Howie, R. Klein, S. LoBello, K. Long, J. Luks, T. McNulty, R. Possen, K. ProuxGarcia, C. Sparfel, S. Tun, M. C. Vallois, C. Waldron. Emeriti: J. Béreaud, A. Colby-Hall, N. Furman, D. I. Grossvogel, P. Lewis, A. Seznec. Adjunct Associate Professor: S. Tarrow

## The Major

The major in French is divided into two options: French cultural studies and French literature. While prospective majors should try to plan their programs as far ahead as possible, especially if they intend to study abroad, no students will be refused admission to the major merely because of a late start. See the director of undergraduate studies, Professor Kathleen Long (kpl2@cornell.edu), 320 Morrill Hall. This consultation is especially important for finding out what sequence of courses will follow the current choice of courses.
We are currently not admitting students to the French linguistics major. Students having such interests should apply for admission through the field of linguistics. Courses in general linguistics are offered.

## French Literature

This option is designed to give students mastery of the oral and written language, as well as knowledge and understanding of French and Francophone literatures and cultures, and to develop their skills in literary analysis.
To be admitted to the major, a student should have completed FREN 219 and 221 or equivalent courses (to be determined by the director of undergraduate studies).
To complete the major, a student must:

1. Acquire advanced knowledge of and competence in French language. This competence is demonstrated by the successful completion of FREN 301, Advanced French I; or FREN 305, French through Film (**only one may be taken for credit) or a properly accredited study abroad program or the passing of a special language test (the CASE examination) or permission of the director of undergraduate studies.
2. Take the two core courses for the major: FREN 321, Readings in Modern French Literature and Culture; FREN 322, Readings in Early Modern French Literature and Culture
3. Take five or more additional courses or the 300 level or above, including

- One course on Francophone Literature or culture
- One course on French Literature or culture pre-1789
- One course at the 400 level
- Three courses conducted in French (i.e., no more than two courses conducted in English may be counted toward the major), and
- Up to two courses offered by a department other than Romance Studies (for example Comparative Literature, History, Linguistics, Philosophy, Art History, or Visual Studies), provided the course includes a significant (at least 50 percent) French component.


## French Cultural Studies

This option is designed to give students mastery of the oral and written language, as well as a broader knowledge of French and Francophone culture in an interdisciplinary context.
To be admitted to the major, a student should have completed FREN 219 or 221 or equivalent courses (to be determined by the director of undergraduate studies).
To complete the major, a student must

- Acquire advanced knowledge of and competence in French language. This competence is demonstrated by the successful completion of FREN 301, Advanced French I; or FREN 305, French through Film ("only one may be taken for credit), or a properly accredited study abroad program or the passing of a special language test (the CASE examination) or the permission of the director of undergraduate studies.
- Take one of the core courses for the major: FREN 320, Introduction to the 21st Century; FREN 321, Readings in Modern French Literature and Culture; or FREN 325, Being French (all may be taken for credit, but only one is required)
- Take six or more additional courses at the 300 -level or above, including

1. One course on French literature or culture pre-1789
2. One course at the 400 level
3. Three courses offered by the Department of Romance Studies
4. Three courses conducted in French (i.e., no more than three courses conducted in English may be counted toward the major) and
5. Up to three courses offered by a department other than Romance Studies (for example History, Government, Philosophy, Art History, Comparative Literature, or Visual Studies), provided the course includes a significant (at least 50 percent) French component.

## Administration of the French Major

Students are admitted to the major by the director of undergraduate studies in the French section of the Department of Romance Studies but are guided by their individual advisors. A copy of each student's progress is given to the director of undergraduate studies for approval and safe-keeping.

## Concentration in French Studies

At Cornell, a concentration is the functional equivalent of a minor. Its purpose is to supplement a student's major with a complementary focus or concentration that is indicated on the graduate's transcript. The concentration in French Studies, organized by the interdisciplinary Program in French Studies, is designed to be compatible with all kinds of majors and is open to students in all the undergraduate colleges. The concentration promotes broad understanding of French culture, as well as Francophone literatures, societies, and their political/economic systems; it also encourages students to refine and practice their language skills. Students pursuing the concentration must attain proficiency (by taking a placement exam or completing a 200-level course in French) and must take the core course The French Experience (FREN 224 or HIST 270) or an approved equivalent of the core course (approved alternatives will be listed on the program web site). Students may also petition the program director to use an advanced course conducted in French as their core course. Completion of the concentration requires, in addition to the core, three nonlanguage courses on French and Francophone topics. Only one of the four courses required for the concentration can be taken S-U.
Applications for the concentration are accessible at the French Studies web site, www.einaudi.cornell.edu/french-studies/about/ index.asp and should be submitted to the Department of Romance Studies (303B Morrill Hall) or to Callean Hile at clh2@cornell.edu.

## Study Abroad in France

French majors or other interested students may study in France for one or two semesters during their junior year. Opting for one of several study-abroad plans recognized by the Department of Romance Studies facilitates the transfer of credit. Information about these plans is available from the director of undergraduate studies.
Students must be Cornell undergraduates with a strong academic record. The minimum French preparation is the completion of FREN 219 or its equivalent in advanced credit or placement by the Cornell CASE examination. Taking FREN 301 or 305 , or even 312 or 313 is, however, strongly recommended. Students interested in Studying in France are encouraged to consider the special benefits offered by EDUCO, the program in Paris cosponsored by Cornell, Emory, and Duke Universities. EDUCO offers advanced students a challenging course of study and the experience of total immersion in French life and culture in Paris. Participants in this program spend the year or semester as fully matriculated students at the Universities of Paris VII or IV and other institutions of higher learning in Paris, including the Institut d'Etudes des Sciences Politiques (Science Po), selecting courses in many fields from the regular university course offerings. Students begin the academic year with an intensive three-week orientation in French history, society and daily life. While it is possible to enroll in the EDUCO Program for one semester, admission will be offered first to students planning to study abroad for the full academic year.
EDUCO maintains a center in Paris with full support staff. The resident director, chosen
annually from the Cornell, Emory, and Duke faculties, teaches a special seminar each semester, provides academic advice, and helps ensure the quality of the courses. The center, which includes a small library and wordprocessing facilities, is regularly used by students for special tutorials, seminars, and lectures, as well as informal gatherings.
Honors. The honors program encourages well-qualified students majoring in French literature and culture to do independent work in French beyond the required course work for the major. The preparation of the senior honors essay, generally spread over two semesters, provides a unique learning opportunity, since it allows for wide reading and extensive rewriting to a degree not possible in the case of course papers.
To be eligible for honors, students must have a general grade point average of at least 3.00 and a grade point average of at least 3.5 in the French major.
No special seminars or courses are required of honors students, but they will have regular meetings with the faculty advisors who have agreed to supervise their work. They may receive course credit by enrolling in FREN $429-430$, but these independent study courses must be taken in addition to the courses that meet the minimum requirements for the major. At the end of the senior year, each honors student is examined orally on the honors essay by a jury consisting of his or her faculty advisor and two other faculty members. The senior essay is to be made available for reading by the jury on or before April 15. The awarding of honors is determined by the student's grades in the major and the quality of the honors essay,
Enrollment in a language course is conditional upon the student's eligibility for the particular level and on attendance at the first scheduled class session. Because of the high demand for language courses, a student who fails to attend the first class meeting will be dropped so others may register.
Note: Students placed in the 200 -level course have the option of taking language and/or literature courses.

## FREN 121-122(1210-1220) Elementary French

121, fall; 122, spring. 4 credits each term. Students who have previously studied French must have an LPF score lower than 37 , or SAT II lower than 410, to be eligible for FREN 121. Prerequisite for 122: LPF score 37-44 or SAT II 410-480, FREN 121. J. Luks (course coordinator) and staff. FREN 121-122 is a two-semester sequence of courses designed to provide a thorough grounding in French language and an introduction to intercultural competence as preparation for real-world application or eventual work in literary and/or cultural studies. Classes provide context- and genrespecific practice in speaking, listening, reading, writing, as well as analytical skills for grammar, with the goal of helping students to develop the necessary tools to become independent language learners.

FREN 123(1230) Continuing French
Fall or spring. 4 credits. Prerequisite: FREN 122 or an LPF score of $45-55$ or SAT II 490-590. Recommended courses after FREN 123: FREN 206 or 209. Fall:
K. Proux-García (course coordinator) and staff; spring: K. Proux-García
FREN 123 is an all-skills course designed to improve pronunciation, oral communication, and reading ability; to establish a groundwork for correct writing; and to provide a substantial grammar review. The approach in the course encourages the student to see the language within the context of its culture

## FREN 206(2060) French Intermediate

 Reading and WritingFall or spring. 4 credits. Satisfies Option 1. Prerequisite: FREN 123, LPF score 56-64, or SAT II 600-680. Conducted in French. Recommended courses after FREN 206: FREN 210, 219 or 221. Students who have taken FREN 206 are not eligible to take FREN 209 for credit. S. Tun.
This language course is designed for students who want to focus on their reading and writing skills. Emphasis is placed on grammar review and expansion, vocabulary
development, and appreciation of different styles of language. Diverse text types are used, including a contemporary novel and studentselected material.

## FREN 209(2090) French Intermediate

 Composition and Conversation IFall, spring, or summer. 4 credits. Satisfies Option 1. Prerequisite: FREN 123, LPF score $56-64$, or SAT II 600-680.
Recommended courses after FREN 209: FREN 210, 219 or 221. Students who have taken FREN 209 are not eligible to take FREN 206 for credit. Fall: C. Sparfel (course coordinator), C. Waldron, and staff; spring: C. Sparfel (course coordinator), and staff; summer: C. Walchron
This intermediate level course is designed for students who want to focus on their speaking and writing skills. Emphasis is placed on strengthening of grammar skills, expansion of vocabulary and discourse levels to increase communicative fluency and accuracy. The course also provides continued reading and listening practice as well as development of effective language learning strategies.

## FREN 210(2100) Pronunciation of

 Standard FrenchSpring. 3 credits. This course cannot serve to fulfill the language
requirement. Prerequisites: FREN 206 or higher, CASE Q+, or permission of instructor. T. Alkire.
This intermediate level course focuses on accent reduction. Students will learn how to transcribe French sounds while simultaneously engaging in systematic listening and pronunciation exercises. The exercises target vowels, consonants and basic intonational patterns. Expressive intonation may be addressed near the end of the semester if time permits. Class work will include memorization of short dialogues and scenes from films. Students will achieve better pronunciation, greater fluency, and increased self-assurance in spoken French by the end of the course.

## FREN 219(2190) French Intermediate

 Composition and Conversation IIFall or spring. 4 credits. Satisfies Option 1. Prerequisite: FREN 206 or 209, or permission of instructor, or $\mathrm{Q}+$ on the Cornell Advanced Standing Examination (CASE). Taught in French. FREN 221 may be taken concurrently with 219 . Recommended courses after FREN 219: FREN 221, 301 or 305. Fall: S. LoBello (course coordinator) and staff, spring:
S. LoBello (course coordinator) and staff. This course emphasizes conversation based on short stories, poems, a play, a novel, newspaper articles, short videos and oral presentations by students. Improving grammatical accuracy and enriching vocabulary in oral and written expression of French occur in the lively classroom discussions, as well as through written and oral analyses of the readings, compositions on student-selected topics, and through grammar review. Themes and emphases may vary from section to section.

## FREN 221(2210) Introduction to Toxtual Analysis (LA-AS)

Fall or spring. 3 credits. Satisfies Option 1. Prerequisite: FREN 206 or 209 or CASE Q+ Conducted in French. Fall: C. Howie and staff, spring: M. C. Vallois and staff. Designed to introduce students to methods of textual analysis, through reading and discussion of works in various genres (narrative prose, drama, poetry) from the French and Francophone world. Emphasizes the development of analytical skills, in particular close readings by a variety of authors from different periods.

## FREN 224(2240) The French Experience

 (CA-AS)Fall. 4 credits. Conducted in English C. Howie

The French Experience is inevitably a misleading title: as if there were only one experience to speak of, and only one France: as if we could say with any precision what these are and why they might matter. This course intends to give students the chance to see that France has meant many different things to many different folks over time. From the Middle Ages to modernity, we'll take a look at a handful of texts-literary, historical, philosophical-that have wrestled with issues of identity and community. In the process, we'll have a chance to engage with what, if anything, France might mean for us now. Readings could include the romances of Chrétien de Troyes, the histories of Renaissance heretics and witches, the scandals and seductions of early modern aristocrats, ongoing debates surrounding philosophy and sovereignty, and various modern accounts-in print and on film-of love, language and citizenship. We'll give priority to texts and voices that challenge customary notions of Frenchness (white, male, Parisian, post-
Enlightenment) as well as meditation upon the afterlife of those notions in the American imaginary (e.g., David Sedaris, Le Divorce).

## FREN 301(3010) Advanced French

 Composition and ConversationFall or spring. 4 credits. Satisfies Option 1. Prerequisite: FREN 219 or $Q^{++}$on the Cornell Advanced Standing Examination (CASE). Recommended courses after FREN 301: FREN 221, 312 or above. FREN 221 may also be taken concurrently with 301 Students who have taken FREN 305 are not eligible to take FREN 301 for credit. Either FREN 301 or 305 is required for the major. S. LoBello (course coordinator) and staff. In this course, oral communication skills, writing practice, and a comprehensive review of fundamental grammatical structures are integrated with the reading of short stories and articles on current events taken from French magazines or newspapers, chosen for thematic or cultural interest. Students write weekly papers (essays or translations) and give at least one oral presentation in class.

## FREN 305(3050) Advanced French

 through FilmFall or spring. 4 credits. Satisfies Option 1
Prerequisite: FREN 219 or $\mathrm{Q}++$ on the Cornell Advanced Standing Examination (CASE). Recommended courses after FREN 305: FREN 221, 312 or above. FREN 221 may also be taken concurrently with 305 Students who have taken FREN 301 are not eligible to take FREN 305 for credit. Either FREN 305 or FREN 301 is required for the major. C. Waldron.
This language course provides students with opportunities to further develop their written and oral communication, as well as their listening and reading skills, through the use of French contemporary films, related readings, and presentations by guest speakers. Particular emphasis is given to the cultural and historical context within viewed films, as it relates to French contemporary society.

## FREN 312(3120) Advanced French

 Stylistics
## Fall. 4 credits. Satisfies Option 1.

Prerequisite: FREN 301 or 305 , or Q++ on
the Cornell Advanced Standing
Examination (CASE). Students who have taken FREN 313 are not eligible to take FREN 312 for credit. T. Alkire.
This course on stylistics and translation aims to help students develop a richer, more nuanced and idiomatic command of both the spoken and written language. Systematic study of grammar is discontinued as more attention is devoted to topics such as descriptive and prescriptive stylistics, authorial style, varieties of spoken and written French and their literary representations, rhetorical figures, poetics, as well as translation theory and textual analysis. Writing exercises include pastiche, précis, explication de texte, an exercice de style, and theme. Additional exercises will target vocabulary development. Seminar-style participation in class discussions is expected, as are two oral presentations.

## FREN 313(3130) Advanced French

 through NewsSpring. 4 credits. Satisfies Option 1.
Prerequisite: FREN 301 or 305 , or
placement by Cornell Advanced Standing
Examination (CASE). Students who have
taken FREN 312 are not eligible to take
FREN 313 for credit. C. Waldron.
This course prepares students for interacting at an advanced level of proficiency in both speaking and writing. Students will increase their vocabulary and knowledge of idiomatic

French, while discussing and debating topics of current interest as they are presented in French televised news broadcasts and other media. A flexible approach allows students to improve their language skills on an individualized basis.

FREN 321 (3210) Readings in Modern French Literature and Culture (LA-AS)
Fall. 4 credits. Satisfies Option 1. Prerequisites: FREN 221, 301, or 305 or CASE Q++ placement. Conducted in French. L. Dubreuil.
Designed to teach ways of reading and understanding works created from the Romantic period to the present day, in their cultural context. A range of texts from various genres is presented, and students refine their analytical skills and their understanding of various methodologies of reading. Texts by authors such as Balzac, Baudelaire, Cixous, Colette, Duras, Genet, Mallarmé, Michaux, Proust, Rimbaud, Sarratute, Sartre.

## FREN 322(3220) Readings in Early

 Modern French Literature and Culture (LA-AS)Fall. 4 credits. Satisfies Option 1. Prerequisite: FREN 221, 301 or 305 or CASE Q++ placement. Conducted in French. M. Greenberg.
Designed to familiarize students with works from the Renaissance, the Classical period, and the Enlightenment, as well as the cultural and historical context in which these texts are created, reflecting a dynamic period of significant change for France. Texts by such authors as Ronsard, du Bellay, Montaigne, Moliëre, Marguerite de Navarre, Corneille, Diderot, de Lafayette, Racine, Perrault, Rousseau. Students may read texts in the original languages or in translation.

## FREN 331(3310) Detours of Desire: Love in France

Fall. 4 credits. Conducted in English. M. Greenberg.

By reading several key texts that span the history of French literature from the Middle Ages (Tristan and Iseult) to the contemporary period (Jean Genet), we will look at the complicated issues involved in romantic love. Why are the great love stories across the ages tragic? What is the relation between love, desire and death? The readings, will be in English and may include Racine, de LaFayette, Laclos, Stendhal, Zola, Proust. These readings will be informed by several different theories of desire ranging broadly from Andreas Capellanus to Freud and Foucault.
FREN 332(3220) Speed Narrating: Nouvelles, Contes, Rēcits, and Romans Courts in 19th-Century France
Fall. 4 credits. Satisfies Option 1
Prerequisite: FREN 221, 301, or 305 or
CASE Q++ placement. Conctucted in
French. L. Dubreuil.
Contrary to common opinion, the 19th century marks not only the apogee of the novel in French literature, but also new directions for a number of genres. As a counterpoint to the development of narrative "masterworks," numerous oeuvres invent or reinvent ways of telling stories "at great speed." Throughout the century, the non-genre of nouvelle or contes becomes a locus for fantastic or preSciFi, as well as the perfect medium for experimental writing. Texts to be studied may include short stories or rêcits by Prosper Mérimée,

Théophile Gautier, Gérard de Nerval, Guy de Maupassant, Antoine Villiers de L'Isle-Adam, Alfred Jarry.

## FREN 353(3530) Monsters A-X (Aristotle-X-files) (also COM L/FGSS 353[3530]) \# (CA-AS)

Fail. 4 credits. Conducted in English.
This course will explore the classical, medieval, and early modern sources for our notions of monsters, including strange beasts, wild men, demons, witches, and cyborgs. What do these figures tell us about our own attitudes towards racial and gender differences, towards other species and towards nature more generally? Finally, what do these figures tell us about our idea of what constitutes life? Texts to be considered will include Aristotle, On the Generation of Animals, Pliny's Natural History, Victor Hugo's Notre Dame de Paris, Gorton Leroux's I Phantom of the Opera, Ambroise Pare's On Monsters and Marvels, Beowulf. Bram Stoker's Dracula, and various episodes of the $X$-Files ("Detour," "Bad Blood," "El Mundo Gira," etc.) as well as critical material from Donna Haraway (Simians, Cyborgs. and Women and Primate Visions), Judith Butler (Gender Trouble), and Julia Kristeva (Powers of Horror).

## FREN 370(3700) The French Enlightenment and the Modern Citizen \# (CA-AS)

Fall. 4 credits. Satisfies Option 1.
Prerequisite: FREN 301 or 305, 321, 322,
323 , or CASE placement, or permission of instructor. Conducted in French. M. C. Vallois.

Through a reading of various works of the French 18th century (by Montesquieu, Voltaire, Diderot, Rousseau, as well as by other, less canonical authors), this course studies the emergence of new literary discourses and practices aiming at a "secularization" of the literary field, in conjunction with the ideological and epistemological changes that took place under the name of Enlightenment. One of those changes, often seen as the most important, is the production of the modern citizen.

## FREN 373(3730) Religious Violence \#

 (CA-AS)Spring. 4 credits. Satisfies Option 1.
Prerequisite: FREN 221, 301, or 305, or CASE placement, or permission of instructor. Conducted in French. K. Long. Seminar exploring, by means of literary texts and other documents, representations of religious violence in Western Europe from the Middle Ages to the modern era, with a particular focus on France. From Holy War to religiously motivated resistance, what are secular mechanisms used to deploy and to deflect religious violence and what is the significance of the ritualistic aspects of such violence for the culture that produces it? How does violence mark the sacred and secular (for example, the dependence of the Catholic church upon secular authorities for various aspects of enforcement of religious doctrine, from interrogation to execution of heretics)?

FREN 389(3890) Canonical States, Canonical Stages (also COM L 389[3890])
Spring. 4 credits. Conducted in English. M. Greenberg.

The course will be a comparative reading of several 17 th-century tragedies. The authors we will read will be Shakespeare, Lope de Vega,

Calderon, Corneille, and Racine. The course will attempt to delimit the origins of modern state in the exclusionary practices that 17thcentury tragedy stages for both contemporary (to the plays) audiences and to 21st-century audiences. Our critical apparatus will borrow from different theories of ideology and subjectivity, as they pertain to the theatrical experience.
FREN 390(3900) The Roots of Modernism Fall. 4 credits. Satisfies Option 1.
Prerequisite: FREN 301 or $305,321,322$, 323 , or CASE placement, or permission of instructor. Conducted in French R. Klein.
The Modernist era in art, which is associated with movements like Cubism, Surrealism, and Dada, has its roots in "the Banquet Years," the effervescent fin de siecle in Europe that lasted until 1913. In France, the period includes writers like Jarry, Apollinaire, Gide, Valëry, Cocteau, Tzara, and Proust. Composers such as Satie, Stravinsky, artists like Cezanne and Rousseau. In this course, individual works will be examined with an eye to their role as precursors of more familiar recent forms of artistic expression.

## FREN 404|4040) Troubadours and

 Heretics (also COM L 404[4040])Fall. 4 credits. Conducted in English.
R. Klein.

Seminar serving as an introduction to reading old Provençal, with discussions of the structure of the language and problems in translation. Readings include some of the greatest examples of troubadour poetry, as well as extensive historical material for the purpose of understanding social and ideological conflicts that shaped the environment in which that poetry arose and declined.

FREN 413(4130) History of Jews: Modern France (also GOVT 313 [4130])
Spring. 4 credits. Conducted in English. V. Caron.

For description, see GOVT 413.
FREN 418(4180) On the Inner Voice (also S HUM 418[4180])
Fall. 4 credits. Limited to 15 students. D. Riley.

Is the "inner voice" spontaneous, imposed, or a dictated improvisation? We shall be reflecting on this topic [in its poetic, but more often in its extra-literary incarnations] via readings in phenomenology, the history of aphasiology and the history of consciousness, recent developments in neurology, and in philosophies of language and of self. The emphasis will range from theories of the inner voice's location, to its vulnerability or durability. Detailed readings will be suggested on a weekly basis, as the course evolves.

## FREN 419-420(4190-4200) Special topics

 in French Literature419, fall; 420 , spring. 2- 4 credits each semester. Prerequisite: permission of instructor. Staff.
Guided independent study of special topics.
FREN 422(4220) Women's (Hi)stories In French and Francophone Literature (also FREN 622[6220])
Fall. 4 credits. M. C. Vallois
Based on a limited number of texts the course will re-examine the differing relations between literature, history, genre and gender practice and theory across time. Through close analyses of some of our most important gendered and non-gendered stories, we will
attempt to resituate the roots of the fables of identity of our modernity. Examples of case studies may include: the memoirs of and legends around Marguerite de Valois; salon writing and fairy tales; juridical writings and revolutionary pamphlets, Romantic and exotic short stories, domestic and pastoral novels.

## FREN 423(4230) Cerebral Seductions

 (also 8 HUM 425[4250])Spring. Á credits. Limited to 15 students. W. Jones.

What's the most important sexual organ for humans? The brain, of course! Cerebral Seductions concerns both sex and the brain in various ways. We will explore the emergent field of cognitive literary theory and criticism, reading the work of cognitive critics (e.g., Hogan, Richardson, and Zunshine) and cognitive scientists (e.g., Damasio, Gazzaniga), while also considering the ways that other types of literary theory (historicist, poststructuralist, psychoanalytic) might be incorporated within a cognitive framework. With this approach in mind, we will read texts within a literary tradition that recognizedright from the start-the cerebral element in human sexuality: the libertine tradition in 18th-century England and France. Authors will include Rochester, Behn, Richardson, Loclos, de Sade, Austen, and others.

## FREN 424(4240) Psychoanalysis (also FREN 624[6240]) <br> Spring. 4 credits. M. Greenberg.

The class is intended to be an introduction for beginning graduate students and advanced undergraduate students to study the history and theory of psychoanalysis. We will be primarily interested in reading the early texts of psychoanalysis, especially Freud, while indicating the different directions analytic theory and practice will take in their later developments.

## FREN 428(4260) Reading French and Francophone Bande desslnêe Spring. 4 credits. Satisfies Option 1.

 Conducted in French. L. Dubreuil. What if bande dessinee were not doomed to be an inferior kind of entertainment, a massmedia production, a part of popular culture, a codified sign, a new genre of literature, a social discourse or a pure expression of the unconscious? Couldn't it be an art, generating actual outures? After a brief survey of the main theoretical approaches to comics and "BD" (from semiotics to cultural studies), we shall try something new in really reading what bande dessinee shows and says. We will certainly study one classical Belgian "album" (such as Tintin) and should take a look at "pre-historic" BD (from the late 19th century), but the bulk of our time will be devoted to French/francophone works of the last two or three decades coming from various geographical areas (for instance: Tardi, David B., Lewis Trondheim, Marjane Satrapi, Yvan Alaghé).
## FREN 429-430(4290-4300) Honors Work

 in French429, fall; 430, spring (year-long). 8 credits. R grade given at end of fall-semester and final grade at end of spring semester. Open to juniors and seniors. Consult director of honors program for more information. Staff.

FREN 442(4420) Sex in French (also FGSS 442[4420]) (LA-AS)
Spring. 4 credits. Satisfies Option 1. Prerequisite: FREN 221, 301 or 305 , or CASE placement, or permission of instructor. Conducted in French. C. Howie. Does a close investigation of French culture sustain its reputation for sexual provocation? From the medieval querelle de la Rose to the recent bestseller La vie sexuelle de Catherine $M$., the boundaries between representing sex and philosophizing about it are more or less constantly permeable. We'll look at a few particularly fraught moments in this history of permeability, beginning with the medieval dirty stories known as fabliaux and the debates that grew out of the Roman de la rose, Sade's Pbilosophie dans le boudoir, Cocteau's Le livre blanc, Genet's Miracle de la rose, Bataille's Erotisme; Duras' Les yeux bleus cheveux noirs; and films by Patrice Chereau, Cyril Collard, Catherine Breillat, and François Ozon.

## FREN 607(6070) Proseminar (also ITAL SPAN 607[6070])

Fall. 2 credits. Staff.
The proseminar is the place for sustained exchanges between graduate students, faculty, and visiting lecturers. Activities include reading and discussion of seminal texts, chapters from dissertations and works in progress, and articles and essays from visiting lecturers.

## FREN 622(6220) Women's (Hi)stories in French and Francophone Literature (also FREN 422[4220])

Fall. 4 credits. M. C. Vallois.
For description, see FREN 422.

## FREN 629(6290) Colonial Language and Social Order

Spring. 4 credits. Required for Romance
Studies graduate students. Conducted in French. L. Dubreuil.
Seminar will explore the relationships between French language (including: discourse, usages, syntax, vocabulary, etc.) and social prescription or political order in the French colonial empires. While focusing on the specificity of each type of enunciation, we will consider various recourses to language; journal articles, literature, texts of law, political discourses, theatrical performances, songs, etc. We will study colonialist texts as well as "indigenous speech." The class will cover the whole period of French (post)colonialism, from the Ancien Regime to the present, with an emphasis on the $1850-1950$ period.

## FREN 630(6300) French Reading for

 GraduatesSpring. 3 credits. Prerequisite: graduate standing.
Designed for those with little or no background in French. Aims primarily to develop skill in reading French. Covers grammar basics, extensive vocabulary, and strategies for reading in a foreign language. Some flexibility in selecting texts according to fields of interest.

## FREN 639-640(6390-6400) Special

 Topics in French Literature 639, fall; 640, spring. 2-4 credits each semester. StaffGuided independent study for graduate students.

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FREN 663(6330) Idolatry: Vision and
    Belief
Spring. 4 credits. C. Howie.
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This course is an introduction of idolatry, and specifically to the ways in which seeing is believing. What kinds of risks do we run when we place our faith in what we see, and what kinds of visual culture-and visual theory-make room for what sight can't capture? Do the other senses run parallel risks? We'll be pursuing the link between vision and belief in contemporary French thought, focusing especially on recent work by Jean-Louis Chrėtien, Jean-Luc Marion, Marie-José Mondzain, and Jean-Luc Nancy. We'll also have occasion to look at other phenomenologists of the visible, in particular Sara Ahmed, Maurice Merleau-Ponty, Martin Seel, Kaja Silverman, and Vivian Sobchack.
FREN 667(6670) Rethinking the Symbolic (also COM L 667[6670])
Spring. 4 credits. Required of Romance Studies graduate students. Conducted in English. T. McNulty.
Jacques Lacan's distinction between the three registers of the real, the imaginary, and the symbolic has become part of the lingua franca of the human sciences, but often at the cost of any real engagement with the properly psychoanalytic stakes of these terms. This course will explore the articulation of these different registers with a particular emphasis on the symbolic, considering (1) its importance within psychoanalytic theory and practice, and (2) the resources it might offer for an examination of the social link and the political sphere. The argument of this course is that the tendency of many cultural critics to equate the symbolic with social norms and laws not only obscures its properly psychoanalytic expression (the elaboration of the signifying chain under transference that inaugurates the "talking cure"), but repeats the failures and impasses of what Freud called the "solution of neurosis: the appeal to social norms and prohibitions as a defense against the workings of the death drive (or jouissance) in the body.
FREN 672(6720) Deleuze and Lyotard: Aesthetics and Technology (also COM LNISST 634[6340], ENGL 629[6290])
Spring. 4 credits. T. Murray.
For description, see COM L 634.

## FREN 690(6900) Gender and Sexuality in Early Modern Europe (also FGSS 691[6910])

Fall. 4 credits. Required for Romance Studies graduate students. Conducted in English. K. Long.
Is there a norm in depictions of sex and gender in early modern Europe? The conservative (Aristotelian) model of sex difference presents the male as the ideal form, with the female as a defective or lacking version of the male, but the ground for this distinction shifts constantly. This seminar proposes an examination of the deviance already present in this model, and played upon by early modern treatises on gender and sexuality. We will also examine the gap between theoretical presentations of gender and accounts of clinical examination of the gendered body. Texts considered will include medical treatises (Ambroise Paré, Jacques Duval, Jean Riolan), satirical and other literary works (Rabelais, Le Tiers livre), Michel de Montaigne's Essais, and the works of Marie de Goumay, as well as Thomas Artus's I'Isle des bermaphrodites), alchemical works, as well as some political material and popular
pamphlets. Topics to be discussed will include transsexualism, the politics of gender identity, and monstrosity and gender. Most texts will be in French, the seminar will be conducted in English.

## Italian

T. Alkire, M. Baraldi, K. Bättig von Wittelsbach T. Campbell, F. Cervesi, M. Migiel (director of undergraduate studies), P. Swenson. Emerita: A. Grossvogel

## The Major

The Italian section offers a major in Italian with tracks in Italian literature and culture and Italian studies. The first track is designed for students who wish to study Italian language, literature, and culture through the works of writers, artists, and cultural figures who have developed rich and varied aesthetic traditions. The second track in Italian studies includes a broader progression of courses that entails work in related disciplines. Both are designed to provide students with proficiency in reading, speaking, and writing in Italian, to familiarize them with Italian culture, and to assist them in analyzing Italian texts in related fields. For further information, students are asked to consult the director of undergraduate studies.

## Track 1: Itallan Literature and Culture

Track 1 is designed for students who: (1) wish to study Italian language, literature, and culture through the works of writers, artists and cultural figures; and (2) may wish to pursue a Ph.D. in Italian.
Admission: the prerequisite for official admission to Track 1 of the Italian major is successful completion of any ITAL course at the 200 level or higher conducted in Italian.
Students who wish to follow Track 1 in Italian are advised to consult with the director of undergraduate studies (DUS), Professor Kathleen Long (kpl2@cornell.edu), whose office is 320 Morrill Hall. The DUS will take into account the student's interest, preparation, and career goals and assign the student to an advisor. Students majoring in Italian are expected to become conversant with a fair portion of the masterworks of Italian literature, to acquaint themselves with the outlines of Italian literary and cultural history, and to develop some skill in textual and cultural analysis. In conjunction with the major advisor, the student will craft an individualized plan of studies that will meet the minimum requirements for Track 1 as listed here:

- At least 10 Italian literature courses at the 200 level and higher (the prerequisite may be counted toward this requirement. The 1 -credit Italian practicum and the 1 - or 2 credit independent study options do not count as full courses). One of these courses must be at the 400 level and one must focus on Italian texts before the 19th century. With the permission of the advisor, the student may substitute for two of these courses other courses that are deemed relevant to the student's study of Italian, e.g., a course in another national literature, a course in critical theory, or a course in European history.
- At least 20 credits in courses conducted entirely in Italian. The Italian practica may be used to fulfill 3 of these credits. Twelve of these credits must be in
courses in Italian at the 300 level or above.
- Competency in the Italian language (as demonstrated by examination or by course work approved by the DUS).
ITAL 404, History of the Italian Language, and ITAL 403, Linguistics Structure of Italian, may be counted toward the 10 courses required for the major. Note: An introductory course is prerequisite for ITAL 402 and 403 .


## Track 2: Italian Studies

Track 2 in Italian Studies is designed primarily for students who wish to pursue individual interests that do not fall within Track 1 of a major. Students select courses from Italian as well as courses from other departments that have a substantial Italian component, such as History of Art, Architecture, Government, Music, and Comparative Literature. For the list of approved Italian studies courses, please see the director of undergraduate studies.
Admission: By the end of their sophomore year, prospective majors in Track 2 should have taken ITAL 219, Intermediate Conversation and Composition, or demonstrated the equivalent level of fluency.
To complete the program, students must:

1. Demonstrate competence in the Italian language by completing ITAL 313, Advanced Conversation and Composition, or its equivalent;
2. Complete the core series of Italian Studies courses: ITAL 290, Perspectives in Italian Culture (fall), ITAL 295, Italian Cinema (fall), and ITAL 297, Introduction to Italian Literature (spring);
3. Complete at least five courses ( 20 credits) from the approved list of Italian Studies courses at the 300 level or above from no more than three departments. Students planning on studying abroad for a year or a semester in Italy should plan their course work to emphasize their individual interests. Notes: Students must maintain a B- in each of the five Italian Studies courses; and
4. Select a committee of one or more faculty advisors to help formulate a coherent program of study. One of the advisors must come from the Italian section.
Students are encouraged to enrich the program by combining this option with other majors in related fields such as history of art, music, comparative literature, or architecture.

## Concentration in Italian Studies

In order to complete an undergraduate concentration in Italian Studies, students must take at least five courses (a minimum of 15 credits) by selecting courses from the Italian Studies Concentration Course List, one of which must by ITAL 290, Perspectives in Italian Culture. These courses must be allocated among at least three Cornell departments and must include one introductory course and one course at the advanced level. Courses not on the list may be approved by petition only. Language competence must be demonstrated by successfully completing ITAL. 219. Please note that courses taken as part of a study abroad program approved by the Study Abroad Dean may count toward meeting the above requirements.

Students wishing to enroll in the concentration must register their intent by contacting Professor Kathleen Long, Director of Undergraduate Studies, 320 Morrill Hall, who will assign a faculty advisor to students.
Study Abroad in Italy: Italian studies faculty members strongly encourage students to consider studying abroad in Italy. Students will have the opportunity to immerse themselves in Italian and gain a singular perspective on the Italian cultural context.

Students are urged to consider the Bologna Cooperative Studies Program (BCSP), of which Cornell is an associated member. BCSP offers qualified undergraduate students an opportunity to study for a full academic year or a second semester at the University of Bologna for credit. During each semester of the academic year, which begins in October and extends through June, BCSP students enroll in one or two regular University of Bologna courses with Italian students.
Students may also take special courses in Italian literature, language, art history, film studies, and contemporary politics.
Enrollment in a language course is conditional upon the student's eligibility for the particular level and on attendance at the first scheduled class session. Because of the high demand for language courses, a student who fails to attend the first class meeting will be dropped so others may register
Note: Students placed in the 200 -level course have the option of taking language and/or literature courses.

## ITAL 121-122(1210-1220) Elementary

 Italian121, fall; 122, spring. 4 credits each semester. Prerequisite: for ITAL 122, 121 or LPI $37-44$ or SAT II $370-450$. Intended for beginners or students placed by examination. At the end of ITAL 122, students who score lower than 56 on the LPI take ITAL 123; those with 56 or higher may enter the 200 -level sequence. Fall: P. Swenson (course coordinator), T. Alkire, K. Bättig von Wittelsbach, and staff; spring: P. Swenson (course coordinator), K. Battig von Wittelsbach, and staff.
This introductory course provides a thorough grounding in all the language skills: listening, speaking, reading, and writing, with practice in small groups. Lectures cover grammar and culture.

ITAL 123(1230) Continuing Itallan
Fall or spring. 4 credits. Prerequisite: ITAL 122, or LPA 45-55 or SAT II 460-580. K. Bättig von Wittelsbach.

This is an all-skills course designed to improve speaking and reading ability, establish a groundwork for correct writing, and provide a substantial review of grammar.
ITAL 209(2090) Italian Intermediate Composition and Conversation I
Fall or spring. 4 credits. Satisfies Option 1. Prerequisite: ITAL 123, or LPI 56-64, or SAT II 590-680, or CASE Q. Fall: F. Cervesi (course coordinator) and staff; spring: K. Bättig von Wittelsbach.

This course provides a guided conversation, as well as a review of composition, reading, pronunciation, and grammar. It emphasizes the development of accurate and idiomatic expression in the language.

## ITAL 219(2190) Italian Intermediato

 Composition and Conversation II Spring. 4 credits. Satisfies Option 1 Prerequisite: ITAL 209 or equivalent. Staff. Guided conversation, composition, reading, pronunciation, and grammar review emphasize the development of accurate and idiomatic expression in the language.
## ITAL 227(2270) Family Life in Renalssance Italy 击 (HA-As)

Spring. 3 credits. Conducted in English. J: Najemy.
For description see HIST 227.

## ITAL 290(2900) Perspectives in Italian

 Culture (CA-AS)Fall. 3 credits. "Core course" in track two of the Italian major, offered every year. Conducted in English with discussion section in Italian. C. Howie.
This course aims to provide students with the tools necessary to understand the most important social, political and artistic development occurring in contemporary Italian culture. These include the nature of geographic and national fragmentation in post-Risorgimento Italy; the "southern" question and the phenomenon of "Costa Nostra"; Italian contributions to world cinema; and the politics of food. By providing students with interdisciplinary perspectives on Italian culture, students will be introduced to how Italian culture is produced and consumed globally today. Primary readings include selections from Peter Robb, Leonardo Sciascia and Tim Parks, and films from Rossellini, de Sica, Sergio Leone, and Benigni. A group of secondary readings stimulates the discussion of the historical and cultural panorama of contemporary Italy.

## ITAL 295(2950) The Cinematic Eye of

 Italy (CA-AS)Fall. 3 credits. Satisfies Option 1
Prerequisite: ITAL 209 or permission of instructor. Conducted in Italian. A. Righi. An introduction to Italian cinema from the 1940s to today. Students will view representative works of the most important Italian directors in order to create a perspective on one of the world's major national cinematic traditions. We will pay close attention to the socio-political context of the films as well as considering the technical and formal issues that arise when studying Italian cinema. Emphasis will be given to Italian neo-realism, and contemporary Italian films.

## ITAL 297(2970) Introduction to Italian

 Literature (LA-AS)Spring. 3 credits. Satisfies Option 1. "Core course" in Italian Studies major. Conducted in Italian. M. Migiel.
This course aims to introduce students to Italian literature of the 20th century in the genres of the short story and the novel. The course includes significant practice in grammar and composition and to this end, the students are required to write five papers of medium length over the course of the semester.

## ITAL 304(3040) Italian After the Renaissance * (LA-AS)

Fall. 4 credits. Satisfies Option 1. Prerequisites: ITAL 297 (or equivalent course) or permission of instructor. Conducted in Italian. M. Migiel. Italian was for many centuries almost exclusively an artificial construct, a written
language actually utilized by very few people in an Italy where political unification remained a dream until the 1860 s and where literacy rates were not particularly high even during the first part of the 20th century. How do Italians manage to transform their language from an artificial construct based on imitation of centuries-old authors into an expressive instrument that can be used by the entire Italian people? What does language that is "alive and true" to people's experience look and sound like? What kinds of subjects should it treat? What is the place of visual and auditory media (especially film, fadio, and television) in this cultural project? In considering these questions, this seminar will focus on major authors, texts, and linguistic-literary-cultural debates in Italy from the post-Renaissance period to the 20th century.

## ITAL 313(3130) Advanced Itallan:

 Language in Itallan Culture (LA-AS)Fall. 4 credits. Satisfies Option 1.
Prerequisite: ITAL 219 or equivalent or permission of instructor. Conducted in Italian. P. Swenson.
This course focuses on developing oral and written language skills through the study of cultural and social issues of contemporary Italy. Students improve their fluency in the language through oral exercises, compositions, as well as group and individual presentations. The course also entails a grammar review of selected points and analysis of present-day Italian.

## ITAL 330(3300) Itallan Writing Workshop (LA-AS)

Spring. 4 credits. Prerequisite: ITAL 219 or permission of instructor. Conducted in Italian. M. Migiel.
Aimed at helping students to improve their writing abilities in Italian, this course will focus on writing to narrate, writing to persuade, writing to entertain, and writing for social and political change. Objects of study will include the playwright, actor, and political activist Dario Fo (1997 Nobel laureate); one of Italy's most acclaimed feminist writers, Dacia Maraini; and the high-school teacher and prize-winning author Paolo Mastrocola.

## ITAL 333(3330) 1919 A.D. The Rise of Italian Modernism (also ITAL 633[6330])

Fall. 4 credits. Prerequisite: ITAL 219 or permission of instructor. Conducted in Italian. T. Campbell.
The year 1919 represents a watershed in the history of Italian culture for a number of reasons. The First World War had come to an end with Italy's victory as well as its exhaustion; political upheaval on the right and left was commonplace, setting the scene for fascism's grab for power a few short years later; and the role of women in the war effort had created demands for equal representation and rights. A number of writers, artists, and filmmakers began in the immediate post-war to engage deeply with these important changes, giving rise to the birth of Italian modernism, the subject of the course. To understand and appreciate these modernist works, we'll begin by reading Italian accounts of war (and the First World War) including Marinetti's Futurist Manifestos, Lalcova Dacciaio and Lussus Un anno sullaltipiano, turning next to two short novels inflected by the war, Bontempelli's Una vita intensa and Palazzeschi's Il codice di perela, ending with selections from Pirandello. We'll also screen a
number of films that capture the peculiarities of Italy's modernization in the 20th century, including the blockbuster Cabiria.

ITAL 350(3500) The Itallan Renaissance (also HIST 350[3500]) ( (HA-AS) Spring. 4 credits. Conducted in English. J. Najemy.

For description, see HIST 350.

## ITAL 389(3890) Modern Italian Novel

 (LA-AS)Spring. 4 credits. Satisfies Option 1.
Prerequisite: permission of instructor Students who have taken ITAL 389 previously may retake the course for credit, provided that the readings are different. Conducted in Italian. P. Swenson. Through the novels of N. Ginzburg, G. Bassani, P. Levi, R. Loy, this course examines the Italian social and political situation during the Fascist period, the Second World War, and the post-war years. Time, memory, family, the responsibility of the individual, the fate of the Jews, are common themes that pervade the narrative of the authors in both comparable and dissonant ways.

## ITAL 419-420(4190-4200) Speclal Topics

 in Italian Literature419, fall; 420, spring. 2-4 credits each semester. Prerequisite: permission of instructor. Staff.
Guided independent study of special topics.

## ITAL 429-430(4290-4300) Honors Work In Itallan

429, fall; 430, spring (year-long). 8 credits. R grade given at end of fall semester and final grade at end of spring semester. Open to junior and seniors. Consult director of honors program for more information. Staff.

## ITAL 445(4450) Decameron (also ITAL

 645[6450])Fall. 4 credits. Conducted in English. M. Migiel.

Seminar will be dedicated to a reading of Boccaccio's Decameron (1349-51). Particular attention will be dedicated to exploring how the stories of the Decameron represent competing notions of love, marriage, sexuality truth, and honor, as well as how the
Decameron represents a world caught
between aristocratic ideals and the interests of a new mercantile and business class.

## ITAL 607(6070) Proseminar (also FREN/ SPAN 607[6070] <br> Fall. 2 credits. Staff.

The proseminar is the place for sustained exchanges between graduate students, faculty, and visiting lecturers. Activities include reading and discussion of seminal texts, chapters from dissertations and works in progress, and articles and essays from visiting lecturers.
ITAL 633(6330) 1919 A.D. The Rise of Italian Modernism (also ITAL 333[3330])
4 credits. Conducted in Italian. T. Campbell. For description, see ITAL 333.

ITAL 639-640 $6390-6400$ ) Speclal Topics in Italiant Literature
639, fall; 640 , spring. $2-4$ credits each semester. Staff.
Guided independent study for graduate students.

ITAL 645(6450) Decameron (also ITAL 445[4450])
Fall. 4 credits. Conducted in English. M. Migiel.

For description, see ITAL 445.

## Portuguese

Faculty: L. Horne, J. Oliveira.

## PORT 121-122(1210-1220) Elementary Brazilian Portuguese I-II

121, fall; 122, spring. 4 credits each semester. PORT 121 is the prerequisite for PORT 122. J. Oliveira.
This is a full-year introductory course, intended for students with no knowledge of Portuguese, and with limited or no knowledge of Spanish*. Stress is placed upon the development of the fundamental communication skills: listening, speaking, reading, and writing.
PORT 209-219(2090-2190) Intermedlate Brazillian Portuguese for Spanish Speakers I-II 숭
209, fall; 219 , spring. 4 credits each semester. PORT 209 satisfies Option 1. Prerequisite for 209: PORT 122 or permission of instructor; Prerequisite for 219: PORT 209 or permission of instructor. J. Oliveira.

PORT 209-219 is a full-year course intended for students who have already taken the first level of Portuguese, or as an intensive introductory course for those who are native/ near native speakers of Spanish*. An all-skills course with particular emphasis on Brazilian Portuguese spoken within the context of its culture, it presents a fast-paced review focused on improving grammatical accuracy, pronunciation and on enriching vocabulary.

## PORT 320(3200) Readings in LusoBrazillian Literature of the 20th Contury

Spring. 4 credits. Satisfies Option 1. Prerequisites: PORT 219 or permission of instructor. Conducted in Portuguese. L. Home.

This course aims to provide an overview of modern Brazilian literature. It will cover the major literary movements and the essential canonical writers of 19 th- and 20th-century Brazil. Some of the topics to be discussed are: the formation of a national literature; literature and slavery; foreign models and rewritings; diverse definitions of national spaces and landscapes; relationships between aesthetic innovations and political issues and different literary definitions of frontiers, margins, and exclusions. The course also intends to introduce students to the practice of literary analysis, and to provide an opportunity to improve language skills in Portuguese through extensive oral and written practice. Some of the authors to be read include Aluzio Azevedo, J. M. Machado de Assis, Josẻ de Alencar, Mârio de Andrade, Oswald de Andrade, Clarice Lispector, Graciliano Ramos, Joàa Guimarāes Rosa, Nelson Rodrigues and Ana Cristina César.

## PORT 420(4200) Special Topics in Brazllian Literature

Spring. 2-4 credits. Prerequisite: permission of instructor. L. Horne. Guided independent study of specific topics. For undergraduates interested in special problems not covered in courses.

PORT 640(6400) Speclal Toples-Crad
Spring. $2-4$ credits. L. Horne.
Guided independent study of specific topics.

## Quechua

Faculty: L. Morató-Peña

## QUECH 121-122(1210-1220) Elementary Quechua

121, fall; 122, spring. 4 credits each
semester. Prerequisite: for 122 , QUECH
121. L. Morató-Peña.

Beginning conversation course in Quechua.
QUECH 136(1360) Quechua Writing Lab
Spring. 1 credit. Corequisite: QUECH 122 or permission of instructor. Letter grade only. L. Moratô-Peña.
Computer-assisted drill and writing instruction in elementary Quechua.

## QUECH 209-219(2090-2190) Continuing

 Quechua 웅209, fall; 219, spring. 3 credits each
semester. Satisfies Option 1. Prerequisites:
for 209, QUECH 122 or equivalent; for 219:
QUECH 209 or equivalent. L. Moratō-Peña. Intermediate conversation and reading course. Study of the Huarochiri manuscript.
QUECH 300(3000) Directed studies
Fall or spring. $1-4$ credits variable.
Prerequisite: permission of instructor.
Times TBA with instructor. L. Moratô-Peña.
Taught on a specialized basis to address
particular student needs.

## Romance Studies

ROM S 321(3210) History of Romance Language (also LINa 321[3321]) * (HA-AS)
Fall. 3 credits. C. Rosen.
For description, see LING 321.
ROM S 452(4520) Renaissance Humanism (also ROM $\$$ 6526520]; ENGL 420/624[4200/6240], COW L 452/652[4520/6520]) " (LA-AS)
Spring. 4 credits. W. Kennedy.
For description, see COM L 452.

## ROM S 453(4530) Structure of Latin (also

 LING 453[4453]) (KCM-AS)Fall. 4 credits. A. Nussbaum.
For description, see LING 453.
ROM S 507(5070) Methodology of Romance Language Learning and Teaching
Spring. 3 credits. J. Luks, M. K. Redmond, and P. Swenson.
Focuses on language teaching as facilitation of learning, thus on the learner's processing of language acquisition and the promotion of reflective teaching. Pedagogical approaches will be addressed from a learner-centered perspective involving effective language learning strategies and analysis.
ROM 5 508(5080) TA Practicum
Fall. 1 credit. Required for all graduate TAs teaching language for the first time in the Department of Romance Studies. Staff. This practicum is designed to better enable the TAs to meet the needs of their students in the understanding and acquisition of the linguistic forms, notions and functions covered in their course.

ROM S 652(6520) Renaissance Humanism (also ROM S 452[4520]; ENGL 420/824[4200/8240], COM L 452/652[4520/6520])
Spring. 4 credits. W. Kennedy
For description, see COM L 452.

## Spanish

S. Amigo-Silvestre, I. Auffret, T. Bevia, B. Bosteels, L. Carrillo, D. Castillo,
M. A. Garcés, J. Rodriguez-García, L. Horne, C. Lawless, L. Meza-Riedewald, N. MaldonadoMendez, S. Morales-Rivera (visiting),
L. Morató-Peña, J. E. Paz-Soldản, S. Pinet, M. K. Redmond, J. Routier-Pucci, E. SánchezBlake, A. Stratakos-Tió, B. Teutli (associate chair). Emeritus: C. Morón Arroyo.

## The Malor

The Spanish major is designed to give students proficiency in the oral and written language, to acquaint them with Hispanic culture, and to develop their skill in literary and linguistic analysis. Satisfactory completion of the major should enable students to meet language and literature requirements for teaching, to continue with graduate work in Spanish or other appropriate disciplines, and to satisfy standards for acceptance into the training programs of the government, social agencies, and business concerns. A Spanish major combined with another discipline may also allow a student to undertake preprofessional training for graduate study in law or medicine. Students interested in the major are encouraged to seek faculty advice as early as possible. For acceptance into the major, students should consult Professor Kathleen Long (kpl12@cornell.edu), director of undergraduate studies, in 320 Morrill Hall, who will admit them to the major, and assign them an advisor from the Spanish faculty. Spanish majors will then work out a plan of study in consultation with their advisors. Spanish majors have great flexibility in designing their programs of study and areas of concentration. Previous training and interests as well as vocational goals will be taken into account when the student's program of course is determined.
SPAN 219 is a prerequisite to entering the major in Spanish.
All majors will normally include the following core courses in their programs:

1. SPAN 215,215 , and 217 (not necessarily in that order).
2. SPAN 310 and 311.
3. One of the two annually designated senior seminars.

## The Spanish Literature Option

The Spanish literature option normally includes at least 15 credits of Spanish literature beyond the core courses. Literature majors are strongly urged to include in their programs all the major periods of Hispanic literature

## Area Studies Option (Spanish, Latin American, or U.S. Latino Studies):

At least 15 credits of courses at the 300 level and above in any of those focus areas beyond the core, all courses to be approved through consultation with the major advisor. Courses should reflect interdisciplinary interests in the area and may include up to three other academic fields of interest. For example, a
student interested in Latin American studies may want to include courses on such topics as Latin American history, government, rural sociology, and economics. Students who want to specialize in U.S. Latino issues may want to include such topics as sociology of Latinos, Latino history, and Latino medical issues in addition to further studies in literature. Students specializing in Spanish studies planning on spending a year or semester in Spain (but not exclusively such students) frequently plan their course work to emphasize Spanish history, art, political economy, and other related field courses, such as courses on Islam and Moorish or Jewish Spain.
Students are encouraged to enrich the major program by including a variety of courses from related fields or by combining Spanish with related fields such as history, philosophy, sociology, anthropology, art, music, classics, English, comparative literature, and other foreign languages and literatures. The interdepartmental programs in Latin American studies and Latino studies sponsor relevant courses in a variety of areas.
The J. G. White Prize and Scholarships are available annually to undergraduate students who achieve excellence in Spanish.

## Concentration in Spanish

The concentration promotes a broad understanding of Spanish and Spanish American culture, literature, and society; it also encourages students to refine and practice their language skills. In order to complete the concentration, students must take a minimum of 5 courses ( 15 credits), distributed as follows: Language competence must be demonstrated by successfully completing either SPAN 310 (Advanced Spanish Conversation and Pronunciation) or SPAN 311 (Advanced Spanish Composition and Conversation I). Concentrators must furthermore complete either SPAN 220 (Perspectives on Latin America) or SPAN 223 (Perspectives on Spain), as well as three elective courses to be chosen in consultation with the student's advisor. Among those electives, students are strongly encouraged to take at least one course at the advanced 300400 level.
Students wishing to enroll in the concentration must register their intent by contacting Professor Kathleen Long (kpl12es@cornell. edu), 320 Morrill Hall, who will assign a faculty advisor to each concentrator.
Study Abroad in Spain: Cornell, the University of Michigan, and the University of Pennsylvania co-sponsor an academic year in Spain program. Students enrolled in this program spend the first month before the fall semester begins in an orientation session at the University of Seville, where they take courses in Spanish language and culture and take advantage of special lectures and field trips in Andalusia. The College of Arts and Sciences awards 3 credits for orientation. Once the semester begins, students enroll in regular classes at the University of Seville and at the program's center facility. Center courses are designed for the program and include a seminar offered by the resident director, from the faculty of either Cornell, Michigan, or Pennsylvania. Other center courses typically include history of art, history of the Mediterranean region, a literature course, and Spanish composition and syntax. In Seville,
students live in private homes and a rich array of cultural activities and excursions are organized every semester.
Applicants are expected to have completed SPAN 219 before departure. Completion of SPAN 311 is highly recommended. Students are strongly encouraged to study abroad for the entire year rather than one semester. Students interested in the study abroad program should visit Cornell Abroad in 474 Uris Hall and see the Cornell Abroad web site: www.einaudi.cornell.edu/cuabroad.
Study Abroad in Bolivia: The summer program in Cochabamba, Bolivia, is sponsored by the Latin American Studies Program and accepts both undergraduate and graduate students. Students live with Bolivian families and normally take two courses with Cornell faculty who participate in this program. In addition to course work in Bolivian culture, politics, and social movements, the program features the opportunity to do intensive study in Quechua, the native language spoken by many Bolivians, and Peruvians, as well as Spanish, and to participate in research and internships with grass-roots communities, government offices, and businesses.
Honors: Honors in Spanish may be achieved by superior students who want to undertake guided independent reading and research in an area of their choice. Students in the senior year select a member of the Spanish faculty to supervise their work and direct the writing of their honors essay (see SPAN 429-430).
Enrollment in a language course is conditional upon the student's eligibility for the particular level and on attendance at the first scheduled class session. Because of the high demand for language courses, a student who fails to attend the first class meeting will be dropped so others may register.
Note: Students placed in the 200 -level course have the option of taking language and/or literature courses.

## SPAN 112(1120) Elementary Spanish: Review and Continuation

Fall. 4 credits. Prerequisite: LPS $37-44$ or SAT II 370-450. Students who have taken SPAN 121 may enroll. S. Amigo-Silvestre. Provides a basic review and then moves on to cover new material for the remainder of the semester. As part of the final exam, students take the LPS and, according to their score, may place into SPAN 123 (score below 56) or into the 200 -level course (score 56 or above).

## SPAN 121-122(1210-1220) Elementary

 Spanish121, fall and summer; 122 , spring. 4 credits each semester. Intended for students with no experience in Spanish; students who have previously studied two or more years of Spanish may not attend unless they have LPS lower than 37 or SAT II lower than 370. Prerequisite: for 122, SPAN 121 or LPS 37-44 or SAT II 370-450.
M. K. Redmond (course coordinator), and staff.
The goal of SPAN 121-122 is to provide a thorough grounding in the language and insights into Spanish language and Hispanic cultures so that students can function in basic situations in a Spanish-speaking culture. Small classes provide intensive, context-specific practice in speaking, reading, writing, and listening comprehension.

## SPAN 123(1230) Continuing Spanish

Fall, spring, or summer. 4 credits.
Prerequisite: SPAN 112 or 122, or LPS 45-55, or SAT II 460-580. Fall: N . Maldonado-Mêndez (course coordinator), L. Moratô-Peña, E. SánchezBlake, and staff; spring: N. MaldonadoMéndez (course coordinator),
L. Moratō-Peña, and staff; summer:
A. Stratakos-Tió.

Lower intermediate-level course providing an intensive grammar review in communicative contexts and practice in all skills. After this course, the student may take SPAN 200, 207, or 209 .
SPAN 200(2000) Spanish for English/
Spanish Bilinguals (also LSP Spanish Bilinguals (also LSP 202[2020])
Fall. 4 credits. Satisfies Option 1.
Prerequisite: LPS 56 or higher, SAT II 590 or higher, CASE placement, or permission of instructor. Not open to students who have taken SPAN 207 or 209.
N. Maldonado-Mèndez and staff

Designed to expand bilingual students'
knowledge of Spanish by providing them with ample opportunities to develop and improve each of the basic language skills, with a particular focus on writing accuracy. After this course, a student may take SPAN 214, 215, 217 or 219.
SPAN 207(2070) Intermediate Spanish for the Medical and Health

## Professions

Fall or spring. 4 credits. Satisfies Option 1. Prerequisite: SPAN 123, LPS 56-64, or SAT II 590-680, Q on CASE exam, or permission of instructor. Students who have taken SPAN 200 or 209 should speak to instructor. A. Stratakos-Tiô.
Provides a conversational grammar review, with dialogues, debates, compositions, and authentic readings on health-related themes. Special attention is given to relevant cultural differences and how cultural notions may affect medical care and communication between doctor and patient. The objective of 207 is to provide practice in real-life application, such as taking a medical history, calming a patient, and how to speak to a Hispanic patient in a culturally acceptable manner. After this course, a student may take SPAN 214, 215, 217 or 219.

## SPAN 209(2090) Spanish Intermediate

 Composition and Conversation I Fall or spring. 4 credits. Satisfies Option 1. Prerequisite: SPAN 123, LPS 56-64, or SAT II 590-680. Not open to students who have taken SPAN 200 or 207. J. Routier-Pucci (course coordinator), I. Auffret, T. Beviä, and staff; spring: T. Beviā (course coordinator), S. Amigo-Silvestre, and staff. Provides a conversational grammar review with special attention to the development of accurate and idiomatic oral and written expression. Assignments include compositionwriting, reading and discussion Spanish and Spanish American short stories and poetry, and viewing several films. After this course, a student may take SPAN $214,215,217$ or 219.
## SPAN 214(2140) The Spanish Difference: Readings in Modern Iberian Literatures (LA-AS)

Fall or spring. 4 credits. Satisfies Option 1. Prerequisite: SPAN 207 or 209, or CASE Q+, or permission of instructor. Conducted in Spanish. J. M. Rodríguez-García and staff.

Introductory survey of modern Spanish literature. Students develop their analytical skills and learn basic literary concepts such as genre (drama, lyric, short story and novel) and style (romanticism, realism, etc.) as well as male/female perspectives and the translation of literature to film language. The survey introduces students to Spain's cultural complexity through readings of works by authors representative of its diverse linguistic and literary traditions

SPAN 215(2150) The Tradition of Rupture: Latin American Writing from Modernism to the Present (also LAT A 215[2150]) © (LA-AS)
Fall or spring. 4 credits. Satisfies Option 1. Prerequisite: SPAN 207 or 209 , or CASE Q+ or permission of instructor. Conducted in Spanish. Fall: M. Stycos and staff, spring: L. Horne and stafl

Readings and discussion of representative texts of the 19 th and 20th centuries from various regions of Spanish America. Among the authors considered are Sarmiento,
Hernảndez, Martí, Darío, Agustini, Cortazar, García Márquez, Poniatowska, and Valenzuela

## SPAN 217(2170) Early Hlspanic

 Modernities: Readings In Medieval and Early Modern Iberian and Spanish-American Literatures (also LAT A 217[2170]) (LA-AS) \#Fall or spring. 4 credits. Satisfies Option 1. Prerequisites: SPAN 207 or 209, or CASE Q+, or permission of instructor. Conducted in Spanish. Staff
This course explores major texts and themes of the Hispanic tradition from the 11th to the 17 th centuries. We will examine general questions on literary analysis and the relationship between literature and history around certain events, such as medieval multicultural Iberia, the creation of the Spanish Inquisition in the 15 th century and the expulsion of the Jews in 1492; the encounter between the Old and the New Worlds; the "opposition" high/low popular culture of the secular and the sacred in poetry and prose. Issues of representation regarding gender, identities, and subjectivity may also be studied. Readings may be drawn from medieval short stories and miracle collections; chivalric romances, Columbus and the literary discovery, Lazarillo de Tormes, Cervantes, Lope de Vega, Calderon, and Sor Juana Ines de la Cruz, among others.

## SPAN 219(2190) Spanish Intermediate

 Composition and Conversation II Fall or spring. 4 credits. Satisfies Option 1 Prerequisite: SPAN 207 or 209, or CASE Q+. Fall: L. Meza-Riedewald (course coordinator), and C. Lawless; spring: L. Meza-Riedewald (course coordinator) and I. AuffretThis advanced-intermediate course is designed to prepare students for entry into the major, and for study abroad. Very specifically, it aims to prepare students for advanced level courses, in a native-speaker context, where analytical writing is required, as well as more sophisticated grasp and discussion of texts.
Overall, the course goal is to guide students to take greater command of their own language learning process to optimize their continued progress in the acquisition of Spanish and the understanding of the diversity of cultures in which the language is spoken. SPAN 219 may be taken concurrently with SPAN 214, 215, or 217.

SPAN 220(2200) Perspectives on Latin America (also LAT A 220[2200]) © (CA-AS)
Spring. 3 credits. Highly recommended for Latin American studies concentrators.
Conducted in Spanish. B. Bosteels and C. Lawless.

Interdisciplinary, co-taught course offered every spring through the Latin American Studies Program. Topics vary by semester, but readings always focus on current research in various disciplines and regions of Latin America. The range of issues addressed include the economic, social, cultural, and political trends and transitions in the area. In the weekly meetings, instructors and guest lecturers facilitate student discussions. Students taking the course are required to participate in all class discussions and write a research paper in their chosen focus area.

## SPAN 223(2230) Perspectives on Spain

 (LA.AS)Fall. 4 credits. Satisfies Option 1 Prerequisite: SPAN 219 or permission of instructor. Conducted in Spanish.
S. Morales-Rivera.

An introduction to Spain's history, plural cultures, and present-day society. Through a series of key literary works, films, and other visual representations we will explore such topics as the place of tradition, religion, and the family in modern Spain. Our focus will be on the transformation of Spain from an authoritarian state under ${ }^{\circ}$ General Franco's dictatorship (1939-1975) into a remarkably diverse and pluralistic nation in which linguistic, cultural, political, and gender differences have been consecrated in a very progressive legislation. This course satisfies the main requirement for the concentration in Spanish, may be used as an elective for the major, and is crucial to those planning to study abroad in Spain in the near future

## SPAN 246(2460) Contemporary Narratives by Latina Writers (also LSP/FGSS 246[2460]) (LA-AS)

Fall. 3 credits. Conducted in English. 1). Castillo.

Survey of narratives, including novels, short fiction, essays, political;/feminist manifestoes, and memoirs by representative Latina writers of various Latino ethnic groups in the United States and the Americas, including Chicana, Chilean, Cuban, Dominican, and Puerto Rican, among others. Investigates the parallel development of a Latina perspective on personal, social and cultural issues alongside that of the U. S. ethnic liberation/revitalization movements of the 1960 s to contemporary feminist activism and women of color movements. The course investigates these works as artistic attempts to deal with issues of culture, language and bilingualism, family, gender, sexuality, and domesticity among others. Regional distinctions and contributions are accounted for. Readings include works by Julia Alvarez, Elena Casteco, Sandra Cisneros, Judith Ortiz Cofer, Cristina Garcia, Ana Lydia Vega, and others

## SPAN 248(2480) Poetry of the Latino Experience (also LSP 248[2480]) (LA-AS)

Spring. 3 credits. Staff
Survey of the central importance of poetry in the modern and contemporary Latino/a experience. Readings chart and critique the developments beginning in the civil rights struggles during the 1960 s among Chicanos/as in the West and the Southwest United States
and among Nuyorican writers in the East Coast through to the 1980s development of feminist, lesbian, and gay poetry, the Cuban poets emerging as the "American" generation, and concluding with recent poetry produced in the atmosphere of immigration, labor issues, globalization, and the institutional academy.

## SPAN 301(3010) Hispanic Theatre Production (also LAT A 301[3010])

Fall or spring. 1-3 credits variable.
D. Castillo and E. Sánchez-Blake.

Students develop a specific dramatic text for full-scale production. The course involves selection of an appropriate texts close analysis of the literary aspects of the play, and group evaluation of its representational value and effectiveness. All students in the course are involved in some aspects of production of the play, and write a final paper as a course requirement. Credit is variable depending upon the student's role in play production: a minimum of 50 hours of work is required for 1 credit; a maximum of 3 credits are awarded for 100 hours or more of work.

## SPAN 310(3100) Advanced Spanish

 Conversation and PronunciationFall or spring. 3 credits. Satisfies Option 1 Prerequisite: SPAN 219 or CASE Q++ or permission of instructor. B. Teutli Conversation course with intensive oral practice obtained through the production of video programs. Students practice the fundamental aspects of communication in the standard spoken and written Spanish, with some focus on dialectal variations. There are weekly pronunciation labs

## SPAN 311(3110) Advanced Spanish Writing Workshop

Fall or spring. 4 credits. Satisfies Option 1 Prerequisite: SPAN 219 or CASE Q++ or equivalent. C. Lawless (course coordinator) and staff.
This course, which is required for the major, is designed to help the learner develop increased accuracy and sophistication in writing in Spanish for academic purposes. To this end, there will be ample writing and revising practice, with a focus on specific grammatical and lexical areas, customized to the needs of the students enrolled in the course. SPAN 311 may be taken concurrently with SPAN 214,215 , or 217

## SPAN 313(3130) Spanish Writing Workshop for Advanced English/ Spanish Bilinguals (LSP 313[3130])

Fall. 1 credit. Prerequisite: permission of instructor. N. Maldonado-Méndez and staff. Designed for the advanced bilingual seeking support in the development of written accuracy, this workshop can serve as a complement for a literature or culture course conducted in Spanish. Meets one hour per week, concurrently with one of the weekly sessions of SPAN 200. Students enrolled in this course are expected to work autonomously, to keep up with the syllabus of SPAN 200, and to come to class with focused questions drawn from writing tasks either assigned from other courses, or prepared as self-assigned exercises. The workshop will be conducted in a peerediting format. The final exam will consist of preparing a term paper in Spanish that demonstrates progress achieved in written accuracy. Students who have taken other Spanish language courses in the department including SPAN 200, and who have difficulties with writing identified as specific to the

English/Spanish bilingual, are eligible to enroll in the 1 credit SPAN 313. with the instructor's permission. Course may be repeated for credit

SPAN 330(3300) Literature and the Arts Fall. 4 credits. Satisfies Option 1.
Prerequisite: SPAN 214, 215, or 217 , or permission of instructor. Conducted in Spanish. J. M. Rodriguez-García:
Literature is just one of many genres and media that artists have used to capture the ongoing transformations in our ways of looking at reality. The dialogue between literature and other artistic productions (e.g. painting, music, sculpture) will be the main focus of this course, whose topics may feature one or more of the following combinations: the interface of poetry and the visual arts, of fiction and cartography, and of avant-garde writing and technology-based modes of representation, among others.

## SPAN 404(4040) The Task of the Cleric (also S HUM 404[4040), COM L 406[4060])

Fall. 4 credits. S. Pinet
This seminar will explore three main topicstranslation, cartography, and economy-through two 13th-century Spanish works of mester de clerecia, the Libro, de Alexandre, and the Libro de Apolonio. While all of these are clecidedly Spanish (Castilian) works, their obvious links to a general Western European romance and epic tradition offer ample opportunity to reflect on questions of sources, authority, originality, as well as the close analysis of the practices that reveal developments-especially in the visual arts, politics, and economycontemporary to their composition. Readings will include a variery of theoretical materials on translation, space/place, cartography, and political economy by authors such as Michel de Certeau, Marcel Mauss, Paul Zumthor, George Steiner, Walter Benjamin, and Fredric Jameson, among others.

## SPAN 419-420(4190-4200) Special Topics in Spanish Literature

419, fall; 420 , spring. 2-4 credits each semester. Prerequisite: permission of instructor. Staff.
Guided independent study of special topics.

## SPAN 429-430(4290-4300) Honors Work in Spanish

429, fall; 430, spring (yearlong). 8 credits R grade given at end of fall semester and final grade at end of spring semester Open to junior and seniors. Consult director of honors program for more information. Staff.

SPAN 434(4340) The Mediterranean and Cervantes (also S HUM 424, COM L 411.01)

Spring. 4 credits. M. A. Garces
This course concentrates on the twin themes of cultural exchanges and cultural frontiers in the early modern Mediterranean, where the writer Miguel de Cervantes played an important role as soldier, captive, and spy. We will explore contacts between Muslims and Christians in historical and literary texts emerging from Granada, Algiers, Sicily, Cyprus, and Istanbul in the 16 th and 17 th centuries. Particular attention will be paid to the dynamic improvisation of identities and transfer of men and ideas promoted by the "renegades"-Christians who converted to Islam and fled to Ottoman territories. The readings will range widely and include chronicles on the Guerra de Granada (1568-
1570)-the last armed struggle on Spanish soil between Christianity and Islam-by NuñezMuley and Pêrez de Hita; English and Spanish reports of captivity; plays and novels by Calderón, Cervantes, Marlowe, and
Shakespeare, as well as eyewitness accounts of life in Algiers and Istanbul by Antonio de Sosia and Ogier de Busbecq. Course selections will be supplemented with an ample range of critical approaches. Reading knowledge of Spanish is highly recommended.

## SPAN 441(4410) Iberian Communities

 (LA-AS)Spring. 4 credits. J. M. Rodriguez-García This is a survey of modern Peninsular poets and prose writers whose work foregrounds one or more of the following concepts: community, tradition, collective/national identity, and historical consciousness. Many of these authors either envisioned ideal communities or set out to expose the fraudulent communities promoted by others. The poets studied may include Eduardo Pondal, Rosalía de Castro, Joan Maragall, Antonio and Manuel Machado, Rafael Alberti, Vicente Aleixandre, Luis Cernuda, Emilio Prados, Miguel Hernandez, and Luis Rosales. We will also look at narrative works by ValleInclan (Sonata de invierno), Unamuno (San Manuel Bueno Mârtir), Eugeni d’Ors (Aldeamediana), and Semprún (La escritura o la vida), as well as relevant essays by Unamuno, Maeztu, Ortega y Gasset, María Zambrano, and select non-Castilian authors. Various critics and theories will provide context and background reading.
SPAN 481(4810) Conspiracy Theories and Practices-Senior Seminar for Mispanic Majors
Fall. 4 credits. This is the mandatory senior seminar for Spanish majors. B. Bosteels. This course will study the rising popularity of conspiracy theories and their practice in literature and film from Latin America, with a special focus on the southern cone. Authors include Jorge Luis Borges. Ricardo Piglia, Roberto Arlt and Diamela Eltit.

## SPAN 490(4900) Borders (also COM L

 423[4230])Fall. 4 credits. D. Castillo
This course will focus on literary works that thematize geographical, cultural, and linguistic borders between cultures, languages, and sexual orientations. Topics will include cliscussion of immigration/exile/diaspora; representations of incligenous cultures and languages; transgender, transborder, transamerican voices. Texts may include films like Transamerica, Todo sobre mi madre, Happy Together. Shabnam Mousi. Espaldas mojadas; narratives like Carson's
Atitobiograpby of Red, Schneebaum's Keep the River on your Right, Coetzee's Waiting for the Barbarians, Garcia's Monkey Hunting,
Warner-Vieyra's As the Sorcerer Said. Theorists like Donna Haraway, Rey Chow, Walter Mignolo will provide context and background reaclings.

## SPAN 630(6300) Spanish for Reading

Fall. 3 credits. Prerequisite: graduate standing. J. Routier-Pucci.
Designed for those with little or no background in Spanish and little exposure to written Spanish. Aims primarily to develop skill in reading Spanish. Covers grammar basics, extensive vocabulary, and strategies for reading in a foreign language. The choice of texts depends on the interest of the students.

## SPAN 639-640(6390-6400) Special

 Topics in Spanish Literature639, fall; 640, spring. $2-4$ credits each semester. Staff
Guided independent study for graduate students.

## SPAN 661(6610) Sin, Crimes, and

 Scandal in Early Modern Hispanic LiteratureFall. 4 credits. M. A. Garcès.
Five centuries after its publication, $L a$
Celestina continues to be one of the most submersive works in the Spanish language, a work that imposes its crude and disenchanted worldview on its readers. Sin, crime, and scandal not only mark this splendid artistic achievement, but also distinguish other experimental fictions often characterized as "picaresque" because of their marginal subjectivity, their fascination with the erotic, and their transgression against the law. Our seminar will explore various dissident works within the context of the societies that produced them, such as the aggressively erotic Lozana andaluza by Francisco Delicado, and some not very exemplary novels by Cervantes and Maria de Zayas among other various critics and theories will provide context and theoretical approaches.

## SPAN 665(6650) Dandies and Decadents

Spring. 4 credits. 13. Bosteels.
This seminar studies figures of dandyism, decadence, and anarchy in late 19th- and early 20th-century fiction in Latin America. We will also read Nietzsche, Baudelaire, and
Huysmans, in dialogue with Marti, Silva, and Díaz Rodríguez.

## RUSSIAN

N. Pollak, chair; P. Carden, director of undergraduate studies (on leave spring 2008) (226B Morrill Hall, 255-8350); S. Paperno, director of Russian language program (226E Morrill Hall); W. Browne, R. Krivitsky,
S. Senderovich (on leave fall 2007),
G. Shapiro, V. Tsimberov. Visiting:
C. Golkowski, G. Nehler

For updated information, consult our web sites:
(literature) www.arts.cornell.edu/russian (language) http://russian.cornell.edu

## The Russian Major

Russian majors study Russian language, literature, and linguistics and emphasize their specific fields of interest. It is desirable, although not necessary, for prospective majors to complete RUSSA 121-122, 203-204, and RUSSL 209 as freshmen and sophomores, because these courses are prerequisites to most of the junior and senior courses that count toward the major. Students may be admitted to the major upon satisfactory completion of RUSSA 122 or the equivalent. Students who elect to major in Russian should consult the director of undergraduate studies as soon as possible. For a major in Russian, students are required to complete (1) RUSSA 303-304 or the equivalent, and (2) 18 credits from 300- and 400-level literature and linguistics courses, of which 12 credits must be in literature in the original Russian.
With the permission of the instructor, students may add 1 credit to certain literature courses
by registering for RUSSA 491. Such courses involve a one-hour section each week with work in the Russian language. Students may count two 1 -hour credits toward the 12 hours of Russian literature in the original language required for the major.

## Satisfying the Foreign Language Requirement

## 1. Under Optlons 1a and 1b:

1a. Any Russian-language (RUSSA) course totaling 3 or 4 credits at the 200 level or above (with the exception of RUSSA 300 Directed Study) satisfies the Arts and Sciences language requirement under Option 1a.
1b. Under Options 1a and 1b: After completing the prerequisites RUSSA 121 and RUSSA 122, students may satisfy the language requirement by taking RUSSL 209. Students who qualify for RUSSL 212 may satisfy the language requirement by taking that course. Other RUSSL courses that are taught in Russian may also be used when appropriate.

## 2. Under Option 2:

- In two semesters: RUSSA 103 and 121 in the fall, RUSSA 104 and 122 in the spring.
- In three semesters: RUSSA 121 in the fall, 122 in the spring, 203 the following fall.
- In four semesters: RUSSA 121 in the fall, 122 in the spring, 125 the following fall, 126 the following spring.


## Study Abroad

Students from Cornell frequently participate in the Council on International Educational Exchange and the American Council of Teachers of Russian programs for language study, as well as other Russian language programs. Opportunities are available for study during the summer, a single semester, or the full year. Further information is available from Professor Wayles Browne in the
Department of Linguistics ( 220 Morrill Hall) and from the Cornell Abroad Office.

Honors. Students taking honors in Russian undertake individual reading and research and write an honors essay. Students planning to take honors should consult the director of undergraduate studies in their junior year.

## Russian Language

Detailed information and schedules of the Russian language courses, as well as office hours of the instructors, are available at: http://russian cornell.edu
Suggested tracks for first- and second-year Russian language study

First-year intensive: $103+121$ in the fall, $104+122$ in the spring

First-year nonintensive: 121 in the fall, 122 in the spring

- Second-year intensive: $125+203$ in the fall, $126+204$ in the spring
- Second-year nonintensive: 203 in the fall, 204 in the spring
- Second-year "mostly reading; lighter load" 125 in the fall, 126 in the spring


## RUSSA 103-104(1103-1104)

## Conversation Practlce

103, fall; 104, spring. 2 credits each semester. Students must enroll in one sec of 103 and one sec of 121 in fall and one sec of 104 and one sec of 122 in spring. R. Krivitsky.

Reinforces the speaking skills learned in RUSSA 121 and 122. Homework includes assignments that must be done in the language lab or on the students' own computers.

## RUSSA 121-122(1121-1122) Elementary

 Russian through Film121, fall; 122, spring. 4 credits each semester. Prerequisite: for RUSSA 122,
RUSSA 121. R. Krivitsky, S. Paperno, and V. Tsimberov

Gives a thorough grounding in all the language skills: listening, speaking, reading and writing. Course materials include clips from original Russian films and TV programs. Homework includes assignments that must be done in the language lah or on the students' own computers.

## RUSSA 125-126(1125-1126) Reading

 Russian Press125, fall; 126, spring. 2 credits each semester. sec 1 for non-native speakers of Russian; sec 2 for native speakers of Russian. Prerequisite for 125 sec 1 : RUSSA 122 or placement by department; prerequisite for 126 sec 1: RUSSA 125 or placement by department; prerequisite for 125 and 126 sec 2 : placement by department. Times TBA with instructors.* See starred (*) note at end of RUSSA section. S. Paperno and V. Tsimberov.
The emphasis is on reading unabridged articles on a variety of topics from current Russian periodicals and web pages and translating them into English; a certain amount of discussion (in Russian) may also be undertaken.

## RUSSA 203-204(2203-2204) Intermediate

 Composition and Conversation 203, fall; 204, spring. 3 credits each semester. Satisfies Option 1. Prerequisite: for RUSSA 203, RUSSA 122 and 104, or RUSSA 122 with grade higher than 13 , or placement by department; for RUSSA 204, RUSSA 203 or equivalent. R. Krivitsky, S. Paperno, and V. Tsimberov.Guided conversation, translation, reading, pronunciation, and grammar review emphasizing the development of accurate and idiomatic expression in the language. Course materials include video clips from an original Russian feature film and work with Russian web sites, in addition to the textbook.

## RUS5A 300(3300) Directed Studies

Fall or spring. $1-4$ credits, variable. Prerequisite: permission of instructor. Times TBA with instructor." See starred (*) note at end of RUSSA section. Staff
Taught on a specialized basis for students with special projects (e.g., to supplement a nonlanguage course or thesis work).

## RUSSA 303-304(3303-3304) Advanced

 Composition and Conversation303, fall; 304 , spring. 4 credits each semester. RUSSA 303 Satisfies Option 1. Prerequisite: for RUSSA 303, RUSSA 204 or equivalent; for RUSSA 304, RUSSA 303 or equivalent. R. Krivitsky, S. Paperno, and V. Tsimberov.

Reading, writing, and conversation: current Russian films (feature and documentary), newspapers, TV programs, Russian web sites,
and other materials are used. In some years, completing interviews with native speakers of Russian is a component of RUSSA 304.

RUSSA 305-306[3305-3306) Reading and Writing for Heritage Speakers of Russian
305, fall; 306, spring. 2-3 credits, variable. Prerequisite: placement by department Times TBA with instructor.* See starred (*) note at end of RUSSA section. Course may be cancelled if enrollment is insufficient.
S. Paperno and V. Tsimberov.

Intended for students who speak grammatically correct Russian but do not know Russian grammar and have not learned to read or write Russian well (or have not learned written Russian at all). The two courses are very similar and do not constitute a sequence. Each may be taught slightly faster or slower in a given year, depending on the needs and interests of the students. Two classes a week teach writing and grammar and include related reading. These classes are required, and the students who take them receive 2 credit hours. The third (optional) class teaches reading and discussion, and grants an additional credit hour.

## RUSSA 308(3308) Russian Through

 Popular CultureSpring. 2-3 credits, variable. Prerequisite: RUSSA 304 for non-native speakers of Russian; RUSSA 305 or 306 for heritage speakers of Russian; for all others with advanced knowledge of Russian, placement by department. Not open to fluent native speakers of Russian (recommended: RUSSA 309/310 and RUSSL courses). Conducted in Russian. Times TBA with instructor* See starred (*) note at end of RUSSA section. R. Krivitsky.
Aims to expand the students' vocabulary and their comprehension, speaking, reading, and writing skills, as well as cultural competence, through a mosaic study and discussion of a variety of styles in contemporary Russian popular culture (1970's through the present). Course materials include traditional and urban folklore, film, animation, published texts (prose and poetry), and recordings of songs. Includes two or three essays or similar writing assignments. Work is distributed so that a student may attend all three weekly meetings for 3 credit hours or only two of the meetings for 2 credit hours.

## RUSSA 309-310(3309-3310) Advanced

 Reading309, fall; 310, spring. 4 credits each semester. Satisfies Option 1. Sec. 1 for non-native speakers of Russian; sec 2 for native speakers of Russian. Prerequisites: for sec. 1 of RUSSA 309, RUSSA 204; for RUSSA 310, RUSSA 309 or equivalent; for $\sec 2$ of 309 and 310 , placement by department. Two meetings per week. Times TBA with instructors.* See starred (*) note at end of RUSSA section. May be canceled if enrollment is insufficient. S. Paperno and V. Tsimberov. Designed to teach advanced reading and discussion skills. In section 1, weekly reading assignments include 20-40 pages of unabridged Russian, fiction or nonfiction. In section 2, the weekly assignments are 100-130 pages. Discussion of the reading is conducted entirely in Russian and centered on the content of the assigned selection.

## [RUSSA 401(4401) History of the Russian Language (also LING 417[4417]) (HA-AS)

Spring. 4 credits. W. Browne
For description, see LING 417-418.]
RUSSA 403(4403) Linguistic Structure of Russian (also LING 443[4443]) (KCMAS)
Fall. 4 credits. W. Browne.
For description, see LING 443-444.
RUSSA 413-414(4413-4414) Advanced Conversation and Stylistics
413, fall; 414, spring. 2 credits each semester. Prerequisites: for RUSSA 413, RUSSA 304 or equivalent; for RUSSA 414, RUSSA 413 or equivalent. Times TBA with instructor.* See starred (*) note at end of
RUSSA section. V. Tsimberov.
Involves discussion of authentic Russian texts and films (feature or documentary) in a variety of nonliterary styles and genres.

## RUSSA 491(4491) Reading Course:

 Russian Literature in the Original LanguageFall or spring. 1 credit each semester. Prerequisite: permission of instructor. Times
TBA with instructor.* See starred (*) note at end of RUSSA section. Staff.
To be taken in conjunction with any Russian literature course at the advanced level. Students receive 1 credit for reading and discussing works in Russian in addition to their normal course work.

## RUSSA 601(6601) Old Church Slavonic (also LING 661[6661])

Fall. 4 credits. W. Browne.
For description, see LING 661.

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RUSSA 602/6602) Old Russian Texts
        (also LING 662[6662])
    Spring. }4\mathrm{ credits. W. Browne.
For description, see LING }662
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## RUSSA 633-634(6633-6634) Russian for

 Russian Specialists633, fall; 634, spring. $1-4$ credits, variable. Prerequisite: four years of college Russian or equivalent. Times TBA with instructor.* See starred (*) note at end of RUSSA section. Staff.
Designed for students whose areas of study require advanced active control of the language. Fine points of syntax, usage, and style are discussed and practiced. Syllabus varies from year to year.

## RUSSA 651(6651) Comparative Slavic Linguistics (also LING 671[6671]) <br> Fall. 4 credits. W. Browne.

For description, see LING 671.
*For RUSSA courses marked "Time to be arranged with instructor(*) ${ }^{n}$, bring your class schedule to the organizational meeting, usually held on the second or third day of the semester, where class meeting times will be chosen so as to accommodate as many students as possible. The date, time and place of the organizational meeting is announced at http://russian.cornell.edu, and posted at the Russian Department office ( 226 Morrill Hall). You may also contact the department office at 255-8350 or e-mail russiandept@cornell.edu.
**For TBA courses taught by Wayles Browne, contact Professor Browne (ewb2@cornell.edu or 255-0712).

## Russian Literature

A variety of courses is offered in Russian literature. Readings may be in English translation or in the original Russian or both (see course descriptions). Instruction often encompasses culture and intellectual history as well as literature. Some courses are crosslisted with appropriate departments.
First-Year Writing Seminars: consult the John S. Knight Institute brochure for times, instructors, and descriptions. Next offered 2009-2010.

## [RUSSL 207-208(2207-2208) Themes

 from Russian Culture " (LA-AS)Spring. 3 credits. In translation. Offered
alternate years; next offered 2008-2009.
G. Shapiro.

These courses are based on lectures, discussions, and audio-visual presentations and cover various aspects of Russian culture, such as literature, art, architecture, music, religion, philosophy, and social thought. RUSSL 207 extends through the 18th century, and RUSSL 208 covers the 19th and 20th centuries.]

## RUSSL 209|2209) Readings in Russian Prose and Poetry \# (LA-AS)

Fall. 3 credits. Reading in Russian;
discussion in English. Satisfies Option 1 Prerequisite: For students with $2+$
semesters of Russian language (RUSSA
$121 / 122$ or equivalent). N. Pollak. Short classics of the 19 th-20th centuries, including Pushkin, Lermontov, Tolstoy, Chekhov, Blok, Akhmatova. Assignments adjusted for native fluency. May be used as a prerequisite for RUSSL 300-400 courses with reading in Russian.

## RUSSL 212(2212) Readings in 20th-

 Century Russian Literature (LA-AS)Spring. 3 credits. Reading, writing, and
discussion in Russian. Satisfies Option 1. G. Shapiro.

Course designed for students with native background needing a course to satisfy the language requirement. Goals are to introduce students to 20th-century Russian literature in the original and to improve their Russian reading and writing skills. Readings are from 20th-century masters such as Bunin, Bulgakov, and Nabokov. May be used as a prerequisite for RUSSL $300-400$ courses with reading in Russian.
[RUSSL 279(2279) The Russian Connection, 1830 to 1867 (also COM L 279[2790]) " (LA-AS)
4 credits. In translation. Next offered 20082009. P. Carden.

Examines Russian prose of mid-19th century (Lermontov, Tolstoy) against background of European prose (Rousseau, Musset, Stendhal, Thackeray, et al.)]

## [RUSSL 280(2280) The Russian

 Connection, 1870 to 1960 (also COM L 280[2800]) (LA-AS)4 credits. In translation. Next offered 20082009. P. Carden.

Examines the Dostoevskian novel against background of European prose (Diderot, Camus, Sarraute, et al.]

## [RUSSL 331(3331) Introduction to

 Russlan Poetry \# (LA-AS)Spring. 4 credits. Reading in Russian; discussion in English. Prerequisite: proficiency in Russian or permission of instructor. May be counted toward 12 credits of Russian literature in original language for Russian major. Next offered 2009-2010. S. Senderovich.
A survey of Russian poetry, with primary emphasis on the analysis of individual poems by major poets.]
[RUSSL 332(3332) Russian Drama and Theater (also THETR 322[3220]) * (LA-AS)
4 credits. In translation. Next offered 20082009. S. Senderovich.

19th-20th century plays (Gogol, Ostrovsky, Chekhov). Historical period, cultural atmosphere, literary trends.]
[RUSSL 333(3333) 20th-Century Russian Poetry (LA-AS)
4 credits. Reading in Russian; discussion in English. May be counted toward 12 credits of Russian literature in original language for Russian major. Next offered 2008-2009. N. Pollak.

Close readings of lyrics by major 20th-century poets.]

## RUSSL 334(3334) The Russian Short

 Story " (LA-AS)Fall. 4 credits. Reading in Russian; discussion in English. Prerequisite: proficiency in Russian or permission of instructor. May be counted toward 12 credits of Russian literature in original
language for Russian major. P. Carden.
Survey of two centuries of Russian storytelling. Analysis of individual stories by major writers. Emphasis on narrative structure and on related landmarks of Russian literary criticism.
RUSSL 335(3335) Gogol \# (LA-AS)
Fall. 4 credits. In translation. G. Shapiro. Selected works of Gogol are read closely and viewed in relation to his life and to the literature of his time.

## [RUSSL 337(3337) Films of Russian <br> Literary Masterpieces (LA-AS)

4 credits. In translation. Next offered 2009
2010. S. Senderovich.

Comparative analysis of American films based on Russian novels: War and Peace, and Dr. Zhivago. Problems of translation between media and cultures. 1

## [RUSSL 338(3338) Lermontov's Hero of Our Time " (LA-AS)

Spring. 4 credits. Reading in Russian; discussion in English. Next offered 2009 2010. N. Pollak.

Mikhail Lermontov's Hero of Our Time has
been called the first major Russian novel.
Close reading with attention to linguistic and literary problems.]
[RUSSL 350(3350) Education and the Philosophical Fantasies " (LA-AS)
Fall. 4 credits. In translation. Next offered 2009-2010. P. Carden.
Fundamenta! issues of education explored through great works: Plato's Republic,
Rousseau's Emile, and Tolstoy's War and Peace.]

## [RUSSL 367(3367) The Russian Novel \#

 (LA-AS)Spring. 4 credits. In translation. Next offered 2008-2009. Students who read Russian may sign up for a discussion section of the Russian text for 1 credit (RUSSA 491). N. Pollak.
The rise of the Russian novel in the 19th century: Pushkin, Lermontov, Turgenev, Dostoevsky, Tolstoy, Chekhov.]

## RUSSL 368(3368) 20th-Century Russian Literature (LA-AS)

Spring. 4 credits. In translation. G. Shapiro. A survey of 20th-century Russian prose, including such writers as Bunin, Bulgakov, and Nabokov, as well as Solzhenitsyn, Shalamov, and Voinovich. Students who read Russian may sign up for discussion of Russian text for 1 credit (RUSSA 491).
RUSSL 369(3369) Dostoevsky " (LA-AS)
Fall. 4 credits. In translation. Limited to 40 students. P. Carden.
A survey of Dostoevsky's major novels: Notes from Underground, Crime and Punishment, The Idiot, and The Brothers Karamazou?

## [RUSSL 373(3373) Chekhov In the

 Context of Contemporary European Literature and Art " (LA-AS)4 credits. In translation. Next offered 20082009. S. Senderovich.

Anton Chekhov's stories in the context of the European art of the short story and contemporary paintings. Readings in English translation.]

## RUSSL 385(3385) Reading Nabokov (also ENGL 379[3790]) (LA-AS)

Fall. 4 credits. In translation. Limited to 18 students; priority given to seniors.
G. Shapiro.

Offers an exciting trip into the intricate world of Nabokovian fiction. After establishing himself in Europe as a distinguished Russian writer at the outbreak of World War II, Nabokov came to the United States, where he re-established himself as an American writer of world renown. In our analysis of the Nabokovian artistic universe, we focus on his Russian corpus of works, from Mary (1926) to The Enchanter (writ. 1939), and examine the two widely read novels that he wrote in Ithaca while teaching literature at Cornell, Lolita (1955) and Pnin (1957).

## RUSSL 393(3393) Honors Essay Tutorial

Fall and spring. 8 credits. Must be taken in two consecutive semesters in senior year; credit for first semester is awarded upon completion of second semester. For information, see director of undergraduate studies. Times TBA with instructor. Staff.

## RUSSL 409(4409) Russian Stylistics

 (LA-AS)Spring. 4 credits. Also open to graduate students. Prerequisite: proficiency in Russian or permission of instructor. This course may be counted toward the 12 credits of Russian literature in the original language for the Russian major. S. Senderovich.

Beyond normative grammar. Introduction to idiomatic Russian (morphology, syntax, vocabulary, phraseology) and genres of colloquial and written language. Development of writing skills.
[RUSSL 415(4415) Post-Symbolist Russian Poetry (LA-AS)
4 credits. Reading in Russian; discussion in English. Prerequisite: proficiency in Russian or permission of instructor. This course may be counted toward the 12 credits of Russian literature in the original language for the Russian major. Next offered 20092010. N. Pollak.

Verse, critical prose, and literary manifestos by selected early $20 t h$-century Russian poets, including Annenskii, Pasternak, and Mandelstam.]
[RUSSL 430(4430) Practice in Translation (LA-AS)
Spring. 4 credits. Prerequisite: proficiency in Russian or permission of instructors. Next offered 2009-2010. W. Browne and S. Senderovich.

Practical workshop in translation: documents, scholarly papers, literary works (prose and poetry). Mostly Russian to English, some English to Russian.]
RUSSL 432(4432) Pushkin \# (LA-AS)
Spring. 4 credits. Reading in Russian; discussion in English. Prerequisite: proficiency in Russian or permission of instructor. May be counted toward 12 credits of Russian literature in original language for Russian major. S. Senderovich. Selected works by Pushkin: lyrics, narrative poems, and Eugene Onegin.

## [RUSSL 433(4433) Short Works of Tolstoy

 \# (LA-AS)Fall. 4 credits. Reading in Russian; discussion in English. Prerequisite: RUSSL 209 or 212 or equivalent mastery of Russian language skills. Next offered 20092010. P. Carden.

A selection of short stories and short novels will be read in the original Russian text. Class discussion will focus on the themes and style of Tolstoy's writings, with particular attention to his use of the Russian idiom. The assignments will be adjusted to take into account the language capabilities of those enrolled.]

## [RUSSL 437(4437) A Moralist and a Pornographer (also COM L 437[4370]) (LA-AS)

Spring. 4 credits. In translation. Limited to 15 students. Next offered 2008-2009. S. Senderovich.

Bestsellers Doctor Zhivago and Lolita (both October 1958) concerned the sexual exploitation of a teenage girl.]

## RUSSL 492(4492) Supervised Reading in

 Russian LiteratureFall or spring. $1-4$ credits each semester. Independent study. Prerequisite: students must find an advisor and submit a plan before signing up. Times TBA with instructor. Staff.
[RUSSL 493(4493) Anton Chekhov \# (LA-AS)
4 credits. Reading in Russian; discussion in English. Prerequisite: proficiency in Russian or permission of instructor. Next offered 2008-2009. S. Senderovich.
Major works of Chekhov in Russian; focus on style and language. Readings include stories ("Anna on the Neck," "Darling," "Steppe") and plays (Uncle Vanya and Seagull).]
[RUSSL 499(4499) The Avant-Garde in Russian Literature and the Arts (LA-AS)
Fall. 4 credits. Reading in Russian; discussion in English. Prerequisite: proficiency in Russian or permission of instructor. Next offered 2009-2010. P. Carden.

Literature, theater, and the visual arts in the richly innovative period 1890-1920.]

## $\overline{\text { Graduate Seminars }}$

RUSSL 611(6611) Supervised Reading and Research
Fall or spring. 2-4 credits each semester. Prerequisite: proficiency in Russian or permission of instructor. Times TBA with instructor. Staff.

## Related Languages

## Gzech

## CZECH 300(3300) Directed Studies

Fall or spring. $1-4$ credits, variable.
Prerequisite: permission of instructor.
Times TBA with instructor. ${ }^{\text {* }}$ See double-
starred $(\omega$ ) note at end of UKRAN section.

> Staff.

Taught on a specialized basis to address particular student needs.

## Hungarian

## HUNGR 131-132(1131-1132) Elementary Hungarian

3 credits. Prerequisite: For 132: HUNGR 131 or permission of instructor. This language series (131-132) is not sufficient to satisfy the language requirement. G. Nehler.

Teaches the basic grammar of Hungarian. Designed to aid the student in all facets of language acquisition: speaking, listening comprehension, reading, and writing. Secondsemester Hungarian (132) teaches more advanced grammar of the language at an intermediate level.

## [HUNGR 133-134(1133-1134) Continuing

 Hungarian133, fall; 134, spring. 3 credits. Prerequisite: for 133, HUNGR 132 or permission of instructor; for 134, HUNGR 133 or permission of instructor. This language series ( $133-134$ ) is not sufficient to satisfy the language requirement. Next offered 2008-2009. G. Nehler.
A conversation and reading course designed to aid the student in all facets of language acquisition: speaking, listening comprehension, reading, and writing. Fourthsemester Hungarian (134) teaches more advanced instruction of the language at an intermediate level.]

## HUNGR 300(3300) Directed Studies

1-4 credits, variable. Prerequisite: permission of instructor. Times TBA with instructor.** See double-starred ( ${ }^{(*+}$ ) note at end of UKRAN section. Staff.
Taught on a specialized basis to address particular student needs.

## [HUNGR 427(4427) Structure of

 Hungarian (also LING 427[4427]) (KCM-AS)Next offered 2008-2009.
For description, see LING 427.]

## Polish

## [POLSH 131-132(1131-1132) Elementary

 Pollsh131, fall; 132, spring. 3 credits each semester. Prerequisite: for POLSH 132, POLSH 131 or equivalent. This language series (131-132) is not sufficient to satisfy the language requirement. Offered alternate years; next offered 2008-2009. Staff.
Covers all language skills: speaking, listening comprehension, reading, and writing.]

## POLSH 133-134(1133-1134) Continuing Pollsh

133, fall; 134, spring. 3 credits each semester. Prerequisites: for POLSH 133, POLSH 132 or permission of instructor; for POLSH 134, POLSH 133 or equivalent. Times TBA with instructor *Offered alternate years. See double-starred ( ${ }^{(*)}$ ) note at end of UKRAN section. W. Browne.
An intermediate conversation and reading course

## POLSH 300(3300) Directed Studies

Fall or spring. $1-4$ credits, variable.
Prerequisite: permission of instructor. Times TBA with instructor. ${ }^{* *}$ See doublestarred ( ${ }^{(*)}$ ) note at end of UKRAN section. W. Browne.

Taught on a specialized basis to address particular student needs.

## [POLSH 301(3301) Polish through Film

 and LiteratureSpring. 3 credits. Satisfies Option 1. Prerequisite: POLSH 134 or permission of instructor. Times TBA with instructor. See double-starred (*) note at end of UKRAN section. Next offered 2008-2009.
C. Golkowski.

Language proficiency and insight into Polish culture through videos, films, and contemporary texts. Listening and reading comprehension, conversation, grammar review.]

## Serbo-Croatian

## SEBCR 131-132(1131-1132) Elementary

 Serbo-Croatlan131, fall; 132, spring. 3 credits each semester. Prerequisite for SEBCR 132: SEBCR 131 or equivalent. This language series (131-132) is not sufficient to satisfy language requirement. Times TBA with instructor. Offered alternate years. See double-starred ( ${ }^{*}$ ) note at end of UKRAN section. W. Browne.
Covers all language skills: speaking, listening comprehension, reading, and writing. Includes Bosnian.

## [SEBCR 133-134(1133-1134) Continuing Sorbo-Croatian

133, fall; 134, spring. 3 credits each semester. Prerequisite for SEBCR 133: SEBCR 132 or equivalent; for SEBCR 134: SEBCR 133 or equivalent. Times TBA with instructor. ${ }^{* *}$ See double-starred $\left({ }^{(*)}\right.$ ) note at end of UKRAN section. Offered alternate years; next offered 2008-2009. Staff.
An intermediate conversation and reading course.]

SEBCR 300(3300) Directed Studies
Fall or spring. $1-4$ credits variable.
Prerequisite: permission of instructor. Times TBA with instructor* See doublestarred ( ${ }^{(-)}$) note at end of UKRAN section. Staff.
Taught on a specialized basis to address particular student needs.

## [SEBCR 30243302) Advanced SertoCroatian

Fall. 3 credits. Satisfies Option 1.
Prerequisite: SEBCR 134 or permission of
instructor. Next offered 2009-2010. Staff. Includes Bosnian with Croatian and Serbian. Intensive speaking and writing practice; grammar review. Fiction and nonfiction readings; videos reflecting contemporary South Slavic societies.]

## Ukralnian

UKRAN 300(3300) Directed Studies
Fall or spring. 1-4 credits variable.
Prerequisite: permission of instructor. Times TBA with instructor.* See doublestarred ( ${ }^{* *}$ ) note at end of section. Staff.
Taught on a specialized basis to address particular student needs.
${ }^{* *}$ For these courses, contact Professor Browne (ewb2@cornell.edu or 255-0712) for time and place of organizational meeting(s).

## SANSKRIT

See "Asian Studies."

## SCIENCE AND TECHNOLOGY STUDIES

S. Hilgartner, chair ( 304 Rockefeller Hall, 2559950); K. Vogel (DUS), R. N. Boyd, P. R. Dear, S. H. Hilgartner, R. Kline, C. Leuenberger, B. V. Lewenstein, M. Lynch, T. J. Pinch, A. G. Power, R. Prentice, J. V. Reppy, M. W. Rossiter, P. J. Sengers, S. Seth, Emeritus: W. R. Lynn, L. P. Williams. Adjunct faculty: R. W. Miller, H. Shue, Z. Warhaft

In today's world, issues at the intersection of the technical and the social arise continually in all aspects of life, from the role of computers in society, the history of evolutionary theory, and the challenges of environmental controversies, to the ethical dilemmas of genomics and biomedicine. The field of science and technology studies (S\&TS) addresses such issues through the study of the social aspects of knowledge, especially scientific and technological knowledge. S\&TS explores the practices that shape science and technology, examines their social and cultural context, and analyzes their political and ethical implications. S\&TS provides a strong liberal arts background from which students can go on to careers in law, medicine, environmental policy, business, and a variety of other professions where the social aspects of science and technology loom large.

## The Science and Technology Studies Major

S\&TS courses are organized into a set of core courses plus three themes. Students select the theme that best represents their interests. In consultation with a faculty member, students may devise their own theme as long as it
meets the general criteria of coherence and rigor.

## Admission to the Major

Students intending to major in Science and Technology Studies should submit an application during their sophomore year. Juniors are considered on a case-by-case basis The application includes (1) a one-page statement explaining the student's intellectual interests and why the major is consistent with the student's academic interests and goals; (2) the theme the student wishes to pursue in the major; (3) a tentative plan of courses fulfilling S\&TS requirements; and (4) an up-to-date transcript of work completed at Cornell University (and elsewhere, if applicable).
Acceptance into the major requires completion of the following prerequisites:

1. S\&TS 101 and 102, or S\&TS 101 or 102 and an additional Social Science or Humanities course. (Students who have not taken S\&TS 101 or 102, but have taken a different S\&TS course and an additional Social Science or Humanities course should contact the S\&TS department for guidance about whether those courses can substitute for the prerequisites.)
2. the science and quantitative requirement of the College of Arts and Sciences;
These courses cannot be used to fulfill the core or other course requirements for the major and must be taken for a letter grade. Sophomores in the process of completing these prerequisites may be admitted to the major on a provisional basis. Further information and application materials are available in 306 Rockefeller Hall (255-6047).

## Requirements

S\&TS majors must complete the following requirements:
Note: All courses used to fulfill major requirements must be taken for a letter grade, which must be C- or above.

1. Core: one course in each of the following groups (a-c).
a. Foundation (S\&TS 201)
b. Ethics (choose from S\&TS 205, 206, 360 , or 490 )
c. History (choose from S\&TS 233, 250, 281, 282, 330, 355, 357, 447, 458, 474,475 , or 476 )
2. Theme: Students must elect a theme and take four courses in the theme. Courses taken to satisfy the core course requirements may not be used as part of the required four courses in the theme. At least two of the courses should be at the 300 level or higher, and at least one should be at the 400 level.
Available themes are:
a. Minds and Machines (S\&TS 212, 250, 281, 282, 286, 292, 349, 354, 355, $356,381,387,400,402,409,431$, $453,458,481,496$ )
b. Science, Technology, and Public Policy (S\&TS 281, 282, 324, 331, $352,357,360,390,391,401,407$. $411,412,433,442,444,466,468$. $471,473,483,487,490)$
c. Life in Its Environment (S\&TS 205, 206, 233, 281, 282, 285, 286, 287, $301,311,324,331,333,411,412$, $415,420,422,431,444,447,468$, $471,487,495$, or 496 )
In consultation with an S\&TS faculty advisor, students may also devise their own theme as long as it meets the general criteria of coherence and rigor.
3. Additional Science and Technology Studies Courses: additional courses to total 34 credit hours in the major, chosen from the general list of S\&TS courses.
4. Science Requirement: in addition to the science requirement of the College of Arts and Sciences, Science and Technology Studies majors are required to take an additional two semesters of a natural science or engineering (including computer science). Mathematics sufficient to provide background for the additional science requirement should be completed before undertaking that requirement. Choice of these courses should be made in consultation with the student's major advisor and should be related to the theme selected by the student.

## The Honors Program

The honors program is designed to provide independent research opportunities for academically talented S\&TS majors. Students who enroll in the honors program are expected to do independent study and research, with faculty guidance, on issues in science and technology studies. Students who participate in the program should find the experience intellectually stimulating and rewarding whether or not they intend to pursue a research career. S\&TS majors are considered for entry into the honors program at the end of the second semester of their junior year. To qualify for the S\&TS honors program, students must have an overall Cornell cumulative grade point average (GPA) of at least 3.00 and a $3-30$ cumulative GPA in courses taken for the major. Additionally, the student must have formulated a research topic, and have found a project supervisor and a second faculty member willing to serve as the advisors; at least one of these must be a member of the S\&TS department. More information on the honors program is available from the S\&TS undergraduate office at 306 Rockefeller Hall (255-6047).

## The Blology and Society Major

The Department of Science and Technology Studies also offers the Biology and Society major, which includes faculty from throughout the university. The Biology and Society major is designed for students who wish to combine the study of biology with exposure to perspectives from the social sciences and humanities. In addition to providing a foundation in biology, Biology and Society students obtain background in the social dimensions of modern biology and in the biological dimensions of contemporary social issues.
The Biology and Society major is offered to students enrolled in the College of Arts and Sciences, the College of Human Ecology, and the College of Agricuiture and Life Sciences. The major is coordinated for students in all colleges through the Biology and Society office. Students can get information, specific course requirements, and application
procedures for the major from the office in 306 Rockefeller Hall, 255-6047.

A full description of the Biology and Society major can be found on p. 477 of this catalog.

## The Concentration In Science and Technology Studies

S. H. Hilgartner, chair (304 Rockefeller Hall, 255-9950); K. Vogel (DUS); R. N. Boyd,
P. R. Dear, R. Kline, C. Leuenberger, B. V. Lewenstein, M. Lynch, T. J. Pinch, A. G. Power, R. Prentice, J. V. Reppy, M. W. Rossiter, P. J. Sengers, S. Seth. Emeritus: W. R. Lynn, L. P. Williams. Adjunct faculty: R. W. Miller, H. Shue, Z. Warhaft

The concentration (or minor) in Science and Technology Studies (S\&TS) is designed for students who wish to engage in a systematic, interdisciplinary exploration of the role of science and technology in modern societies. The concentration is intended for students with varied academic interests and career goals. Majors in the natural sciences and engineering have an opportunity to explore the social, political, and ethical implications of their selected fields of specialization, while students majoring in the humanities and social sciences have a chance to study the processes, products, and impacts of science and technology from an S\&TS perspective.
To satisfy the requirements for the S\&TS concentration, students must complete with letter grades of C - or above a minimum of four courses selected from the course offerings listed for the major. At least one course must be chosen from the list of core courses. Two courses must be chosen from one of the themes listed below:

1. Minds and Machines
2. Science, Technology, and Public Policy
3. Life in Its Environment

The concentration is completed with one other course in S\&TS. Interested students may obtain further information about courses and a list of course descriptions by contacting the S\&TS undergraduate office, 306 Rockefeller Hall (255-6047).
Course Offerings
Introductory Course
Core Courses
Foundation Course
Ethics
History

## Theme Courses

Minds and Machines
Science, Technology, and Public Policy
Life in lts Environment
Independent Study
Graduate Seminars

## First-Year Writing Seminars

Consult the John S. Knight Institute web site for times, instructors, and descriptions. Web site: www.arts.cornell.edu/Knight_institute/ index.html.

## Introductory Courses

sats 101(1101) Science and Technology in the Public Arena (SBA-AS)
Fall. 3 credits. S\&TS 101 and 102 may be taken separately or in any order. Recommended as introduction to field; not required and may not be used to fulfill a major requirement. J. Reppy.
Introduction to public policy issues involving developments in science and technology.
Studies such topics as secrecy and national security, the politics of expertise, public understanding of science, computers and privacy, and the management of risk. Applies concepts from the field of science and technology studies to analyze how issues are framed and public policy produced.

## s. TS 102(1102) Nistories of the Future

 (CA-AS)Spring. 3 credits. Recommended as introduction to field; not required and may not be used to fulfill a major requirement.
S\&TS 101 and 102 may be taken separately or in any order. S. Seth.
From Fankenstein to The Matrix, science
fiction and film have depicted contemporary science, technology, and medicine for almost two centuries. This course introduces students to historical and social studies of science and technology using science fiction films and novels, as well as key readings in science and technology studies. What social questions can fictional accounts raise that factual ones can only anticipate? How have "intelligent machines" from Babbage's Analytical Engine to Hal raised questions about what it means to be human? What can Marvel Comics teach us about changes in science and technology? When can robots be women and, in general, what roles did gender play in scientific, technological, and medical stories? How was the discovery that one could look inside the human body received? How do dreams and nightmares of the future emerge from the everyday work of scientific and technological research?

## Core Courses

## Foundation Course

S8TS 201(2011) What Is Selence? An Introduction to the Social Studles of Science and Technology (also SOC 210[2100]) (CA-AS|
Spring. 3 credits; also offered as writingintensive 4 -credit option, by permission only, and limited to 15 students. T. Pinch. Introduces some of the central ideas in the field of Science and Technology Studies (S8TS). As well as serving as an introduction to students who plan to major in Biology and Society or in Science and Technology Studies, the course is aimed at students with backgrounds in either the sciences or the humanities who are challenged to think more critically about what we mean by science, what counts as scientific knowledge and why, and how science and technology intervene in the wider world. The course is a mixture of lecture, discussion, and other activities. The discussion sections are an integral part of the course and attendance is required. In addition, a series of written assignments throughout the semester and a take-home final during exam week compose the majority of the grade.

## Ethles

SeTS 205(2051) Ethical Issues in Health and Medicine (also BaSOC 205[2051]) (KCM-AS)
Fall. 4 credits. Limited to 150 students.
K. Vogel.

For description, see B\&SOC 205
sats 206(2061) Ethics and the Environment (also B\&SOC 206[2061], PHIL 246[2460]) (KCM-AS)
Spring. 4 credits. Limited to 50 students.
S. Pritchard.

For description, see B\&SOC 206
S\&TS 360(3601) Ethical Issues in Engineering (also ENGRG 360[3600])
Spring. 3 credits. Limited to juniors and seniors only. P. Doing.
For description, see ENGRG 360

## History

[S\&TS 233(2331) Agriculture, History, and Soclety: From Squanto to Biotechnology (HA-AS)
Fall. 3 credits. Next offered 2009-2010. M. Rossiter.

For description, see "Life in Its Environment" theme.]

58TS 250(2501) Technolagy in Society (also ENGRG/ECE/HIST 250[2500]) (HA-AS)
Fall. 3 credits. Offered alternate years. R. Kline.

For description, see ENGRG 250.
s8Ts 281(2811) Sclence in Weatern Civilization: Medieval and EarlyModern Europe up to Isaac Newton (also HIST 281[2810]) " (HA-AS)
Fall. 4 credits. P. Dear.
For description, see HIST 281.
s8TS 282(2821) Sclence in Western Clvilization: Newton to Darwin, Darwin to Elnstein (also HIST 2822820]) " (HA-AS)
Spring. 4 credits. S\&TS 281 is not a prerequisite to 282. S. Seth.
For description, see HIST 282.

## [seTs 330(3301) Making Modern

 Science (also HIST 329[3290]) (HAAS)Spring. 4 credits. Next offered 2008-2009. S. Seth.

Examines the history of the physical sciences in Europe and the United States from 1800 to the present. Students study such topics as the development of thermodynamics and electrodynamics, the quantum and relativity theories, science during the world wars, and post-war "big science." As well as a history of ideas, the course emphasizes the broader historical contexts in which physical science has been produced, focusing on issues raised in relation to Romanticism, the first and second industrial revolutions, social statistics, train travel, and the military-industrialscientific complex, among others. Reading for the course ranges from primary source material (original papers by Thomson, Helmholtz, Planck, and Einstein) to extracts from Mary Shelley's Frankenstein and Michael Frayn's Copenbagen.]

## [seTS 357(3571) Engineering in

 American Culture (also ENGRG/HIST 357[3570])Fall. 3 credits. Next offered 2008-2009. R. Kline.

For description, see ENGRG 357.]
S\&TS 447(4471) Seminar in the History of Blology (also BIOEE 467[4670], B\&SOC 447[4471], HIST 415[4150]] (PBS)
Summer and fall. 4 credits. W. Provine and G. Gorman.

For description, see BIOEE 467.
[S8TS 458(4581) Intelligibility In Science (also HIST 458[4580]) (HA-AS)
Spring. 4 credits. Next offered 2009-2010. P. Dear.

For description, see HIST 458.]

## Theme Courses

## Minds and Machines

S\&TS 250(2501) Technology in Society (also ECE/ENGRG/HIST 250[2500]) (HA-AS)
Fall. 3 credits. Offered alternate years.

## R. Kline.

For description, see ENGRG 250.
S\&TS 281(2811) Science in Western Clvillzation: Medieval and EarlyModern Europe up to Isaac Newton (also HIST 281[2810]) " (HA-AS)
Fall. 4 credits. P. Dear.
For description, see HIST 281.
S\&TS 282(2821) Science in Western Clvilization: Newton to Darwin, Darwin to Einstein (also HIST 282[2820]) \# (HA-AS)
Spring. 4 credits. S. Seth.
For description, see HIST 282.

## [S\&TS 292(2921) Inventing an

 Information Society (also ECE/ ENGRG 298[2980], HIST 292[2920]) (HA-AS)Spring. 3 credits. Next offered 2008-2009. R. Kline.

For description, see ENGRG 298.]
[S\&TS 349(3491) Media Technologies (also INFO 349[3491], COMM 349[3490]) (HA-AS)
Spring. 3 credits. Offered odd-numbered years; next offered 2008-2009. T. Gillespie. For description, see COMM 349]
[S\&TS 354(3541) The Sociology of Contemporary Culture (also SOC 352[3520]) (CA-AS)
Fall. 4 credits. Next offered 2008-2009 C. Leuenberger.

Introduces students to the rapidly expanding body of work at the intersection of sociology, cultural studies, and science and technology studies. Provides an introduction to theoretical debates in cultural studies and to sociological studies of culture. Discusses the emergence of the tourist industry, the significance of consumption in modern life, the culture of music and art, the use of rhetoric in social life, cultural and feminist analyses of knowledge and science, and the social construction of self, bodies, and identities.]
S\&TS 355(3551) Computers: From the 17th Century to the Dot.com Boom (also INFO 355[3551], COMM 355[3550]) (HA-AS)
Fall. 4 credits. No technical knowledge of computer use is presumed or required. S\&TS 355 and 356 can be taken separately or in any order. J. Ratcliff.
Computers have not always been ubiquitous boxes gracing our desktops: in Victorian

London, Charles Babbage tried to build an analytical engine using brass gears and steel rods, and during World War II the Allied governments used sophisticated electromechanical and electronic "brains" to break Axis codes. How did computing technology, once useful only to technical specialists, come to colonize industry, academia, the military, and the home? This course explores the history of computing, placing ideas and technologies in social and historical context; for example, it relates Charles Babbage's difference engines to the factory system, IBM to the population census, and feedback systems and Turing machines to the demands of war. Looking at the history of the computer teaches something of how technology, society and knowledge depend on and change one another. It also helps students discover something about the relationship between machines and society today. This is a course in the history of computing; a background in computer science is not required.
[S8TS 356(3561) Computing Cultures [also INFO/VISST 356[3560], COMM 356[3560]) (CA-AS)
Spring. 4 credits. No technical knowledge of computer use presumed or required S\&TS 355 and 356 may be taken separately or in any order. Next offered 2008-2009. R. Prentice.

Computers are powerful tools for working, playing, thinking, and living. Laptops, PDAs, webcams, cell phones, and iPods are not just devices, they also provide narratives, metaphors, and ways of seeing the world. This course critically examines how computing technology and society shape each other and how this plays out in our everyday lives. Identifies how computers, networks, and information technologies reproduce, reinforce, and rework existing cultural trends, norms and values. Looks at the values embodied in the cultures of computing and consider alternative ways to imagine, build, and work with information technologies ]
S8TS 381(3811) Philosophy of Science: Knowledge and Objectivity (also PHIL 381[3810]) (KCM-AS)
Spring. 4 credits. R. Boyd.
For description, see PHIL 381.
[S8TS 387(3871) The Automatic Lifestyle: Consumer Culture and Technology (also INFO 387[3871]) (CA-AS)
Spring. 4 credits. Next offered 2008-2009
P. Sengers.]
[S8TS 40014001) Components and Systems: Engineering In a Social Context (also MaAE 400/401[4000/4010]]
Spring. 3 credits. Offered alternate years. Z. Warhaft.

For description, see M\&AE 400.]
SaTS 402(4021) Bodies in Medicine, Sclence, and Technology (also S HUM 420)
Spring. 4 credits. Limited to 15 students.
R. Prentice.

For description, see S HUM 420
[S\&TS 409/4091) From the Phonograph to Techno (also SOC 409[4090]) (SBA-AS)
Spring. 4 credits. Next offered 2009-2010.
T. Pinch.J

S\&TS 422\{4221) New York Women (also FGSS 422[4220], HIST 445[4450]) (HA-AS)
Fall. 4 credits. M. Rossiter
For description, see S 8 TS 422 Life in Its Environment Theme.

## S\&TS 423(4231) Gender and Technology

Spring. 4 credits. S. Pritchard.
Why are some technologies such as cars and computers associated with men and masculinity? How did sewing machines and vacuums become gendered female? How do technological artifacts and systems constitute, mediate, and reproduce gender relations and gender identities? How do technologies uphold gender hierarchies and thus social inequalities? This course explores the relationship between gender and technology ' in comparative cultural, social, and historical perspective. Specific themes addressed include: work, labor, gender, and technology; the gendered dimensions of industrial technologies; consumption and gender; technologies of (gendered) identity; the intersection of race, class, and gender with technology; and gender, sex, and technology. Most of the course material focuses on western Europe and the United States since the mid-18th century, but the issues raised in this class will prepare students to think about gender and technology in other contexts including our own.

## [S8TS 431(4311) From Surgery to Simulation (SBA-AS)

Spring. 4 credits. Next offered 2008-2009. R. Prentice.

A cliche among medical professionals says, "If you have a hammer, every problem looks like a nail." In other words, treatment decisions often are dictated by available technologies. This course looks at medical technologies from dissection to $x$-rays to anti-depressants and the ways they shape how medical professionals look at and practice upon the human body. Takes a broad view of technology, encompassing systems of practice that shape how work is conducted and the body is understood, as well as specific machines and treatments with specific uses. Considers how these technologies often are not only treatments for individual patients but also metaphors for larger cultural questions.]

## [S\&TS 453(4531) Knowledge and Society

 (also SOC 453[4530]) (CA-AS)Fall. 4 credits. Limited to 15 students. Next offered 2008-2009. C. Leuenberger. Focuses on the historical evolution of the sociology of knowledge as a theoretical paradigm and an empirical research field. Examines the phenomenological origins of the sociology of knowledge and many of its central texts. Studies how it has been applied to such areas as personhood, interaction, religion, identity, and the emotions. Also considers epistemological questions that arise, and cover various theoretical and empirical approaches that have been influenced by the sociology of knowledge such as ethnomethodology, conversation analysis, and the sociology of science and technology.]

## [S8TS 468(4681) Understanding

 Innovation (HA-AS)Fall. 4 credits. Next offered 2008-2009. J. Reppy

For description, see S\&TS 468 Science, Technology and Public Policy.]
[S\&TS 481(4811) Philosophy of Science (also PHIL 481[4810], S\&TS 681(6811]) (KCM-AS)
Spring. 4 credits. Next offered 2008-2009. R. Boyd.

For description, see PHIL 481.]

## Science, Technology, and Public Policy

S\&TS 281(2811) Science in Western Civillzation (also HIST 281[2810]) \# (HA-AS)
Fall. 3 credits. P. Dear
For description, see HIST 281.

## S\&TS 282(2821) Science in Western Civillzation (also HIST 282[2820]) * (HA-AS)

Spring. 4 credits. S. Seth.
For description, see HIST 282.
S\&TS 324(3241), Environment and Sociaty (also D SOC 324[3240]) (SBA-AS)
Fall and spring. 3 credits. Fall, C. Geisler; spring, G. Gillespie.
For description, see D SOC 324.

## S8TS 331(3311) Environmental

 Governance (also B\&SOC 331[3311], NTRES 331[3310]) (CA-AS)Spring. 3 credits. S. Wolf.
For description, see NTRES 331.

## S8TS 343(3431) Biotechnology and the

 Economy (also B8SOC 343[3431])Fall. 4 credits. J. Reppy.
In the 30 years since Genetech was founded to exploit recombinant DNA technologies, the biotechnology industry has grown to be a multi-billion dollar industry, employing perhaps 800,000 workers (not to mention the trillions of microbial "workers" in some industrial applications). This course will survey the industry, with particular attention to biomedical applications. Topics will include the historical emergence of biotechnology as a separate industry in government statistics and popular discourse, the role of venture capital and small firms in industry growth, links to universities, intellectual property rights, and regulatory issues. The focus will be on the $U$. S. industry in the context of globalized economy. Readings include case studies, government reports, and background readings in innovation studies and emerging technologies.
S\&TS 352(3521) Science Writing for the Mass Media (also COMM 352[3520]) Fall and summer. 3 credits. L. Levitan and staff. Students who take SETS 352 may not receive credit for COMM 260 or 263.
For description, see COMM 352.
[S\&TS 357(3571) Engineering in American Culture (also ENGRG 357[3570], AM ST 356[3570], HIST 357[3570])
Fall. 4 credits. Offered alternate years; next offered 2008-2009. R. Kline.
For description, see ENGRG 357.]
S\&TS 360(3601) Ethical Issues in Engineering (also ENGRG 360[3600])
Spring. 3 credits. P. Doing.
For description, see ENGRG 360.

## [S\&TS 391(3911) Science in the

 American Polity, 1960 to Now (also GOVT 309[3091], AM ST 389[3911]) (SBA-AS)Spring. 4 credits. Next offered 2008-2009. S. Hilgartner.

Reviews the changing political relations between science, technology, and the state in America from 1960 to the present. It focuses on the politics of choices involving science and technology in a variety of institutional settings, from Congress to courts and regulatory agencies. The tensions and contradictions between the concepts of science as an autonomous republic and as just another special interest provide a central theme for the course. Topics addressed include research funding, technological controversies, scientific advice, citizen participation in science policy, and the use of experts in courts.]

## [S\&TS 401(4011) Genomics and Society

 (also NS 401[4010])Fall. 3-4 єredits. Taught in Washington, D.C. D. Pelletier.

For description, see NS 401.]

## S\&TS 407(4071) Law, Science, and Public Values (also BesOC 407(4071]) (SBA-AS)

Spring. 4 credits. M. Lynch
Examines problems that arise at the interface of law and science. These problems include the regulation of novel technology, the role of technical expertise in public decision-making, and the control over scientific research. The first part of the course covers basic perspectives in science and technology studies (S\&TS) and how they relate to legal decisions and processes. The second part covers a series of examples and legal cases on the role of expert judgments in legal and legislative settings, intellectual property considerations in science and medicine, and legal and political oversight of scientific research. The final part examines social processes and practices in legal institutions, and relates these to specific cases of scientific and technological controversy. Lectures and assignments are designed to acquaint students with relevant ideas about the relationship between legal, political, and scientific instifutions, and to encourage independent thought and research about specific problems covered in the course.

## [S\&TS 411(4111) Knowledge,

Technology, and Property (SBA-AS)
Spring. 4 credits. Prerequisite: one course
in science and technology studies. Next
offered 2008-2009. S. Hilgartner.
Should the human genome be treated as private property or a public resource? How should copyright be managed in the digital environment of the Internet? Is music "sampling" high-tech theft or artistic expression? Does bioprospecting represent an enlightened strategy for preserving biodiversity or a post-colonial means for transferring resources from the developing world to the North? Debate about the nature and scope of intellectual property is an increasingly salient feature of contemporary politics. This course examines the ownership of knowledge and technology, exploring fundamental tensions that intellectual property systems express and incompletely reconcile. Perspectives from science and technology studies, sociology, law, and economics inform the course. Case studies explore the construction of property in contexts ranging from the early history of copyright to the ownership of life forms, airwaves, algorithms, artistic content, electronic databases, and the personal identities of celebrities.]
[S8TS 412(4101) Science, Technology, and Culture (also COM L $410[4100]$ ) (CA-AS)
Fall. 4 credits. Next offered 2008-2009 A. Banerjee

For description, see COM I. 410.]

## ss TS 429(4291) Politics of Science (also GOVT 429[4293])

Fall. 4 credits. R. Herring.
For description, see GOVT 429.

## S8TS 433(4331) International History of

 Science \# (HA-AS)Spring. 4 credits. M. Rossiter.
Survey of the major scientific events and institutions in several foreign nations, including developing countries. Covers the period 1660 to the present and gives some attention to who in each country becomes a scientist, who rises to the top, and who emigrates. Weekly readings and a research paper.

## S\&TS 434(4341) Science and Empire: The Case of Britain and India

Spring. 4 credits. J. Ratcliff.
What is the historical relationship between global politics and science? This is a subject of volatile debate; it raises difficult questions about the perceived superiority of Western systems of knowledge, and it invites the more fundamental question of what is meant by Western science. Within science studies these are long-standing issues, but their scope has recently begun to change as new resources and perspectives from postcolonial regions are brought to the table. This course will examine the current literature on one specific case: the role of science, technology and medicine in the historical development of relations between Britain and India. We will take the long view, covering the medieval era to the present.
S\&TS 444(4441) Historical Issues of Gender and Science (also FGSS 444[4440]) (CA-AS)
Spring. 4 credits. Not open to freshmen. M. Rossiter.

For description, see "Life in Its Environment" theme.
S\&TS 466(4661) Public Communication of Science and Technology (also COMM 466[4660])
Spring. 3 credits. Limited to 15 students.
Offered even-numbered years.
B. Lewenstein.

For description, see COMM 466.

## [SETS 468(4681) Understanding Innovation (HA-AS)

Fall. 4 credits. Next offered 2008-2009.
J. Reppy.

Ideas about innovation occupy a central place in any description of our era, whether the topic is economic growth, military power, or globalization. The course will explore different ways of understanding the innovation process, the institutions and practices that are meant to foster innovation, and the issues that governments face when they seek to regulate innovations. We will read across a range of literature in economics, history, and science and technology studies.]
[S\&TS 471(4711) The Dark Side of Biology: Blological Weapons, Bioterrorism, and Biocriminality (aiso B\&SOC 471[4711]) (SBA-AS)
Fall. 4 credits. Next offered 2008-2009. K. Vogel.

For description, see B\&SOC 471.]
[S\&TS 483(4831) The Military and New Technology (also GOVT 483[4837]) (SBA-AS)
Spring. 4 credits. Next offered 2008-2009. K. Vogel.

For description, see GOVT 483.]

## Life In Its Environment

S\&TS 205(2051) Ethical Issues in Health and Medicine (also BeSOC 205[2051]) (KCM-AS)
Fall. 4 credits. K. Vogel
For description, see B\&SOC 205.

## S\&TS 206(2061) Ethics and the

 Environment (also B\&SOC 206[2061], PHIL 246[2460]l (KCM-AS)Spring. 4 credits. S. Pritchard.

## For description, see B\&SOC 206.

[S8TS 233(2331) Agriculture, History, and Society: From Squanto to Biotechnology (HA-AS)
Fall. 3 credits. Next offered 2009-2010. M. Rossiter.

Surveys the major themes in the development of agriculture and agribusiness in the United States in the 19th and 20th centuries. These include particular individuals (e.g., Liberty Hyde Bailey, Luther Burbank, G. W. Carver, Henry A. Wallace, and Norman Borlaug), the rise of government support and institutions (including U.S.D.A. and Comell), noteworhy events (the clust bowl, World War II, and the environmental movement), and the achievements of the Green and "Gene" Revolutions.]

## S\&TS 281(2811) Science in Western

 Civilization: Newton to Darwin, Darwin to Einstein (also HIST 281[2810]) " (HA-AS)Fall. 3 credits. P. Dear.
For description, see HIST 281.
S\&TS 282(2821) Science in Western Civilization: Medieval and EarlyModern Europe up to Isaac Newton (also HIST 282[2820]) " (HA-AS)
Spring. 4 credits. S. Seth.
For description, see HIST 282.

## S8TS 285(2851) Communication in the

 Life Sciences (also COMM 285[2850])Spring. 3 credits. B. Lewenstein.
For description, see COMM 285.
[S8TS 286(2861) Science and Human Nature (also PHIL 286[2861]) (KCM-AS)
Spring. 4 credits. Next offered 2008-2009. R. Boyd.

For description, see PHIL 286.]
S\&TS 287(2871) Evolution (also BIOEE 207[2070], HIST 287[2870]) (PBS)
Fall. 3 credits. W. Provine.
For description, see BIOEE 207.

## S\&TS 301(3011) Life Sciences and Society (also B\&SOC 301[3011]) (SBA-AS)

Spring. 4 credits. J. Crane.
For description, see B\&SOC 301.
S\&TS 311(3110) Sociology of Medicine (also SOC $313[3130]$ ) (SBA.AS)
Fall. 4 credits. Not open to freshmen.
C. Leuenberger.

This course provides an introduction to the ways in which medical practice, the medical profession, and medical technology are embedded in society and culture. We will ask how medicine is connected to various sociocultural factors such as gender, social
class, race, and administrative cultures. We will examine the rise of medical sociology as a discipline, the professionalization of medicine, and processes of medicalization and demedicalization. We will look at alternative medical practices and how they differ from and converge with the dominant medical paradigm. We will focus on the rise of medical technology in clinical practice with a special emphases on reproductive technologies. We will focus on the body as a site for medical knowledge, including the medicalization of sex differences, the effect of culture on nutrition and eating disorders such as obesity and anorexia nervosa. We will also read various classic and contemporary texts that speak to the illness experience and the culture of surgeons, hospitals, and patients and we will discuss various case studies in the social construction of physical and mental illness.

S8TS 324(3241) Environment and Society (also D SOC/SOC 324[3240]) (SBA-AS)
Fall and spring. 3 credits. Fall, C. Geisler; spring, G. Gillespie.
For description, see D SOC 324
S\&TS 331(3311) Environmental Governance (also B\&SOC 331[3311], NTRES 331[3310]) (CA-AS)
Spring. 3 credits. S. Wolf.
For description, see NTRES 331.
[S\&TS 409(4091) From the Phonograph to Techno (also SOC 409[4090]) (SBA-AS)
Spring. 4 credits. Next offered 2008-2009. T. Pinch.

In this seminar, we treat music and sound and the ways they are produced and consumed as sociocultural phenomena. We specifically investigate the way that music and sounds are related to technology and how such technologies and sounds have been shaped by and have shaped the wider society and culture of which they are a part. We look at the history of sound technologies like the phonograph, the electronic music synthesizer, samplers, and the Sony walkman. Our perspective is drawn from social and cultural studies of science and technology. Students are encouraged to carry out a small original research project on their own favorite sound technology.]

## [S\&TS 411(4111) Knowledge,

Technology, and Property (SBA-AS)
Spring. 4 credits. Prerequisite: one course in science and technology studies. Next offered 2008-2009. S. Hilgartner.
For description, see S\&TS 411, "Science,
Technology, and Public Policy" theme.]
[S\&TS 412(4101) Science, Technology, and Culture (also COM L 410[4100]) (CA-AS)
Fall. 4 credits. Next offered 2008-2009.
A. Banerjee.

For description, see COM L 410.]

## S\&TS 415(4151) Environmental

 Interventions (also S HUM 415)Fall. 4 credits. Limited to 15 students.
P. Sengers

For description, see S HUM 415
S\&TS 417(4171) Science, Religion, and the Humanities since Darwin (also S HUM 450)
Spring. 4 credits. G. Ortolano.
This seminar considers a series of episodes in which the dichotomy between science and religion has been contested and defended.

Topics will include dehates about Darwinian evolution, Victorian education, animal experimentation, Christian fundamentalism literary Modernism, "two cultures" quarrelling. and sociobiology. The approach here will be contextual and historical, with a primary goal in each case being to identify and discuss the rhetorical strategies that have been available to advocates and critics of scientific authority The focus will primarily fall on debates and developments within Britain, with some consideration of the American context, but the issues and problems considered are likely to interest to students of scientific authority, cultural politics, and the public culture more generally.

## SkTS 422(4221) New York Women (also HIST 445[4450], FGSS 422[4220]] (HA-AS)

Fall. 4 credits. Limited to 15 students M. Rossiter.

Over the centuries New York State has been the site of activity for a great many women of consequence. This course is a one-semester survey of the past and present activities and contributions of rural and urban women in a variety of fields of interest to Cornell students politics, medicine, science, the law, education, business (including hotels), entertainment, communications, government labor, religion, athletics, the arts and other areas. Weekly readings and discussion and a paper, possibly using local or university archives.

## S\&TS 424(4241) Medicine, Science, and the Body in Postcolonial Africa

Spring. 4 credits. J. Crane
Growing attention to the global AIDS epidemic and the rise of "global health sciences" programs in the West have recently made health and medicine in Africa a topic of growing interest in international health. At the same time, inequalities in access to resources and education mean that African researchers often remain at the periphery of scientific knowledge production in global health. This course examines current issues surrounding biomedical practice and research in Africa, paying particular attention to colonial histories, postcolonial power relations, and the role of African clinicians and scientists in shaping health care and medical knowledge

## [S\&TS 431/4311) From Surgery to Simulation (SBA-AS)

Spring. 4 credits. Next offered 2008-2009 R. Prentice

For description, see "Minds and Machines."]

## S\&TS 444(4441) Historical Issues of Gender and Science (also FGSS 444[4440]) (CA-AS)

Spring. 4 credits. Not open to freshmen. M. Rossiter.

A one-semester survey of women's role in science and engineering from anticuity to the 1980s, with special emphasis on the United States in the 20th century. Readings include biographies and autobiographies of prominent women scientists, educational writings and other primary sources, and recent historical and sociological studies. By the end of the semester, students attain a broad view of the problems that have faced women entering science and those that still remain.

S\&TS 447(4471) Seminar in the History of Biology (also B\&SOC 447[4471], HIST $415[4150]$, BIOEE 467[4670]) (PBS)
Summer and fall. 4 credits. Limited to 18 students. S-U or letter gracles. W. Provine and G. Gorman
For description, see BIOEE 467.
[S\&TS 471(4711) The Dark Side of Biology: Biological Weapons, Bioterrorism, and Biocriminality (also BeSOC 471[4711]) (SBA-AS]
Fall. 4 credits. Next offered 2008-2009.
K. Vogel.

For description, see I3\&:SOC 471]

## S8TS 495(4951) Social Studies of the

 Human Sciences (CA-AS)Fall. 4 credits. C. leuenberger Explores how the human and social sciences have provided the knowledge and categories we use to make sense of people and their behavior. Looking across a range of disciplines-including sociology, psychology, psychiatry, and economics-the course examines how human beings have become objects of scientific investigation. Discusses the rise of the human sciences and their role in politics, culture, and society.
S\&TS 496(4961) Medicine and Healing in China (also HIST 496[4960], B\&SOC 496[4961], ASIAN 469[4469]) \# ( (HA-AS)
Spring. 4 credit. T. Ilintichs.
For description, see HIST 496.

## Independent Study

## S\&TS 399(3991) Undergraduate

 Independent StudyFall, spring. 1-4 credits. No more than 8 hours total of indepenclent study (not including honors) can count toward S\&TS major. Prerequisite: permission of instructor.
More information and applications availalble in 306 Rockefeller Hall.

## S\&TS 499|4991/4992) Honors Project

Fall and spring (yearlong)*. Prerequisite: senior S\&TS students by permission of department; overall Cornell cumulative GPA of 3.00 and 3.30 cumblative GPA in courses taken for major. Apply in 306 Rockefeller Hall.
Students admitted to the honors program are required to complete two semesters of honors project research and to write an honors thesis. The project must include substantial research. and the completed work slould be of wider scope and greater originality than is normal for an upper-level course. The student must find a project supervisor and a second faculty member willing to serve as faculty reader; at least one of these must be a member of the S\&TS department.
*Stuctents must register for total credits desired for the whole project each semester (e.g., 8 credits for the fall semester and 8 credits for the spring semester). After the fall semester, students will receive a letter grade of "R" for the first scmester with a letter grade for both semesters submitted at the end of the second semester whether or not they complete a thesis, and whether or not they are recommended for honors. Minimally, an honors thesis outline and bibliography should be completed during the first semester. In consultation with the advisors, the director of undergraduate studies will evaluate whether
the student should continue working on an honors project. Students should note that these courses are to be taken in addition to those courses that meet the regular major requirements. If students do not complete the second semester of the honors project, they must change the first semester to independent study to clear the " R " and receive a grade. Otherwise, the " R " will remain on their record and prevent them from graduating.

## Graduate Seminars

[S\&TS 626(6261) Seminar in the History of Technology (also HIST 619[6190])
Spring. 4 credits. Next offered 2008-2009.
R. Kline.

Exploration of the history of technology in Europe and the United States from the 18th century to the present. Typical topics include the industrial revolution in Britain, the emergence of engineering as a profession, military support of technological change, labor and technology, the "incorporation" of science and engineering, technological utopias, cultural myths of engineers ahd inventors, social aspects of urbanization in the city and on the farm, post-war consumerism, and gender and technology. The interests of students and recent literature in the field are considered in selecting the topics for the seminar.]

## [S\&TS 627(6271) Making People Through

 Expert KnowledgeSpring. 4 credits. Next offered 2009-2010. C. Leuenberger

This seminar explores how the human and social sciences have provided the knowledge and categories we use to make sense of human beings and their behavior. Looking across a range of disciplines-including sociology, psychiatry, psychology, psychoanalysis, anthropology, and economics-we will look at how human beings have become objects of scientific investigation. We will focus on how culture politics, and the professional environment impact the human sciences and how the use of rhetoric constitutes academic discourse. We will also focus on the social scientific construction of selves, sex, gender, and race.]

## [S\&TS 628(6281) Self and Society

Fall. 4 credits. Next offered 2008-2009
C. Leuenberger

How has the self became a political, scientific, and cultural project caught up in the ideological battles of modern times? What roles do cultural institutions. politics and science play in making human beings visible, understandable, and treatable? Students in this course will read and discuss texts at the intersection of sociology, cultural studies, history of the human and behavioral sciences, and science and technology studies that treat the self as a social construction. The course focuses on how culture, politics, science, as well as bureaucratic and economic imperatives help shape modern and postmodern conceptions of the self.]

## [S\&TS 630(6301) Social Theory for Science Studies

Fall. 4 credits. Next offered 2009-2010. R. Prentice.

Sociologist C. Wright Mills challenged his readers to develop their "sociological imaginations" to understand the social and historical forces at work in seemingly individual events, such as the receipt of a pink slip, a draft card, or a drug prescription. Within
science and technology studies, scholars have documented how social issues can become scientific, technological, or medical, often appearing to leave the social realm altogether to become biological, technical, or pathological. The best social constructivist work in Science and Technology Studies reveals how scientific, technological, and medical worlds are thoroughly social; that is, theories of social structure and action underpin the best empirical work in the field. This course introduces graduate students to classic texts and concepts in social theory with a focus on applying such theories to empirical research in science, technology, and medicine. It will consider major thinkers and schools of social thought, such as Marx, Weber, Durkheim, Mannheim, Foucault, and the Frankfurt School. It will also consider how a nuanced interplay of theory and empirical data can bring critically important insights to both theoretical and empirical understandings of the world.]

## S\&TS 631(6311) Qualitative Research Methods for Studying Science (also SOC 631[6310])

Spring. 4 credits. P Doing.
Much has been learned about the nature of science by sociologists and anthropologists donning lab coats and studying scientists in action. This course looks at the methods used in this new wave of science studies. Examines what can be learned by interviewing scientists from videos, and from detailed examinations of scientific texts. Students gain hands-on experience by conducting a mini-project in which they investigate some aspect of scientific culture.

## S\&TS 632(6321) Inside Technology: The Social Construction of Technology (also SOC 632[6320])

Spring. 4 credits. T. Pinch.
Rather than analyze the social impact of technology upon society, this course investigates how society gets inside technology. In other words, is it possible that the very design of technologies embody assumptions about the nature of society? And, if so, are alternative technologies, which embody different assumptions about society, possible? Do engineers have implicit theories about society? Is technology gendered? How can we understand the interaction of society and technology? Throughout the course the arguments are illustrated by detailed examinations of particular technologies, such as the ballistic missile, the bicycle, the electric car, and the refrigerator.

## [S\&TS 634(6341) Information Technology

 in Sociocultural ContextFall. 4 credits. Next offered 2009-2010. P. Sengers.

Analyzes information technology using historical, qualitative, and critical approaches. Discusses questions such as: In what ways is information technology-often portrayed as radically new-actually deeply historical? How do information technologies represent and intervene in debates and struggles among people, communities, and institutions? How is the design of information technology tools entangled in the realms of law, politics, and commerce? In what ways are the social consequences of information technologies produced as much by the claims we make about the technologies as about the raw functionality of the tools themselves? This course investigates these issues through the lenses of long-standing debates and current controversies.]
[S\&TS 640(6401) Science, Technology, Gender: Historical Issues (also FGSS 640[6400], HIST 641[6410])
Spring. 4 credits. Next offered 2008-2009. S. Seth.

Explores five, often interrelated, aspects of the literature on gender, science, and rechnology: (1) The historical participation of women (and men) in scientific work, (2) the embodiment of scientific, medical and technical knowledge, (3) the scientific construction of sexuality, (4) the gendering of technological systems and artifacts, and (5) feminist critiques of scientific knowledge. Examines the origins of modern western science in the scientific revolution, considering the claim that "science," by its very nature, is an andocentric enterprise. The rise of scientific and medical disciplines and professions in the 19th century provides a focus for discussions of the systematic exclusion of women from the production of scientific knowledge at precisely the point that women's bodies become the object of intensive scientific study. Drawing on a range of material, the course considers the construction of homosexual and intersexual individuals in scientific discourse. In later weeks, it discusses so-called "postmodernist" critiques of science, and debates the possibilities for "feminist science."]

## [S\&TS 645(6451) The New Life Sciences: Emerging Technologies, Emerging Politics (also GOVT 634[6349])

Fall. 4 credits. Next offered 2009-2010. S. Hilgartner.

The new life sciences (including genetics, genomics, and biotechnology) are highly controversial areas of emerging science and technology. They inspire both hope and anxiety, and are a source of ongoing conflicts. This course will examine the politics of the new biology, both to consider the issues in their own right and to examine the relationships among science, rechnology, and politics. In particular, the course will focus on three themes-the politics of property, the politics of identity, and the politics of risk-as they pertain to the emerging technologies of life. Topics may include the social shaping biological research; eugenics and genetics; genomic medicine; risk; commercial biotechnology; university-industry relationships; social movements; North-South issues; the Human Genome Project; genetics and race; intellectual property; the debate over human cloning; and the capacity of contemporary societies to manage emerging technologies.]
S\&TS 680(6801) Mistorical Approaches
to Science (also HIST 680[6800]) to Science (also HIST 680[6800])
Fall. 4 credits. Prerequisite: graduate standing. P. Dear.
Examines philosophical, sociological, and methodological dimensions of recent
historiography of science. For description, see HIST 680.

## [S\&TS 681(6811) Philosophy of Science

 (also PHIL 481[4810], S\&TS 481[4811])Fall. 4 credits. Next offered 2008-2009. R. Boyd.

For description, see PHIL 681 .J

## [S\&TS 693(6931) Economics Meets

 Science StudiesFall. 4 credits. Next offered 2008-2009.
J. Reppy

Covers a variety of possible interactions between the disciplines of economics and
science and technology studies. Some economists are interested in science and technology as important components in economic growth, while scholars in science studies often appeal to economic motives and institutions to explain behavior in the production of scientific and technological knowledge. This course explores ways in which economics can provide new questions and theoretical approaches for science and technology studies. From another perspective, economics, as the most "scientific" of the social sciences, is itself a subject for study. Internal critiques by economists are compared to external analyses in the science studies literature. Readings include works on the epistemology and use of rhetoric in economics and on the "new economics of science," and examples of the use of economic analysis in the science studies literature.]

## S\&TS 700|7001) Special Topic 1: Science

 Studies and the Politics of ScienceFall. 4 credits. Prerequisites: S\&TS 711 or
permission of instructor. M. Rossiter. Theoretical developments in science and technology studies have called attention to the contingent and socially embedded character of both knowledge claims and technological systems. Drawing on literature from several disciplines, this seminar explores the consequences of these findings for social and political studies of science. Issues and problems considered include trust and skepticism, political and legal agency, reflexive institutions, relativism and social action, science and norms, and the co-production of knowledge and social order.

## [58:TS 700(7002) Special Topic 2:

 Technology Transfer IssuesFall. 4 credits. Next offered 2009-2010 J. Reppy.

The goal of this course is to develop a coherent analytical framework for analyzing technology transfer, using insights from economics, sociology, history, and science and technology studies, and to employ that framework to evaluate current policy issues. Studies the process of technology transfer in different contexts, ranging from intra-firm and intra-industry to technology transfer between civil and military sectors, and between industrialized and less-industrialized countries. The readings include a mix of theorerical writings and case studies.]

## [S8TS 700(7003) Special Toplc 3: Issues in the Social and Cultural History of

 TechnologySpring. 4 credits. Next offered 2009-2010. R. Kline.

This seminar focuses on different issues in the social and cultural history of technology each semester. Typical issues include Gender and Technology, Rethinking Technological Determinism, Was there an Information Revolution?, Consumerism, and the Military and Technology in the United States. Students read and discuss exemplary books and articles on a topic for the first half of the course, then give presentations on their research papers.]
S\&TS 711(7111) Introduction to Science and Technology Studies (also HIST 711[7110])
Fall. 4 credits. M. Lynch and S. Pritchard. Provides students with a foundation in the field of science and technology studies. Using classic works as well as contemporary exemplars, seminar participants chart the
terrain of this new field. Topics for discussion include, but are not limited to: historiography of science and technology and their relation to social studies of science and technology; laboratory studies; intellectual property; science and the state; the role of instruments; fieldwork; politics and technical knowledge; philosophy of science; sociological studies of science and technology; and popularization.
[S\&TS 720(7201) Emerging Technologies Spring. 4 credits. Prerequisite: graduate students in social sciences, sciences, and humanities. Next offered 2008-2009. S. Hilgartner and $B$. Lewenstein. Examines the peculiar speculative world of emerging technologies-a social and technical "space" found at the edges of expanding technological systems, where new technologies are being most actively constructed and transformed. In this dynamic world, emerging technologies exist in a state of flux as a mixture of blueprint and hardware, plan and practice, the nearly online and the almost obsolete, surrounded by speculation and speculators, who make oftencontested claims about their promises, perils, and possibilities. Among the characteristics of this space are: the frequent appearance of unverifiable claims about technologies that have yet to materialize; an entrepreneurial drive for commercial implementation; ongoing institutional innovation; frequent public controversies; and problems of political legitimacy. The course examines the epistemic, discursive, institutional, and political dimensions of emerging technologies in an effort to understand the social worlds that shape technological change.]

## [s\& TS 721(7211) Archlving <br> Contemporary Sclence

Spring. 4 credits. Next offered 2009-2010. B. Lewenstein.

Methodology course exploring the conceptual and practical issues associated with creating archives of science "as it happens." Readings focus on issues in historiography of contemporary science and on issues in contemporary archiving. Practical examples are drawn from several Cornell-based archives (on cold fusion, on the role of science in the $\mathrm{O} . \mathrm{J}$. Simpson trial, on the "Y 2 K bug," and on voting technologies in the 2000 presidential election).]

## Independent Study

## seTS 699(6991) Graduate Independent

 StudyFall or spring. 2-4 credits. Permission of department required.
Applications and information are available in 306 Rockefeller Hall.

SCIENCE OF EARTH SYSTEMS
See "Department of Earth and Atmospheric Sciences."

## SERBO-CROATIAN

See "Department of Russian."

## SOCIETY FOR THE HUMANITIES

Brett de Bary, Director

## Fellows for 2007-2008

Max Cavitch (University of Pennsylvania) Safaa Fathy

Mariá Antonia Garcés (Cornell University) Wendy Jones (Cornell University)

Charles Kronengold (Wayne State University)
Dominick LaCapra (Cornell University)
Jeffrey Mantz (George Mason University)
Barry Maxwell (Cornell University)
Chris Nealon (University of California, Berkeley)
Simone Pinet (Cornell University)
Rachel Prentice (Comell University)
Denise Riley (University of East Anglia) Phoebe Sengers (Cornell University)
C. J. Wan-ling Wee (Nanyang Technological University)

Meg Wesling (University of California, San Diego)
The Society annually awards fellowships for research in the humanities. The fellows offer, in line with their research, informal seminars intended to be exploratory or interdisciplinary. These seminars are open to graduate students, suitably qualified undergraduates, and interested auditors. The theme for 2007-2008 is "Improvisation."

## S HUM 404 The Task of the Cleric (also

 SPAN 404, COM L 406.01)Fall. 4 credits. Limited to 15 students.
S. Pinet.

This seminar will explore three main topicstranslation, cartography, and
economy-through two 13th-century Spanish works of mester de clerecia, the Libro de Alexandre, and the Libro de Apolonio. While all of these are decidedly Spanish (Castilian) works, their obvious links to a general
Western European romance and epic tradition offer ample opportunity to reflect on questions of sources, authority, originality, as well as the close analysis of the practices that reveal developments-especially in the visual arts, politics, and economy-contemporary to their composition. Readings will include a variety of theoretical materials on translation, space/place, cartography, and political economy by authors such as Michel de Certeau, Marcel Mauss, Paul Zumthor, George Steiner, Walter Benjamin, and Fredric Jameson among others

## S HUM 408 Improvisational Economies

## (also ANTHR 407)

Fall. 4 credits. Limited to 15 students
J. Mantz

This course will examine how labor has been transformed by the digital age and the extent to which the concept requires
reconceptualization. In particular, this course is concerned with the ways in which global economies disorganize labor, and the methods that laborers use to humanize the labor process and infuse work with meaning.

S HUM 415 Environmental Interventions (also S8TS 415, INFO 415, VISST 415)

Fall. 4 credits. Limited to 15 students. P. Sengers

This course explores the environment as a scene and technology design as a tool for improvisational political action. We will trace the work of artists, designers, and programmers who are expanding the role of information technology (II) from a modernist tool for representing and controlling the environment to an open-ended medium for situated consciousness-raising, networking, and reflecting about the environment. We will analyze the cultural and political issues involved with the environment and their potential for IT-based interventions using a variety of on-the-ground strategies. The course will include a collaborative group project leveraging students from different disciplinary backgrounds to develop an environmental intervention of their own. No experience with computers or other technologies is required.

## S HUM 416 Poetry and Totality (also

 COM L 406.02, ENGL 407.01)Fall. 4 credits. Limited to 15 students. C. Nealon.

For centuries, the humanities have offered "poetry" as the metaphor for what distinguishes them from the sciences. In this metaphor, "poetry" is meant to indicate an illuminating totality of experience, a kind of knowledge that gives you a holistic understanding of the world. But from the time of the Cold War, "totality" has come to be seen as a figure for totalitarianism, or for the shutting-down of open-ended, ongoing experience. Both ideas about totality are deeply ingrained in contemporary poetry, though they are contradictory. How do contemporary poets navigate this contradiction? To answer this question, we will read a variety of recent and contemporary poetry, as well as theories of totality, including Agamben, Arrighi, Debord, Hardt and Negri, Jameson, Postone, Shutt, and Zizek

## S HUM 418 On the Inner Volce (also

 COM L 406.03, ENGL 407.03, FREN 418, COOST 418)Fall. 4 credits. Limited to 15 students. D. Riley.

Is the "inner voice"spontaneous, imposed, or a dictated improvisation? We shall be reflecting on this topic (in its poetic, but more often in its extra-literary incarnations) via readings in phenomenology, the history of aphasiology and the history of consciousness, recent developments in neurology, and in philosophies of language and of the self. The emphasis will range from theories of the inner voice's location, to its vulnerability or durability. Detailed readings will be suggested on a weekly basis, as the course evolves

## S HUM 419 Imagining Contemporary Asla

 (also ENGL 407.02, ASIAN 423)Fall. 4 credits. Limited to 15 students W. Wee.

This seminar will examine the emerging cultural imagining of an Asian Modern in the realms of cultural identity and production. Theoretical and historicized readings will range widely and include Arjun Appadurai, Chen Kuan-Hsing, Sun Ge, Wang Hui, Koichi Iwabuchi, and Fredric Jameson. The seminar will also look at various "high" and "mass cultural" productions from East Asia that have arisen since the 1990s.

HUM 420 Bodios In Medicine and Culture (also S8TS 402, FOSS 425, BESOC 402)
Spring. 4 credits, Limited to 15 students. R. Prentice

Every day we are barraged with cultural messages telling us to eat better, get more exercise, stop smoking, practice safe sex. These messages make us insecure about our bodies: Am I thin enough, ripped enough, sexy enough? They are also contradictory: Fish makes you smarter; mercury in fish makes you sick. Many of these messages use the language of science and medicine: There are obesity "epidemics" and chocolate "addictions." Our bodies are described and treated like machines: transplant surgeons talk about our "spare parts"; computer programmers describe their brains as "wetware." Our sense of our bodies may feel improvised, created on the fly from a collage of scientific, medical, cultural, and advertising snapshots. This course draws from literature in science and technology studies, anthropology, and feminist and gender studies to examine how bodies emerge from the shifting lessons of science, technology, and medicine, as well as how cultural and political concerns express themselves in and through bodies.
S MUM 421 Cutting and Film Cuting (also COM L 411.03, FGSS 428)
Spring. 4 credits. Limited to 15 students. S. Fathy.

This course will consist of comparative analysis of films on female and male genital cutting. The deconstruction of the cinematographic discourse will be dealt with on both thematic and technical levels. Theoretical references will include Derrida's Circonfession along with works by Freud, Jean-Luc Nancy, etc.
S HUM 423 Futures of American Poetry (also AM ST 402, ENGL 408.01)
Spring. 4 credits. Limited to 15 students. M. Cavitch.

A broad-based introduction to American poetry, from the beginnings of English settlement to the early 20 th century. We'll eschew historical determinism and concentrate instead on the uncertain and dynamic futures that American poetry anticipates and helps bring into being. In other words, we'll be reading forward rather than backward, paying special attention to how all sorts of futuresimprovisatory scenarios of desire, audience, vision, prophecy, exhortation, novelty, anxiety, mortality, transmission, and transcendenceget figured in and for American poetry by a wide range of authors.
S HUM 424 The Mediterranean and Cervantes (also SPAN 434, NES 449, HIST 429, COM L 411.01)
Spring. 4 credits. Limited to 15 students. M. Garcés.

This course concentrates on the twin themes of cultural exchanges and cultural frontiers in the early modern Mediterranean, where the writer Miguel de Cervantes played an important role. We will explore contacts between Muslims and Christians in literary texts emerging from Granada, Algiers, Sicily, Cyprus, and Istanbul in the 16th and 17th centuries. Particular attention will be paid to the improvisation of identities promoted by the "renegades" - Christians who converted to Islam and fled to Ottoman territories. Course readings will include chronicles on the Guerra de Granada (1568-1570); English and Spanish reports of captivity; plays and novels by

Calderón, Cervantes, Marlowe, and
Shakespeare, as well as accounts of life in Algiers and Istanbul by Antonio de Sosa and Busbecq. Reading knowledge of Spanish is highly recommended.

## S HUM 425 Cerebral Seductions (also

 ENOL 408.02, COM L 411.02, COGST 425, FREN 423)Spring. 4 credits. Limited to 15 students. W. Jones.

Quick quiz: what's the most important sexual organ for humans? The brain, of course! Cerebral Seductions concerns both sex and the brain in various ways. We will explore the emergent field of cognitive literary theory and criticism, reading the work of cognitive critics (e.g., Hogan, Richardson, and Zunshine) and cognitive scientists (e.g., Damasio, Gazzaniga), while also considering the ways that other types of literary theory (historicist, poststructuralist, psychoanalytic) might be incorporated within a cognitive framework. With this approach in mind, we will read texts within a literary tradition that recognizedright from the start-the cerebral element in human sexuality: the libertine tradition in 18th-century England and France. Authors will include Rochester, Behn, Richardson, Laclos, de Sade, Austen, and others.
S HUM 426 Modernity and Critique (also
COM L 454, ENGL 408_03, ART H 416)

Spring. 4 credits. Limited to 15 students. B. Maxwell.

Modernity: the condition of life attendant on the massive dislocations commencing with the process defined by Marx as the "primitive accumulation" of capital. As the
psychogeographic regime of "transcendental homelessness" (Lukäcs), as an "exploded picture puzzle" (Bloch), modernity provoked critical examinations by Marxist and anarchist thinkers, extraordinary often in their insight and often enough in their blindness to the world beyond Europe. Surrealism arguably breached the self-enclosure of European radical thought and met a world of anger and analysis speaking its own languages of critique: Césaire, Fanon. The subsequent work of Debord, Vaneigem, and others of the Situationist International shows both the ruins of the earlier projects and important means for living critically in and against our moment. These matters are what we will study.

## S HUM 428 Sensing Thinking (also ENQL 408.04)

Spring. 4 credits. Limited to 15 students. C. Kronengold.

This course explores how the activity of thinking is depicted and embodied in a variety of late-modern artistic practices. We will move across media and genres, studying examples of poetry, music, art, dance and film. The course begins from the premise that artworks convey the nature of thinking by showing us that thought relies upon the senses. We'll be particularly concerned to register modes of thought that lie beneath intellectual attention but above the level of preconscious body/ brain responses, especially as these liminal modes work to establish relations between a self and its environment. At the center is the question of what it means to look for signs of thinking. How might we characterize the politics and the erotics of such a search?

## S HUM 430 Epistemologles of U.8.

 Empire (also ENOL 408.05)Spring. 4 credits. Limited to 15 students. M. Wesling.

This course will consider how the struggle for imperial dominance has involved the production of various ways of knowing, where the conflicts over political, material, and geographical dominance rely upon and give rise to epistemological conflicts as well. We will begin the course with general concerns about the production of knowledge in relation to empire. First, we'll consider how the historical process of imperial expansion has been driven by the desire to document the colonial Other; from sources as disparate as travel narratives, ethnographies, census reports, photography displays, tour guides, and the like, part of the temptation of colonial expansion has been the consolidation of power through the production of knowledge, with these forms emerging as instruments of classification and subjugation, as well as ways of translating and relaying the evidence of cultural difference from colony to metropole and back again. The course will then turn to a more concrete example of this epistemological struggle, by looking closely at the production of knowledge surrounding the U.S. expansion into the Pacific and the Atlantic after 1898. We'll be looking at the surge of epistemological changes that mark the turn from the 19 th to the 20 th century in the U.S.: the emergence of the disciplines of Anthropology and of American literary study, the changing classification strategies for museum and library collections, the proliferation of photographic technology, and the great captivation with the displays at the Worlds Fairs are just a few of the interpretive shifts that accompany the U.S. entry into the global colonial stage. We'll consider as well, however, precisely how the logic of American exceptionalism called upon the interests of knowledge production as justification for its colonial expansion. Readings will include works by Michael Elliott, Carol Duncan, Inderpal Grewal, Caren Kaplan, Amy Kaplan, Renato Rosaldo, and Lisa Lowe, Frantz Fanon, Antonio Gramsci, Albert Memmi, Paolo Friere, Mary Louise Pratt, Dipesh Chakrabarty, and Gauri Viswanathan.
S HUM 450 Science, Rellglon, and the Humanitles Since Darwin (also 8\&Ts 417)

Spring. 4 credits. Limited to 15 students. G. Ortolano.

S HUM 477 Improvising Across Disciplines (also HIST 477/677, COM L 477)
Fall. 4 credits. Limited to 15 students. D. LaCapra.

How does one best understand the concept and practice of improvisation? How is it related to processes of repetition, displacement, conversion, trauma, and radical change? How does one situate the notion of creation ex nihilo, and does it refer to an improvisational form? Is cliché the opposite of improvisation or does a crucial form of improvisation involve the recycling and possible renewal of cliche? What is the differential role of improvisation in religion, philosophy, politics, literature, and historiography? Is improvisation a specifically human capacity, serving as another criterion to divide the human from the animal? In addressing these questions, the seminar will pay particular attention to the
(improvisational?) relation between the secular and the sacred, including the recent turn to the "postsecular" as well as the more or less "creative" return of political theology. Readings include Flaubert, Nietzsche, Beckert, Heidegger, Woolf, Kristeva, Derrida, Agamben, Badiou, and Zizek. Some attention will also be paid to the music of Art Tatum.

## SOCIOLOGY

K. Weeden, chair ( 322 Uris Hall, 255-3820), M. Berezin, S. Correll, M. de Santos, D. Harris, D. Heckathorn, E. Hirsh, E. Lawler, M. Macy, P. McLaughlin, S. Morgan, V. Nee, S. Soule, D. Strang, R. Swedberg, S. Tarrow, S. Van Morgan, E. Wethington, Emeritus: S. Caldwell, B. C. Rosen

Sociology is the study of human social organization, institutions, and groups. The Department of Sociology offers courses in a number of key areas, including comparative sociology, culture, economy and society, family and the life course, gender inequality, political behavior and public policy, organizations, race and ethnicity, social inequality, social psychology and group processes, social and political movements, and social networks. A particular emphasis of the department is the linkage of sociological theory to issues of public concern such as ethnic conflict, drugs, poverty, and gender and race segregation. Interests of faculty members range from the study of interaction in small groups to the study of economic and social change in a number of different countries. The department offers the opportunity for students to develop fundamental theoretical insights and understanding as well as advanced research skills in quantitative and qualitative methods Graduates of the department take up careers in university, government, and business settings, and enter professions such as law, management, and urban policy.

## Soclology Courses for Nonmajors

Sociology provides students with particularly effective ways to understand the complexities of modern life. For many students, the undergraduate years are a last opportunity to gain the insights these fields have to offer. The Department of Sociology is continuing to design an array of beginning and advanced courses that convey a broad understanding of the methods and insights of sociological analysis-courses that is of particular interest to undergraduates who may not major in sociology. First- and second-year students should note that the introductory courses (101, 103, 105, and 115) focus on the sociological analysis of major issues of public life, and that a wide selection of general education courses is available at the 200 level. Advanced undergraduates who are majors in other fields should also see, in particular, descriptions of the 300 - and 400 -level courses, for which there are no prerequisites other than junior or senior standing.

## Related Courses in Other Departments

Students interested in sociology should consult the course lists of the other social science departments in the College of Arts and Sciences (including Anthropology, Economics, Government, and Psychology) and of the following departments in other colleges: Organizational Behavior (School of Industrial
and Labor Relations), Human Development (College of Human Ecology), and Development Sociology (College of Agriculture and Life Sciences)

## The Sociology Major

The Department of Sociology is one of the social science departments at Cornell with the highest national ranking. Faculty members are internationally recognized for their scholarly work, and have received numerous awards, research fellowships, and research grants.
The 20 professors currently in the department are dedicated to scholarly inquiry that is both methodologically rigorous and theoretically innovative. The breadth of their substantive interests and the variety of their methodological styles are well demonstrated in the different fields that are represented within the department. These include comparative societal analysis, culture, deviance and social control, education, economic sociology, family, gender, inequality, social networks, organizations, political sociology, public policy, race and ethnic relations, religion, science and technology, social movements, and social psychology.

## Career Opportualties for Graduates

An undergraduate degree in sociology is one of the most popular degrees with employers. After engineering and computer science, sociology is the most able to place graduates into jobs immediately after completing their bachelor's degree. This is not altogether surprising, since sociology can lead to a rewarding career in any of the following fields:

- government: urban/regional planning, affirmative action, foreign service, human rights management, personnel management
- research: social research, consumer research, data analysis, market research, survey research, census analysis, systems analysis
- criminal justice: corrections, criminology assistance, police work, rehabilitation counseling, criminal investigation, parole management
- teaching: public health education, school admissions, college placement
- community affairs: occupational counseling, career counseling, public health administration, hospital administration, public administration, social assistance advocacy, fund-raising, community organizing, social work
- business: advertising, sales, project management, sales representation, market analysis, real estate management, journalism, public relations, insurance, human resource management, production management, labor relations, quality control management
A large number of sociology majors also go onto graduate school and obtain advanced (i.e., master's and Ph.D.) degrees in such varied fields as sociology, political science, philosophy, economics, and psychology. Many also complete professional degrees in education, law, medicine, social work, and business administration.


## Requirements for the Major

In addition to the academic requirements established by the College of Arts and Sciences, students must also fulfill requirements toward a specified major. Ten courses are required in the sociology major. All courses toward the major must be taken for a letter grade, and students must maintain at least a 2.0 grade point average (GPA) while enrolled in the major. The five courses required for the major are divided into the following categories:

- SOC 101
- SOC 375
- two research methods courses (SOC 301 and 303)
- one advanced-level sociology course (400level or higher)
- five additional (i.e., elective) courses in sociology


## Declaring the Sociology Major

Students in the College of Arts and Sciences who wish to declare a major in sociology should to do so as soon as possible. Students who are not currently in the College of Arts and Sciences need to be admitted to A\&S before declaring the major. To declare the sociology major, students need to take the following steps:

- Obtain a campus copy of their transcript from Day Hall and bring it to the department office ( 316 Uris Hall).
- Obtain a sociology major packet from Susan Meyer, undergraduate assistant, during her office hours (316 Uris Hall). During the meeting, the student fills out a major declaration form.
- Leave this form and the transcript with the undergraduate assistant. The declaration will be reviewed by the director of undergraduate studies and sent on to the College of Arts and Sciences for official notification that the student has declared a major. Please allow two weeks for the declaration to be approved and entered into the campus computer.
A student file will be set up to maintain the student's records in the department. Once the students is officially recognized as a major in sociology, the Sociology Department will receive a copy of the transcript at the end of each semester, which will be kept in the student's file at 316 Uris Hall. Records are maintained until five years after graduation.


## Academic Advising in Sociology

Cornell students are ultimately responsible for the policies, procedures, and requirements regarding their degree as stated in the current Courses of Study. After reading this document, students may find that they are still confused or unclear about some of the requirements, and may have questions and concerns that pertain to their individual situation. Several sources of academic assistance and advice are available.

College Advisor: Because sociology majors are students in the College of Arts and Sciences, college advisors are available by appointment in the Office of Undergraduate Admissions and Academic Advising (Goldwin Smith Hall). It is recommended that students consult with a college advisor sometime before their last semester to discuss the completion of college requirements, graduation, and residency requirements.

Undergraduate Program Coordinator: The undergraduate assistant (Susan Meyer) in the Department of Sociology is located in 316 Uris Hall. She is available to provide assistance with the following:

- the process of declaring the sociology major.
- information about transferring courses from other universities and/or other departments.
- other administrative matters or concerns (e.g., forms, adding and dropping courses).
Director of Undergraduate Studies: The director of undergraduate studies will:
- provide information about departmental curricula and the requirements for the major.
- meet with applicants to the major.
- review applications for sociology majors and accept students into the program.
- assist students in finding an advisor in the sociology department.
- screen sociology classes taken outside Cornell for acceptance as Cornell credit.
- serve as the backup for faculty advisors who are absent during advising periods.
Faculty Advising: Once a student is a declared sociology major, he or she is be assigned a faculty advisor within the Sociology Department. The student is asked to name his or her preference for an advisor; however, if he or she is not sufficiently familiar with the program, the director of undergraduate studies can assist in selecting a faculty member. Faculty advisors are there to:
- discuss education, career goals, and graduate school opportunities.
- meet to talk about courses and plan your program of study within the department.
- go over the student's academic program each semester.
Sociology Peer Advisors: Approximately five advanced sociology majors serve as peer advisors in the department. These advisors change from year to year, but a complete list of their names and e-mail addresses is available from the undergraduate assistant in the sociology office ( 316 Uris Hall). Peer advisors do not provide academic counseling; they are there to help students adjust to life in the major, as well as to let them know about the department's many support services and activities.


## Research Opportunltles

Qualified sociology majors are invited to participate with faculty members in conducting research. Such projects are usually initiated in one of two ways: the student may offer to assist the faculty member in an ongoing project, or the student may request that the faculty member supervise the execution of a project conceived by the student. In either case, the student should enroll in SOC 491 Independent Study. Interested students may direct inquiries to any faculty member.

## The Sociology Honors Program

## Honors in sociology are awarded for

 excellence in the major, which includes overall GPA and completion of an honors thesis. Inaddition to the regular requirements of the major, candidates for honors must maintain a cumulative GPA of at least a A- in all sociology classes, complete SOC 495 and 496 (in the senior year), and write an honors thesis.
Students are awarded either honors (cum laude), high honors (magna cum laude), or highest honors (summa cum laude) in the program based on the honors advisors' evaluation of the level and the quality of the work completed towards the honors thesis and the quality of the course work. The honors distinction will be noted on the student's official transcript and it will also be indicated on the student's diploma.

## Admission to the Honors Program

To qualify for entrance into the honors program, students must have at least a B+ GPA overall and an A-GPA in the major. In addition, they must secure the permission of a faculty member in the Department of Sociology who will guide their honors thesis.
Students who wish to be considered for honors should apply to the director of undergraduate studies no later than the second semester of their junior year. Honors program application forms are available in 316 Uris Hall. The application must include a copy of the student's undergraduate transcript, a brief description of the proposed research project (due May 15), and the endorsement of a faculty member in the Sociology Department who will supervise the honors work (due September 15).

## The Honors Thesis

During the senior year, each candidate for honors in sociology enrolls in a yearlong tutorial (SOC 495 and 496) with the faculty member who has agreed to serve as the student's thesis advisor. During the first semester of their senior year, students determine the focus of their honors thesis, and submit a 10 - to 15 -page overview (or, alternatively, a preliminary draft) of the thesis to their advisor. During the second semester, they complete their honors thesis and submit final copies to the department.
The text of the honors thesis may not exceed 60 pages except by permission of the honors advisor. Three copies of the honors thesis are due to the undergraduate assistant (316 Uris Hall) during the third week of April. Honors thesis preparation guidelines are available from the undergraduate assistant (316 Uris Hall).
Any honors candidate whose research directly involves working with human subjects must receive approval for the project from the Cornell University Committee on Human Subjects.

## Introductory Courses

SOC 101(1101) Introduction to Sociology (SBA-AS)
Fall, spring. 3 credits. Students may not recelve credit for both SOC 101 and D SOC 101. Staff.
Introduces students to the distinctive features of the sociological perspective, as opposed to psychological, historical, or economic approaches. First discusses the sociological perspective in the context of small groups and face-to-face interaction. As the course unfolds, the same perspective is applied to progressively larger social groupings, such as peer groups and families, formal organizations,
social classes, racial and ethnic groups, and nation states. This approach also provides new insights into such topics as deviance, gender inequality, culture, and lifestyles. Whenever possible, class lectures and discussions illustrate these themes by exploring contemporary social problems and developments, including the rise of Generation X (and Generation Y?), the sources of current racial tensions, and the gender gap in the workplace.
SOC 105(1105) Introduction to Economic Sociology (SBA-AS)
Fall. 3 credits. V. Nee.
Modern social thought arose out of attempts to explain the relationship between economic development and the social transformations that gave rise to the contemporary world. Classical theorists from Karl Marx and Max Weber to Karl Polanyi focused their writings on emergent capitalist economies and societies. Contemporary social theorists likewise have sought to understand the interaction between capitalism and the social forces reacting against and emerging from modern economic development. From exchange and rational choice theories to network analysis and institutional theory, a central theme in contemporary social thought has been the relationship between the economy and society, economic action and social structure, and rationality and fundamental social processes. This course provides an introduction to social thought and research seeking to understand and explain the relationship between economy and society in the modern era.

## [SOC 115(1150) Utopia in Theory and

 Practice (SBA-AS)Spring. 3 credits. Next offered 2008-2009. D. Strang.

People have always sought to imagine and realize a better society, with both inspiring and disastrous results. This course discusses the literary utopias of Moore, Morris, and Bellamy, and the dystopias of Huxley, Orwell, and Zamiatin. Also examines real social experiments, including 19 th-century intentional communities, 20th-century socialisms and religious cults, and modern ecological, political, and millennial movements. Throughout, the emphasis is on two sociological questions: What kinds of social relationships appear as ideal? How can we tell societies that might work from those that cannot?]

## General Education Courses

sOC 202(2202) Population Dynamics (also D SOC 201[2010]) (CA-AS)
Spring. 3 credits. Staff.
For description, see D SOC 201.

## [SOC 203|2203] Work and Family In

 Comparative Perspective (SBA-AS)Fall. 4 credits. Next offered 2008-2009. Staff.
Family life is often portrayed in the popular media as a haven away from the harsh realities of public life, suggesting that work and family constitute separate and distinct spheres. By contrast, many sociologists point out the links between work and family, and how these links have different consequences for men and women. This course highlights the responses of individuals, employers, and governments, both in the United States and internationally, to the dilemmas posed by the interface between work and family.]

SOC 206(2206) International Development (also D SOC 205[2050]) (HA-AS)
Spring. 3 credits. Staff.
For description, see D SOC 205.

## SOC 207(2070) Problems in Contemporary Socioty (also D SOC 207[2070]) (SBA-AS)

Fall. 4 credits. Staff.
Examines contemporary social problems, with a focus on their sources in the organization of society. Modern societies are based on three fundamental types of institutions-social norms, hierarchies, and markets. Each is subject to distinctive types of failures resulting in problems that include poverty, prejudice and discrimination, intolerance and hate, alcohol and drug abuse, physical and mental illness, crime and delinquency, and urban problems. In analyzing these problems the course emphasizes the institutions through which they are created and perpetuated and the form of institutional change required to address them.

## SOC 208(2208) Social Inequallty (also D SOC 209[2090]) (SBA-AS)

Spring. 4 credits. K. Weeden.
Reviews contemporary approaches to understanding social inequality and the processes by which it comes to be seen as legitimate, natural, or desirable. We address questions of the following kind: What are the major forms of stratification in human history? Are inequality and poverty inevitable? How many social classes are there in advanced industrial societies? Is there a "ruling class?" Are lifestyles, attitudes, and personalities shaped fundamentally by class membership? Can individuals born into poverty readily escape their class origins and move upward in the class structure? Are social contacts and "luck" important forces in matching individuals to jobs and class positions? What types of social processes serve to maintain and alter racial, ethnic, and gender discrimination in labor markets? Is there an "underclass?" These and other questions are addressed in light of classical and contemporary theory and research.

## SOC 209(2090) Networks (also ECON 204[2040]) (SBA-AS)

Spring. 4 credits. D. Easley and
J. Kleinberg.

For description, see ECON 204.

## SOC 210(2100) What Is Science? (also S\&TS 201[2011]) (CA-AS) <br> Spring. 3 credits. T. Pinch.

For description, see S\&TS 201

## SOC 215(2150) Organizations: An Introduction (SBA-AS)

Fall. 4 credits. E. Hirsh
This course examines the fundamental and pervasive role that organizations play in modern society. From universities, hospitals, banks, factories, prisons and churches to museums, art galleries and NGOs, contemporary society is inconceivable without organizations. Whether one struggles for change, seeks to protect the status quo, or simply wants to get things done in the modern world, it is crucially important to understand how organizations work. This course will explore such issues as the historical origins of complex organizations, the internal structure and dynamics of organizations, organizations interactions with their external environments, and how organizations change over time.
[SOC 221(2210) Race, Class, and Gender Research in Practice (SBA-AS)
Spring. 4 credits. Sophomore seminar. Next offered 2008-2009. K. Weeden.
What are the promises and limitations of social science as a tool for understanding the sources and consequences of social inequality? This course introduces the underlying logic of social scientific research in the context of contemporary debates about social inequality: e.g., educational testing and tracking, racebased affirmative action, and the roles of intelligence and parental resources in affecting who gets ahead. Its goals are to encourage students to be critical consumers of social scientific data, evidence, and discourse and to develop their own rigorous, informed explanations of social phenomena. I

## SOC 222(2220) Controversies about

 Inequality (also GOVT 222[2225], PAM/ILROB/D SOC 222[2220], PHIL 195[1950]) (SBA-AS)Fall. 4 credits. S. Morgan.
Introduces students to contemporary debates and controversies about the underlying structure of inequality, the processes by which it is generated and maintained, the mechanisms through which it comes to be viewed as legitimate, natural, or inevitable, and the forces making for change and stability in inequality regimes. These topics are addressed through readings, class discussion, visiting lectures from distinguished scholars of inequality, and debates staged between students who take opposing positions on pressing inequality-relevant issues (e.g., welfare reform, school vouchers, immigration policy, affirmative action).

## SOC 246(2460) Drugs and Society (SBA-AS)

Spring. 4 credits. D. Heckathorn. The course focuses on drug use and abuse as a social rather than as a medical or psychopathological phenomenon. Specifically, the course deals with the history of drug use and regulatory attempts in the United States and around the world; the relationship between drug use and racism/class conflict; pharmacology and use patterns related to specific drugs; perspectives on the etiology of drug use/abuse; AIDS prevention and harm reduction interventions; drug-using subcultures; drug policy, drug legislation, and drug enforcement; and the promotion and condemnation of drug activities in the mass media.

## SOC 248(2480) Politics and Culture (also GOVT 363[3633]) (HA-AS) <br> Spring, 4 credits. M. Berezin.

Focuses on currently salient themes of nationalism, multiculturalism, and democracy. It explores such questions as who is a citizen; what is a nation; what is a political institution; and how do bonds of solidarity form in modern civil society. Readings are drawn principally from sociology and where applicable from political science and history. Journalist accounts, films, and web site research supplement readings.
SOC 250(2500) Aging and the Life Course (also HD 251[2510])
Spring. 3 credits. E. Wethington. For description, see HD 251.
SOC 265(2650) Latinos in the United States (also LSP 201[2010], D SOC 265[2650]) (SBA-AS)
Spring. 3 credits; 4 -credit option available. H. Velez.

Exploration and analysis of the Hispanic experience in the United States. Examines the sociohistorical background and economic, psychological, and political factors that converge to shape a Latino group identity in the United States. Perspectives are suggested and developed for understanding Hispanic migrations, the plight of Latinos in urban and rural areas, and the unique problems faced by the diverse Latino groups. Groups studied include Mexican Americans, Dominicans, Cubans, and Puerto Ricans.

## [SOC 270(2700) Gender: Meanings and Practice (also FGSS 270[2700]) (SBA-AS)

Spring. 3 credits. Next offered 2008-2009. S. Correll.

People have many ideas about gender-about women, men, femininity, and masculinity.
These ideas organize our social lives in important ways and often in ways that we do not even notice. This course critically examines the ways that gender structures the social world in which we live. After laying the theoretical groundwork, the course examines cultural conceptions about gender, paying special attention to how beliefs about masculinity and femininity create and enforce a system of gender difference and inequality.]

## SOC 280(2800) Social Movements (SBA-AS)

Spring. 3 credits. Staff.
This course presents a sociological examination of the emergence and development of social movements and collective action at both the societal and individual levels. Students will learn about the major theoretical perspectives on social movements, as well as several recent and classical empirical works in the area. Students will learn about a variety of different social movements (both contemporary and historic).

## Methods and Statistics Courses

## SOC 301(3010) Evaluating Statistical Evidence (MQR)

Fall. 4 credits. Prerequisite: Arts and
Sciences students only. Staff.
First course in statistical evidence in the social sciences, with emphasis on statistical inference and multiple regression models. Theory is supplemented with numerous applications.

## SOC 303(3030) Design and Measurement (SBA-AS)

Spring. 4 credits. Staff.
Research methods are the foundation upon which all research rests. When there are flaws in the methodology, the whole project usually crumbles. This course uses methods texts, and examples from real research projects, to investigate the research methods and logic employed by sociologists. Topics explored include surveys, experimentation, sampling, observation, causal inference, and ethics. By the end of the course, students are able to identify methodological weaknesses in others' research, and design projects that can withstand a critical eye.
[SOC 304/3040) Social Networks and Social Processes (SBA-AS)
Fall. 4 credits. Next offered 2008-2009. D. Strang.

How do groups self-segregate? What leads fashions to rise and fall? How do rumors -spread? How do communities form and police themselves on the Internet? This course examines these kinds of issues through the
study of fundamental social processes such as exchange, diffusion, and group formation Focuses on models that can be explored through computer simulation and improved through observation.]

## [SOC 307(3070) Soclety and Parly Politics (also COVT 306[3063]) (SBA-AS)

Spring. 4 credits. Next offered 2008-2009. S. Van Morgan.

This course will focus on the role that society plays in the emergence and functioning of political parties. In addition to investigating different types of party systems, the societal roots of political parties, and the influence of institutions on electoral politics, the course will also examine contemporary debates, such as the relationship between culture and electoral behavior. Case studies will be drawn from a number of Western and non-Western democracies.]

## Intermediate Courses

SOC 311(3110) Group Solidarity (SBA-AS)
Fall. 4 credits. M. Macy.
What is the most important group that you belong to? What makes it important? What holds the group together, and how might it fall apart? How does the group recruit new members? Select leaders? Make and enforce rules? Do some members end up doing most of the work while others get a free ride? This course explore these questions from an interdisciplinary perspective, drawing on sociobiology, economics, and social psychology, as it applies alternative theories of group solidarity to a series of case studies, such as urban gangs, spiritual communes, the civil rights movement, pro-life activists, athletic teams, work groups, and college fraternities

## SOC 313(3130) Sociology of Medicine

 (also S8TS 311[3110]) (SBA-AS)Fall. 4 credits. C. Leuenberger.
For description, see S\&TS 311.

## SOC 318(3180) Contemporary Latin American Societles

Spring. 4 credits. M. de Santos. This course examines selected aspects of the social landscape of contemporary Latin American societies. We will analyze social, economic, and political changes that have taken place in recent decades. Some of the topics to be covered include: changes in the class structure, gender and race relations; the rise of new social movements and forms of protest in civil society; shifts in economy and state relations and changes in the urban landscapes. Even though cases will be drawn from all over Latin America, this course will be centered in the Southern Cone.

## SOC 324(3240) Environment and Soclety (also S8TS 324[3241], D SOC 324[3240]) (SBA.AS)

Fall or spring. 3 credits. Staff.
For description, see D SOC 324.

## [SOC 327(3270) Toleration and

 Fundamentalism (SBA-AS)Spring. Next offered 2008-2009 M. Berezin.

The purpose of this course is to help students to think historically and sociologically about the resurgence of religion as a political issue. In order to cover a wide range of time periods and cultures, this seminar views religion through an institutional framework concentrating particularly on the separation of

Church and State which has been the hallmark of modern Western political organization. The seminar asks students first, to think about how the boundary between church and state, sacred and secular was negotiated in various nation-states; and second, how that divide encourages toleration and discourages fundamentalisms of various stripes. The institutional focus will lead us to consider the legal frames, i.e., the laws that govern the boundaries between religion and the polity.]

## SOC 336(3360) Evolving Families: Challenges to Family Policy (also PAM 336[3360]) (SBA-AS)

Fall. 3 credits. S. Sassler.
For description, see PAM 336.

## SOC 337(3370) Racial and Ethnic Differentiation (also PAM 337[3370]) (SBA-AS)

Spring. 3 credits. S. Sassler.
For description, see PAM 337.

## SOC 341(3410) Modern European Society

 and Politics (also GOVT 341[3413]) (SBA-AS)Spring. 4 credits. S. Van Morgan. For description, see GOVT 341.
SOC 357(3570) Schooling, Racial Inequality, and Public Policy in America (SBA-AS)
Spring. 4 credits. S. Morgan.
After examining alternative explanations for why individuals obtain different amounts and types of educational training, the course focuses on how an individual's family background and race affect his or her trajectory through the educational system. The course covers the specific challenges that have confronted urban schooling in America since the 1960 s, including the classic literature on the effects of school and community resources on student achievement and as well as the development and later evaluation of school desegregation policies. Also considers case studies of current policy debates in the United States, such as housing segregation and school resegregation, voucher programs for school choice, and the motivation for and consequences of the establishment of statemandated testing requirements. Throughout the course, emphasis is placed upon the alternative modes of inquiry and writing which opposing scholars, policymakers, and journalists use to address these contentious topics.

## SOC 362(3620) Inequality and the Workplace (SBA-AS) <br> Fall. 4 credits. E. Hirsh.

The work people do is important for all aspects of their lives, including their earnings, social status, where they live, and opportunities for their children. This course examines the sources, extent, and consequences of workplace inequality across gender, racial, and ethnic lines. While traditional explanations of workplace inequality focus on how differences in workers' skills and qualifications lead to disparities in income, status, and other workrelated rewards, this course emphasizes how characteristics of the workplace-such as hiring practices, pay scales, workforce diversity, and legal context-produce variation in gender, race, and ethnic inequality. The course concludes with a discussion of how public policy can intervene in the perpetuation of workplace inequality.

## SOC 371(3710) Comparative Social

 Stratification (also D SOC 370[3700]) (SBA-AS)Fall. 3 credits. T. Lyson.
For description, see D) SOC 370.

## SOC 375(3750) Classical Theory \#

 (SBA-AS)Fall. 3 credits. R. Swedherg. Introduction to the classics in sociology, primarily works by Karl Marx, Max Weber, Emile Durkheim, and Georg Simmel. Students also study the works of Alexis de Tocqueville, Montesquieu, and Joseph Schumpeter. Special emphasis is put on the concepts, ideas, and modes of explanation that characterize the classics. Students also look at these writers' empirical material, and what may be termed the social construction of the classics. Course requirements include active class participation and three tests in class.

## SOC 395(3950) Advanced Economic

 Sociology (SBA-AS)Spring. 4 credits. R. Swedberg.
Aims at reinforcing and adding to the insights presented in SOC 105 Introduction to Economic Sociology (taught by Professor Victor Nee in the fall). Begins with the theoretical foundation of economic sociology (classical and modern). The contributions by Max Weber, Joseph Schumpeter, Mark Granovetter, and others are presented. This segment is followed by lectures on different types of economic organization, from capitalism and the global economy to the firm and entrepreneurship. Topics such as politics and the economy, law and the economy, culture and the economy, and gender and the economy are then discussed. Normative
aspects of economic sociology are also on the agenda.

## Advanced Courses

The following courses are intended for advanced undergraduates with substantial preparation, as well as for graduate students in sociology and related disciplines. The normal prerequisite for all 400 -level courses, is one introductory course plus 301 (or an equivalent statistics course). Students who are not sure whether their background is sufficient for a particular course should consult the professor.
SOC 408(4080) Qualitative Methods (also SOC 508[5080]) (SBA.AS)
Spring. 4 credits. M. Berezin.
This course aims to acquaint students with the practice of non-quantitative research methods. It does not offer a laundry list of techniques. rather it asks students to think about how particular methods are more or less suited to the answering of particular types of research questions. The course is divided into four parts: (1) a general discussion of theory; methods and evidence in social science; (2) a series of readings and exercises on particular methods; (3) an analysis of full-length works to see how they were put together; (4) discussion of student projects.
SOC 409(4090) From the Phonograph to Techno (also S8TS 409[4091]) (SBA-AS)
Spring. 4 credits, T. Pinch.
For description, see S\&TS 409.

## SOC 410(4100) Health and Survival Inequalities (also FGSS/D 8OC 410[4100]) (SBA-AS)

Fall. 4 credits. A. Basu.
For description, see D SOC 410.

## SOC 415(4150) Internet and Society

Spring. 4 credits. M. de Santos.
This course examines how social contexts shape the Internet and how the Internet has changed established institutions. We cover issues such as the "digital divide"; how blogs, news aggregators and online news sites have changed the news media landscape; privacy in the Internet era; and how the Internet has changed and created opportunities for social movements, social identities and communities

## SOC 421(4210) Theories of Reproduction (also FGSS/D SOC 421[4210])

 [SBA-AS]Spring. 4 credits. A. Basu
For description, see D SOC 421

## SOC 425(4250) Artificial Societies (also SOC 527[5270]) (SBA-AS)

Spring. 4 credits. M. Macy.
This seminar is an introduction to computer simulation. The course surveys the history of social simulation and introduces students to complexity theory, game theory, and evolutionary models of social change. The remainder of the course (nine weeks) teaches students to program in Delphi and give them simulation programs to modify as a class project.

## SOC 457(4570) Health and Social

 Behavior (also HD 457[4570])Fall. 3 credits. Prerequisites: HD 250 SOC 101, D SOC 101, or SOC 250 and a course in statistics. Letter grades only. E. Wethington.

For description, see HD 457.

## SOC 478(4780) The Family and Society In Africa (also AS\&RC 478[4606]) ©

 (SBA-AS)Fall. 4 credits. N. Assië-Lumumba.
For description, see AS\&RC 478.
SOC 491(4910) Independent Study
Fall or spring. 1-4 credits. For undergraduates who wish to obtain research experience or do extensive reading on a special topic. Prerequisite: acceptable prospectus and agreement of a faculty member to serve as supervisor for project throughout semester. Graduate students should enroll in 891-892.

## [SOC 492(4920) Economic Sociology of Entrepreneurship (SBA-AS)

Fall. 4 credits. Next offered 2008-2009. V. Nee.

This course introduces the classical and contemporary writings on the rise of entrepreneurial capitalism in the West and the global diffusion of the modern
entrepreneurship in its rational orientation to profit-making and innovative drive to apply new technologies and ideas to production. Contemporary approaches shift the emphasis away from the analysis of individual attributes and agency to focus on examining the role of social networks, organizational forms and institutional environment in facilitating the entrepreneurs and the firm. In the second part of the course, we will examine case studies of entrepreneurs, drawing selectively from novels, movies and autobiographies.]

SOC 495(4950) Honors Research
Fall or spring. 4 credits. Prerequisite: sociology seniors; permission of instructor

## SOC 496(4960) Honors Thesis: Senior

 YearFall or spring. 4 credits. Prerequisite: SOC 495

## Graduate Core Courses

These courses are primarily for graduate students in sociology but may be taken by other graduate students with permission of the instructor.

## [SOC 501(5010) Basic Problems In

 Sociology IFall. 4 credits. Next offered 2008-2009. V. Nee.

Analysis of theory shaping current sociological research. Examination of several central problems in sociological inquiry provides an occasion for understanding tensions and continuities between classical and contemporary approaches, for indicating the prospects for unifying microsociological and macrosociological orientations, and for developing a critical appreciation of efforts to integrate theory and research

## SOC 502(5020) Basic Problems in

 Sociology IIFall. 4 credits. D. Heckathorn. Continuation of SOC 501. Emphasis is on the logical analysis of theoretical perspectives, theories, and theoretical research programs shaping current sociological research. The course includes an introduction to basic concepts used in the logical analysis of theories and examines their application to specific theories and theoretical research programs. Theoretical perspectives include functionalism, social exchange, and interactionism.

## SOC 505(5050) Research Methods I

Fall. 4 credits. Prerequisite: a first course in statistics and probability. Staff.
This course is an introduction to techniques of social inference. We cover research methods, sources of evidence, model design, and questions of empirical validity.

## SOC 506(5060) Research Methods II

Spring. 4 credits. E. Hirsh.
Course on advanced linear regression analysis in theory and practice. After a review of classical bivariate regression and elementary matrix algebra, the course progresses under the credible assumption that the most important fundamentals of data analysis techniques can be taught in the context of simple multivariate linear models. Accordingly, the course provides a relatively formal treatment of the identification and estimation of single equation OLS and GLS regression models, instrumental variable models, traditional path models, and multiple indicator models. Interspersed with this material, the course addresses complications of regression modeling for the practicing researcher including: missing data problems, measurement error, regression diagnostics, weighting, and inference for surveys. The course concludes with a brief introduction to nonlinear regression, - counterfactual models of causality, Bayesian inference, and hierarchical models.

## Graduate Seminars

These seminars are primarily for graduate students but may be taken by qualified advanced undergraduates who have permission of the instructor. The seminars offered in each semester are determined in part by the interests of students, but it is unlikely that any seminar will be offered more frequently than every other year. The list below indicates seminars that are likely to be offered, but others may be added and some may be deleted. Students should check with the department before each semester.

## [SOC 510(5100) Seminar on Comparative Societal Analysis

Spring 3 credits. Prerequisite: advanced graduate students throughout social sciences; permission of instructor. Next offered 2008-2009. M. Berezin.
Intended for advanced graduate students interested in comparative methods and research in the social sciences. It is offered in conjunction with the Comparative Societal Analysis program in the Einaudi Center for International Studies. Students enrolled for credit write critiques of papers presented at the seminar by faculty members and other graduate students, and work on their own project. Some weeks are devoted to collective reading and analysis of background work. Students may enroll for more than one semester.]

## SOC 518(5180) Social Inequality

Fall. 4 credits. S. Morgan.
This course serves as an introduction to contemporary theories, debates, and models regarding the structure of social classes, the determinants of social mobility, the sources and causes of racial, ethnic, and gender-based inequality, and the putative rise of postmodern forms of stratification. The twofold ohjective is to both review contemporary theorizing and to identify areas in which new theories, hypotheses, and research agendas might be fruitfully developed.

## [SOC 519(5190) Workshop on Social

 InequalitySpring. 4 credits. Prerequisite: SOC 518; sociology Ph.D. students, or permission of instructor. Next offered 2008-2009. K. Weeden.

Provides a forum in which students and others can present, discuss, and receive instant feedback on their inequality-related research. Its primary goal is to help students advance their own research; its secondary goal is to introduce selected debates in the contemporary inequality literature in a more comprehensive fashion than is possible in the introductory graduate-level seminar on inequality.]

## SOC 527(5270) Artificial Societies (also SOC 425[4250]। <br> Spring. 4 credits. M. Macy. <br> For description, see Soc. 425.

## [SOC 528(5280) Conflict and the Nation-

 StateFall. 4 credits. Next offered 2008-2009. D. Strang.

The nation-state developed out of conflict, through military competition within Europe and the rise of and response to colonial empires in the Americas, Asia, and Africa. Conflict is just as virulent today, as ethnic cleansing and movement toward American imperialism attest. This course examines these conflicts both in comparative historical terms and in terms of fundamental social processes,
with an eye to what they tell us about contemporary issues. Questions include: when and why do groups seek to leave polities, through secession or decolonization? When and why do states become imperial powers? How are intra-state and inter-state conflict conditioned by the changing content of nationality and citizenship, global institutions, and inequalities of wealth and power.]

## [SOC 540(5400) Organizational Research

Fall. 4 credits. Next offered 2008-2009. D. Strang.

Seminar focusing on contemporary sociological research on organizations. It centers theoretically on the interplay of institutional, ecological, and choice-theoretic accounts of organizational structure and action. Subjects include organizational founding and mortality; change in organizational practices over time; the relationship between organizations and their legal, social, and cultural environment; and stratification and mobility within organizations.]

## [SOC 580(5800) Identlity and Interest in

 Collective ActionSpring. 4 credits. Offered every other year; next offered 2008-2009. M. Macy.
This research seminar examines the problem of collective action from alternative theoretical perspectives: one centered on shared interests, the other on common identities. The former claims that groups are held together because the members are interdependent and thus benefit from mutual trust and cooperation in a common endeavor. Identity theorists contend that trust and cooperation may also depend on affective and normative ties among participants who share a salient demarcation (including a "shared fate"). We will explore this debate, and its possible resolution, through an examination of formal theoretical studies (including game theoretic,
evolutionary, and agent-based models) as well as empirical research using experimentation and comparative case analysis. We will also examine research on informal social control (including reciprocity and reputation systems), social networks, and mobilizing strategies as mechanisms for reconciling the tension between individual self-interest and collective obligations. The primary goal is to identify, formulate, and launch promising research projects, and to that end, seminar members will be expected to critically engage the literature each week and to write a final paper that advances original research (as a detailed prospectus or, where practical, as a
publishable article).]

## SOC 591(5910) Speclal Seminars in Sociology

Fall and spring. 2-4 credits. Staff. These graduate seminars are offered irregularly. Topics, credit, and instructors vary from semester to semester. Students should look at the Sociology Department bulletin board at the beginning of each semester for current offerings
[SOC 605(6050) Political Soclology
Fall. 3 credits. Next offered 2008-2009
S. Soule.

This seminar presents the basic approaches to political sociology, with emphasis on the political process in the United States (including the study of both conventional and unconventional politics). Students will learn about explanations for individual participation in both conventional and unconventional
politics. Major theoretical and empirical works in this area will be studied.]

## SOC 606-607(6060-6070) Sociology Colloquium

Fall and spring. 0 credits. Requirement for sociology graduate students. Staff. A series of talks representative of current research interests in sociology, given by distinguished visitors and faculty members.

## SOC 608(6080) Proseminar in Sociology

Fall. 1 credit. Prerequisite: first-semester sociology graduate students. Staff. Discussion of the current state of sociology and of the research interests of members of the graduate field; taught by all members of the field.

## [SOC 609(6090) Special Topics in Methodology

Spring. 2 credits. Next offered 2008-2009. S. Morgan

After considering alternative modes of explanation in the social sciences, this course offers an introduction to techniques and strategies for estimating causal effects from a counterfactual perspective. For problems where potential outcomes exist because they can be specified for well-defined causal states, alternative data analysis techniques will then be introduced and explained, including matching as stratification, propensity scores as weights in regression analysis, natural experiments as instrumental variable estimators of local average treatment effects, longitudinal data techniques from an interrupted time series perspective, and the front-door criterion for estimating causal effects via the exhaustive modeling of mechanisms. Because the course assumes some familiarity with advanced data analysis techniques, the course is not suitable for students who have not had some training in statistics and data analysis techniques at the graduate level. The course will meet weekly for the first seven weeks of the spring semester. Students who attend the lectures and participate in the discussion of the readings for the first seven weeks should enroll in the pass-fail 2 -credit version of the course. Students who wish to carry on in the remaining weeks of the semester to write a term paper using the techniques should enrol in the graded 4 -credit version of the course.]

## SOC 610(6100) The Sociological Classics

Spring. 3 credits. R. Swedberg.
This course is primarily intended for graduate students who lack a background in the classics as well as for those who are only familiar with elementary works such as The Protestant Ethic and The Communist Manifesto. The readings and the discussion will primarily be concentrated to Weber's Economy and Society, Durkheim's Elementary Forms of Religious Life and Marx's Capital. Works by Georg Simmel are also part of the reading list. The purpose of the course is to make the student familiar with the concepts, ideas and ways of reasoning that characterize the major works of the classics. The main idea is to lay a foundation for future work in sociology. Each class will be in the form of a seminar with mainly discussion. The requirements include active class participation and a research paper on some aspect of the classics. Each class will be introduced by one or several students, who will suggest topics for discussion. The exact way that this will be done, depends on the participants and their interest.

## SOC 630(6300) Cultural Sociology

Fall. 4 credits. M. Berezin.
Cultural sociology is a flourishing sub-field within sociology that incorporates a wide range of substantive areas (art, inequality, family, politics) and uses a wide range of methods from the ethnographic to the textual This course proposes to explore some of the leading works and ideas in that field and to analyze how culture operates in social life. It begins by analyzing the different meanings that sociologists have ascribed to culture. We begin by reading classics like Durkheim's Elementary Forms of Religious Life then move on to contemporary theorists such as Geertz, Bourdieu, Alexander and Swidler. We then read a series of empirically grounded case studies that make culture the basis of the analysis (i.e., Lamont, Money Manners and Morals). We will also analyze certain cultural objects such as films, art, etc. to put into practice some of the ideas from the readings. There is no course such as this taught by a practicing cultural sociologist in the university.

## SOC 631(6310) Inside Technology: The Social Construction of Technology (also S\&TS 631[6311])

Spring. 4 credits. Staff.
For description, see S $\$$ TS 631
SOC 632(6320) Inside Technology: The Social Construction of Technology (also S8TS 632[6321])
Spring 4 credits. Staff.
For description, see S\&TS 632.

## SOC 640(6400) Methods of Social Movements Research

Spring. 4 credits. S. Soule.
This seminar presents the dominant research methodologies employed by social scientists studying social movements (surveys, semistructured interviews, case studies, network analysis, event analysis, participant observation, and historical analyses). In addition to reading about these methods as applied to social movements, we will also discuss the major theories of social movements with an eye toward considering appropriate research designs for empirical examinations of hypotheses derived from these theories. Many historical and contemporary social movements in the United States will be discussed as we examine these methods and theories; for example, the women's movement, civil rights movement, labor movement, suffrage movement, peace movement, homeless movement,
environmental movement, to name just some of these.

## [SOC 660(6600) States and Social

 Movements (also GOVT 660[6603]lSpring. 4 credits. Next offered 2008-2009 S. Tarrow

For description, see GOVT 660.]

## [SOC 680(6800) Workshop on

 Transnational Contention (also GOVT $681[6817]$ )Spring. 4 credits. Next offered 2008-2009.
S. Tarrow

For description, see GOVT 681.]

## SOC 682(6820) Experimental Sociology

 WorkshopFall. 1 credit. S. Correll.
This course is a workshop where students develop original research projects using experimental research methods. Students take turns presenting their projects, as work-inprogress. Students will receive feedback from
the instructor and from their fellow classmates. The goal is to turn student research projects into published journal articles.

## [\$0C 685(6850) Research Practicum on

 CenderFall. 4 credits. Next offered 2008-2009. S. Correll.

This course is an advanced graduate seminar designed to help Ph.D. students learn to conduct publishable research in the sociology of gender/sexuality. The goal will be to develop projects that are both empirically sound and reflect an understanding and appreciation of gender as a social phenomenon. In the second week of class, students will give a short presentation of a research project on gender that they began in a previous course. We will then read and discuss current debates on topics such as feminist methods and the application and penetration of gender theories in sociological research. Students will apply these readings as they critique and improve their own projects. Students will also be exposed to the review process and gain practice reviewing each others papers following the guidelines provided by the journal Gender \& Society. We will conclude the class with short presentations of students' final projects.]

## SOC 691(6910) Independent Study

Fall or spring. 2-4 credits. Prerequisite: graduate status and permission of faculty member willing to supervise project. Staff. For graduates who wish to obtain research experience or to do extensive reading on a special topic. Permission to enroll for independent study is granted only to students who present an acceptable prospectus and secure the agreement of a faculty member to serve as supervisor for the project throughout the semester.

## soc 778(7780) Solidarlty in Groups (also ILROB 778[7780])

Fall. 3 credits. Next offered 2008-2009.
E. Lawler.

For description, see ILROB 778.]

## soc 891-892(8910-8920) Graduate

 Research891, fall; 892, spring. Variable to 4 credits each semester. Prerequisite: graduate standing and permission of faculty member willing to supervise project.

## SOC 895-896(8950-8960) Thesis

 Research895, fall; 896, spring. Variable to 6 credits each semester. Prerequisite: permission of thesis supervisor.

## SOUTH ASIA PROGRAM

A. Basu, director; A. Banerjee, K. Basu, A. Blackburn, D. Bor, D. Boucher, I. Dadi, L. Derry, S. Feldman, D. Gold, D. Ghosh, D. Gurak, M. Hatch, R. Herring, D. Holmberg, R. Kanbur, M. Katzenstein, K. A. R. Kennedy, N. Kudva, S. Kuruvilla, W. Liyanage, B. Lust, B. MacDougall, M. Majumdar, K. March,
L. McCrea, K. McGowan, S. Mohanty,
S. Mukherjee, V. Munasinghe, A. Nussbaum,
S. Oja, P. Olpadwala, B. Perlus, K. V. Raman,
J. Rigi, S. Rizvi, A. Ruppel, N. Sethi, S. Singh,
E. Tagliacozzo, S. Toorawa, R. Travers, M. Walter, M. Weiss, A. Willford. Emeritus: M. Latham, N. Uphoff.

The South Asia Program coordinates research, teaching, and special campus events relating to Afghanistan, Bangladesh, India, Pakistan, Nepal, and Sri Lanka. The program faculty include members from a variety of disciplines, including agricultural economics, agricultural engineering, anthropology, architecture, art, city and regional planning, comparative religion, development sociology, ecology and systematics, economics, English, geology, government, history, history of art, human ecology, industrial and labor relations, international agriculture, linguistics, and literature. Undergraduates with a special interest in the region may major in Asian Studies with a South Asian concentration, or complete a South Asia concentration with any other major. Graduate students may pursue the M.A. degree in Asian Studies with a concentration in South Asia.

Languages offered are Bengali, Hindi, Nepali, Sinhala, Sanskrit, Tamil, and Urdu. Foreign Language and Area Studies scholarships are available to graduate students who are U.S. citizens or permanent residents. Cornell is a member of the American Institutes of Bangladesh, Indian, Pakistan, and Sri Lankan studies. For details on the major, see the Department of Asian Studies listing in this volume. For courses available in South Asian studies, or for further information on research opportunities, direct questions to the South Asia Program Office, 170 Uris Hall, 255-8493. www.einaudi.cornell.edu/SouthAsia.

## SOUTHEAST ASIA PROGRAM

T. Chaloemtiarana, director (180 Uris Hall); I. Azis, W. Bailey, A. Blackburn, A. Cohn, M. Fiskesjo, M. Hatch, S. Kuruvilla, F. Logevall, T. Loos, K. McGowan, L. Paterson, J. Siegel, E. Tagliacozzo, K. Taylor, A. Willford, L. Williams, Emeritus: B. Anderson, R. Barker, R. Jones, S. O'Connor, E. Thorbecke, J. Wolff, M. Welker. Lecturers: J. Pandin, H. Phan, N. Jagacinski, T. Savella, T. Tranviet, S. Tun

Southeast Asia studies at Cornell is within the framework of the Department of Asian Studies and affiliates with the Einaudi Center for International Studies. Eighteen core faculty members in the colleges of Arts and Sciences, Business and the Johnson Graduate School of Management, the School of Industrial and Labor Relations, and Agriculture and Life Sciences participate in an interdisciplinary program of teaching and research on the history, culture, and societies of the region stretching from Burma through the Philippines. Courses are offered in such fields as anthropology, Asian studies, economics, finance, government, history, history of art, labor relations, linguistics, music, and
development sociology. Instruction is also offered in a wide variety of Southeast Asian languages: Burmese, Cambodian (Khmer), Indonesian, Tagalog, Thai, and Vietnamese. In addition, faculty from other disciplines provide area instruction on Southeast Asia. The formal program of study is enriched by a diverse range of extracurricular activities, including an informal weekly brown bag seminar, art exhibits at the Johnson Museum, and concerts of the Gamelan Ensemble. The George McT. Kahin Center for Advanced Research on Southeast Asia is also the site for public lectures as well as publication and outreach activities related to this area. The John M. Echols Collection on Southeast Asia, in Kroch Library, is the most comprehensive collection on Southeast Asia in the United States.
Undergraduates may major in Asian Studies with a focus on Southeast Asia and its languages, or they may elect to take a concentration in Southeast Asian studies with any other major by completing 18 credits of course work. Graduate students may work toward an M.A. degree in Southeast Asian studies or pursue a Master of Professional Studies in another school with a concentration in Southeast Asian studies. Ph.D. students specializing in Southeast Asia receive a doctorate in a discipline such as history, history of art, anthropology, government, linguistics, music, economics, or city and regional planning. Academic Year and Summer Foreign Language and Area Studies scholarships are available to graduate students who are U.S. citizens or permanent residents.
For courses available in Southeast Asian studies and details on the major, see the Department of Asian Studies listing in this volume. Additional information is available at www.einaudi.comell.edu/southeastasia. Inquiries for further information should be directed to the program office, 180 Uris Hall, 255-2378 or SEAP@cornell.edu.

SPANISH
See "Department of Romance Studies."

## STATISTICAL SCIENCE DEPARTMENT

The university-wide Department of Statistical Science coordinates undergraduate and graduate study in statistics and probability. A list of suitable courses can be found in the CIS section of this catalog.

## SWAHILI

See "Africana Studies and Research Center."

## SWEDISH

See "Department of German Studies."

## TAGALOG

See "Department of Asian Studies."

## THAI

See "Department of Asian Studies."

## THEATRE, FILM, AND DANCE

Faculty: K. Goetz, chair; R. Archer, D. Bathrick (director of graduate studies), S. Bernstein, S. Brookhouse, J. Chu, S. Cole, W. Cross, D. Feldshuh, A. Fogelsanger (director of undergraduate studies in dance);
D. Fredericksen (director of undergraduate studies in film); J. E. Gainor (on leave 20072008); S. Haenni, D. Hall, E. Intemann,
J. Kovar, B. Levitt, P. Lillard, R. MacPike,
B. Milles, J. Morgenroth, M. Rivchin,
N. Salvato, J. Self, B. Suber, A. Van Dyke (director of undergraduate studies in theatre), A. Villarejo (on leave 2007-2008), S. Warner

Teaching staff: A. Bernstein, L. Boquist, B. Cirmo, B. Komala, E. Lloyd, T. Ostrander, K. Phoenix, C. Seekatz, F. Sellers, J. Tindall.

Through its courses and production laboratories, the department provides students with a wide range of opportunities in theatre, film, and dance. It also offers bachelor of arts degrees in each of those areas. These majors educate students in accordance with the general liberal arts ethic of the college. The department invites and encourages academic and studio participation by students from all disciplines.

## Theatre Arts Major

R. Archer, D. Bathrick, S. Bernstein,
S. Brookhouse, S. Cole, W. Cross, D. Feldshuh, J. E. Gainor (on leave 2007-2008); K. Goetz, chair; D. Hall, E. Intemann, B. Levitt, P. Lillard, R. MacPike, B. Milles, N. Salvato, A. Van Dyke (director of undergraduate studies), S. Warner
The theatre major offers studies in the history of theatre, dramatic theory and criticism, playwriting, acting, directing, design/ technology, and stage management. Students interested in the theatre arts major should consult with Alison Van Dyke (director of undergraduate studies).
Theatre major requirements Credits

1. THETR 240 and 2418

THETR 250 Introduction to
Theatre Design and Technology
THETR 280 Introduction to Acting
2. Four laboratory courses distributed as follows:
THETR 151 Production Lab I
THETR 153, 253, or
353 Stage Management
Lab I, II, or III
THETR 155 Rehearsal and
Performance or THETR 151
in a different area
THETR 251 or 351
Production Lab Il or III
3. Four courses in the area of theatre studies (see "Theatre Studies" section of theatre courses) chosen in the following manner:
one course must be at 300 level
one course must be at 400 level
two additional courses at the 300 or above level
one of the three courses must be pre20th century.
4. Three courses (at least 9 credits) in other theatre courses chosen in consultation with the faculty advisor. Course taken to qualify for admission to the Advanced Undergraduate Theatre Program (described below) may also be used to fulfill this requirement.
5. Courses in which a student receives a grade below $C$ cannot be used to fulfill the requirements for a Theatre major.

## Honors

The theatre honors program is for majors who have demonstrated exceptional ability in the major and who seek an opportunity to explore branches of their subject not represented in the regular curriculum or to gain experience in original research. To be part of the honors program the student must maintain a GPA of 3.5 in classes for the theatre major and an average of 300 in all courses. Students must consult with their advisors in the spring of their junior year to enroll in the honors programs.

## The Advanced Undergraduate Theatre Program

The department offers advanced study in directing, playwriting, design/technology, and stage management to students who qualify on the basis of outstanding achievement in course work. Admission to the AUTP is by invitation of the area faculty supervisor and the completion of a recommended "track" of courses or equivalent experience. (For recommended courses of study see listing of courses at end of departmental listings.) Approval process includes a portfolio review and/or interview. The program provides students with intensive study in theatre as well as the opportunity to collaborate with professional faculty and guest artists.

## Independent Study, Internships and Honors <br> THETR 300(3000) Independent Study

Fall, spring, or summer. $1-4$ credits. Independent study in theatre allows students the opportunity to pursue special interests not treated in regularly scheduled courses. A faculty member, who becomes the student's instructor for the course, must approve the student's program of study and agree to provide continuing supervision of the work. Students must prepare a proposal for independent study, which is available in 225 Schwartz Center.

## THETR 485(4850) Undergraduate Internship

Fall, spring, or summer. 1-3 credits.
Prerequisite: majors or concentrators in the department.
Students are responsible for arranging their own intemships in consultation with the faculty in their area of choice before preregistration for the semester in which the internship is planned to take place. To receive credit for this course, the internship must be unpaid. Students must follow the rules and procedures stated in the departmental internship form.

## THETR 495(4950) Honors Research Tutorlal

Fall, spring. 4 credits. Prerequisite: honors students in theatre.
First of a two-semester sequence (the second is THETR 496) for seniors engaged in an honors project.

## THETR 496(4960) Honors Research

 TutorialFall or spring. 4 credits. Prerequisite:
honors students in theatre.
Second of a two-semester sequence (the first is THETR 495) for students engaged in an honors project.

## First-Year Writing Seminars

Consult the John S. Knight Institute brochure for times, instructors, and descriptions.

## Theatre Studies

THETR 223(2230) The Comic Theater (also CLASS 223[2641]) * (LA-AS)
Spring. 3 credits. J. Rusten.
For description, see CLASS 223.

## THETR 277(2770) Shakespeare (also

 ENGL 227[2270]) " (LA-AS)Fall. 4 credits. B. Correll.
For description, see ENGL 227
[THETR 236(2360) Public Voice and Civic Gesture (also DANCE 236[2450], VISST 236[2340])
Fall. 1 credit. Next offered 2008-2009.
B. Suber and B. Milles.

For description, see DANCE 236.]
TMETR 240(2400) Introduction to World Theatro I-Antiquity through 1500 e " (LA-AS)
Fall. 4 credits. N. Salvato.
A survey of practices, literatures, and themes of theatrical performance in Africa, America, Asia, and Europe from antiquity through 1500. Examines case studies from ancient Egypt, Greece, Rome, the Near East, India, China, Japan, and England, continuing up to the age of European imperialism. Looks at issues of masking and identity, storytelling and ritual, stage and society, tradition and modernity. Lectures are combined with periodic student projects.
THETR 241(2410) Introduction to World Theatre II-NEO Classical to the Present ( (LA-AS)
Spring. 4 credits. S. Warner.
Survey of global performance from around
1600 to the present. Examines the
development of European and Asian
vernacular and national theatrical traditions;
recent ethnic and popular performance
traditions of Europe, Asia, Africa, and meso-
America; recurring issues of realism and theatricality; avant-garde innovations; colonial expansion and marginalization; intercultural and transactional exchanges. Lectures are combined with periodic student projects.

## THETR 273(2730) Opera (also MUSIC

 274[2241]) ( (LA-AS)Spring. 3 credits. R. Harris-Warrick. For description, see MUSIC 274
THETR 278(2780) Desire (also ENOL/COM
LFGSs 276[2760]) (LA-AS)
Spring. 4 credits. E. Hanson
For description, see ENGL 276.

## THETR 313(3130) Special Topics in

 Drama and Performance (also ENCL 376[3760], FG88 313[3130])Fall. 4 credits. S. Warner.
An intensive study of a particular dramatist, period, form or problem in drama and/or performance. Topics, prerequisites and formats will vary from year to year.

## THETR 319(3190) Music, Dance, and Light (also DANCE $319[3590]$, VISST $319[3519])$ (LA-AS)

Spring. 3 credits. Attendance at dance concerts and music concerts required. A. Fogelsanger and E. Intemann. Artistic values, parameters, and concerns of music (sound design), dance, and lighting design are compared and contrasted, and the combination of design elements is analyzed in contemporary dance. Includes writing in response to readings, audio and video recordings, and performances. Some classes devoted to creating sound, movement, and lighting.

## [THETR 328(3260) Queer Performance

 (also FQSS 325[3250]) (LA-AS)Spring. 3 credits. Limited to 15 students. Next offered 2008-2009. S. Warner. What constitutes queer performance? Is queer who you are or what you do? Is sexuality all we mean by queer? Has queer performance enhanced or eclipsed gay and lesbian theater? This course investigates the polymorphously perverse relationship between queer theory and performance. Integral to our theoretical discussions are questions of practice and production: Where is queer performance staged and how is it received? How is it produced, for whom, by whom, and with what funds? What is the relationship between politics and performance? Students are expected to attend at least one performance outside of class and to collaborate on an inclass performance.]

## [THETR 335(3350) Modern Western

 Dramn, Modern Western Theatre: Theory and Practice (also VISST 335[3735], ENGL 335[3350]) (LA-AS)Fall. 4 credits. Next offered 2008-2009. N. Salvato.

This course investigates drama and the cultural contexts of its performance from the mid-19th century to the mid-20th century in Europe and the United States. We will consider such artistic movements as expressionism, symbolism, naturalism, fururism, constructivism, surrealism, and dadaism. The course will conclude with an emphasis on Brecht's epic theater, Artaud's theater of cruelty, and a few of their more contemporary descendants.]

## THETR 338(3360) American Drama and Theatre (also AM ST 334[3360])

Spring. 4 credits. Prerequisite: permission of instructor. Limited to 25 students. N. Salvato.

This course explores major American playwrights from 1900 to 1960 , introducing students to American theater as a significant part of modern American cultural history. Our focus will be to consider the ways in which theater has contributed to the construction and deconstruction of a national identity. We will pay special attention to the social, political, and aesthetic contexts of the time period and discuss the shifting popularity of dramatic forms, including melodrama, realism, expressionism, absurdism, and the folk play, in the American theater canon. Authors
include: O'Neill, Glaspell, Odets, Rice, Hellman, Hughes, Hurston, Hansberry, Miller, Williams, and Albee, among others.

## [THETR 337(3370) Contemporary

## American Theatre (also AM ST

 335[3370], ENGL 337[3370]) (LA-A5)Fall. 3 credits. Limited to 15 students. Next offered 2008-2009. Staff.
How has theatre helped shape our notion of what it means to be an American in the second half of the 20th century? What role has politics played in recent theatrical experimentation? How has performance been used as a platform for constructing and deconstructing conceptions of identity, community, and nationality? In this course we will examine major trends in American drama from 1960 to the present. Readings for the class focus on theatre that responds directly to or intervenes in moments of social crisis, including: the Vietnam War, the Civil Rights Movement, the Women's Movement, the Gay and Lesbian Liberation Movement, and AIDS.]

## [THETR 345(3450) The Tragic Theatre

 (also CLASS 345[3645], COM L 344[3440]) " (LA-AS)Fall. 4 credits. Limited to 40 students. Next offered 2009-2010. F. Ahl.
For description, see CLASS 345.]
THETR 372(3720) Medieval and Renaissance Drama (also ENGL 372(3720]) \# (LA-AS)
Spring. 4 credits. M. Raskolnikov.
For description, see ENGL. 372.

## THETR 375(3750) Studies in Drama and Theatre: "Enemies, A 'Love' Story?" (also ENGL 375[3750]) (LA-AS) <br> Spring. 4 credits. P. Lorenz. <br> For clescription, see ENGL 375.

## [THETR 403(4030) Ritual, Play,

 Spectacle, Act: Performing Culture (also THETR 603[6030]) (LA-As)Spring. 4 credits. Next offered 2008-2009. S. Warner.

Takes a broad-spectrum approach to performance. Includes anthropological texts on ritual and play, sociological texts on performances in everyday life, literary studies texts on "performatives" in speech and writing, folklore studies on parades and reenactments, psychological and philosophical studies on the role of performance in the formation of identity, as well as standard texts of the theater. Considers the distinctions between play, ritual, spectacle, festival, theater, and the "visual" arts. Explores the differences between spectating and witnessing and examine studies on audience behavior. At the base of the inquiry is the broad issue of the role of representational practices within culture and among cultures. If, as Barbara Meyerhoff has written, we understand ourselves by showing ourselves to ourselves, what role does "showing" have in construction of the selves we seek to understand? Why is postmodern culture often called the "society of the spectacle" (Debord)? If, as Aristotle claimed, we are mimetic creatures at base, which comes first-representation or reality? Looking closely at the notion of "live" att, students weigh theorists who claim that performance is ephemeral and disappearing against those who claim that performance, such as ora! history, is resilient and enduring. Students have the opportunity to do fieldwork, create performative works, and engage in scholarly study.]
[THETR 404(4040) Mythology and Postmodern Performance (also THETR 604[6040]) (LA-A8)
Spring. 4 credits. Limited to 15 students. Next offered 2008-2009.
Why has mythology flourished in performance projects despite the rather marginal position it has occupied in the academy in the past few decades? Does a survey of postmodern performances, especially by so called "marginal" or "minority" groups, suggest a shift toward a postsecular society? Bringing a variety of divergent discourses into dialogue, this course investigates the critical potentiality mythology holds for both performance theory and social activism. Specifically, it looks to mythology to provide a fresh perspective on cultural performances: sanctioned and unsanctioned forms of transgression; ritualized behavior; initiation and incarceration; and artistic projects aimed at consciousness raising and social change. In what ways does mythology provide an interesting alternative to mimesis as a discursive and performative strategy? How efficacious is it in representing concepts or situations that cannot adequately be conceived of in language or under the law?]

## TNETR 420(4200)/620(6200) Parody (also ENGL 437/637, FGSS

 427/837[4270/6370]) (LA-AS)Spring. 4 credits. N. Salvato.
In A Tbeory of Parody, Linda Hutcheon defines parody broadly as "repetition with critical difference, which marks difference rather than similarity." Taking a cue from Hutcheon, we will consider parody as a form of intertextuality that is not necessarily used in the service of ridicule. Rather, we will examine a number of recent imitative texts in order to distinguish the rich variety of political agendas and aesthetic rationales for postmodern parody. Reading canonical texts (Oedipus Rex, Hamlet) alongside some of their revisions (Oedipus at Palm Springs, Stage Blood), we will map the ways in which parody has been the defining theatrical form of the American avant-garde in the second half of the 20th century and at the beginning of the 21 st . Individual authors and theatre collectives include Charles Busch, Christopher Durang, Five Lesbian Brothers, Christopher Marlowe, Chuck Mee, William Shakespeare, Sophocles, Split Britches, Gertrude Stein, Mac Wellman, Tennessee Williams, and The Wooster Group.

## [THETR 426(4280) Adaptation: Toxt/ Theatricallty (also VISST 426[4260]) (LA-AS)

Spring. 4 credits. Prerequisite: permission of instructor. B. Milles.
Mounting a script into a show is a process of adaptation from page to stage. But dramas have also been translations of other media Sondheim's Sunday in the Park with George "adapted" a painting by Seurat. Stringberg's Ghost Sonata "translated" a symphony by Beethoven. Plays can even be adapted into other plays: Cesaire's A Tempest, Paula Vogel's Desdemona: A Play about a Handkerchief, Heiner Muller's Hamletmachine. In performance art (where there is often no script) examples abound as well: Can you imagine reenacting Edward Manet's Olympia while someone builds a frame around you? And there are lots of exciting possibilities that arise in adapting across cultures-such as a Kathakali Lear or a Shakespearean Mababharata. This course challenges the boundaries of text to discover the possibilities
of performance. Asks: How do we translate inspiration into tangible (or intangible)
theatrical imagery? Working in workshop format as actors and writers, students explore the process of developing theatre pieces based on a variety of sources.]
TMETR 436(4360) The Female Dramatlc Tradition (also FGSS 433[4330]) (LA-AS)
Spring. 4 credits. S. Warner
Is there a "female dramaturgy?" What is the female tradition in the theatre? This course explores these questions through an investigation of texts by women dramatists, including Hrotsvitha, Aphra Behn, and Caryl Churchill, as well as theory by such critics as Sue Ellen Case and Jill Dolan.

## [THETR 440(4400) Romantle Drama (also

 THETR 644[6440], ENOL440/644[4440/6440]) (LA-AS)
Fall. 4 credits. Next offered 2008-2009. R. Parker.

For description, see ENGL 440.]
THETR 445(4450) Text Analysls for Production: How to Get from the Text onto the Stage (also ENOL 444[4441])
Spring. 4 credits. Limited to 15 students Prerequisite: THETR 281 or 250 or 398 , or permission of instructor. B . Levitt.
Examines the play as the central, essential source for production decisions made by the actor, the director, the designer, and the dramaturg. Students "present" their conclusions about the performance of studied texts through project work as either an actor, director, designer, or dramaturg, as well as through two to three papers.

## [THETR 446(4460) Shakespeare in

 (Con)text (also ENGL 445[4450]) * (LA-AS)Spring. 4 credits. Limited to 15 students.
Prerequisite: permission of instructor. Next offered 2008-2009. B. Levitt.
Examines how collaboration among stage directors, designers, and actors leads to differing interpretations of plays. The course focuses on how the texts themselves are blueprints for productions with particular emphasis on the choices available to the actor inherent in the text.
This is a special seminar sponsored by the John S. Knight Institute's Sophomore Seminars Program. Seminars offer discipline-intensive study within an interdisciplinary context. While not restricted to sophomores, the seminars aim at initiating students into the discipline's outlook, discourse community, modes of knowledge, and ways of articulating that knowledge. Limited to 15 students. Special emphasis is given to strong thinking and writing and to personalized instruction with top university professors.]
THETR 447(4470) Hamlet: The Seminar (also ENGL 482[4820]) " (LA-AS)
Fall. 4 credits. Limited to 15 students. Prerequisites: THETR 240, 241, 242 or equivalent and permission of instructor. B. Levitt.

The most studied and written about work in Western Literature outside the Bible, Hamlet, according to Harold Bloom, is our secular savior and our ambassador to death. This course centers on a close reading of the play. Through research and assigned readings the course tests theoretical viewpoints about the
play against the text itself by reading the theory in relationship to the production history.
[THETR 483(4830) Seminar in Comparative 20th-Century Anglophone Drama (also ENGL 483[4601]) (LA-A5)
Fall. 4 credits. Recommended: some knowledge of classical and avant-garde theories of drama and theatre. B. Jeyifo. For description, see ENGL 483]

## THETR 580(5800) Problems in Asian Art:

 Dancing the Stone: Body, Memory, and Architecture (also ART H 580[5850])Spring. 4 credits. K. McGowan.
For description, see ART H 580.]

## THETR 600(6000) Proseminar In Theatre

 StudlesSpring. 4 credits. Prerequisite: graduate standing.
An introduction to the theory and methods involved in the study of the theatre. Attention focuses on pedagogy and the profession in Part I. Part II explores current scholarly trends.

## THETR 605(6050) Camp, Kitsch, and

 Trash (also ENGL 651[6510], FGSS 605[6050]Fall. 4 credits. N. Salvato.
This graduate seminar investigates three key terms for 20th-century aesthetic thought and performance theory: camp, kitsch, and trash. As we analyze the various meanings assigned to these terms (and the performances articulated under their banners), we will also consider histories of taste; the traffic between popular culture and "high art"; and the relationships among material artifacts, identity politics, and community formations. Issues of class, race, gender, and sexuality will be foregrounded. Authors include Adorno, Bourdieu, Broch, Butler, Debord, Greenberg, Ludlam, Newton, Sedgwick, Sontag, Waters, and Warhol.

## THETR 606(6060) Passionate Politics (also FGSS 604[6040])

Fall. 4 credits. S. Warner.
Complete Course Title: Passionate Politics: Affect, Protest, Performance. This course explores the relationship between affect, performance and political engagement. What role have emotions played in social movements? In the success or failure of political leaders? How do affects such as shame, pride, fear, anger, alienation, compassion, sentimentality, boredom, disgust and paranoia inspire us to act or to refrain from acting? What role do race, class, gender, and sexuality play? Readings may include Plato, Seneca, Augustine, Weber, Durkheim, Freud, Adorno, Jameson, Tompkins, Fanon, Berlant, Ahmed, Ngai, and Massumi.

## THETR 627(6270) Studies in

Shakespeare: Shakespeare and Marlowe (also ENGL 627[6270])
Fall. 4 credits. B. Correll.
For description, see ENGL 627.
[THETR 703(7030) Theorizing Film
Fall. 4 credits. Next offered 2008-2009. T. Murray.]

## TNETR 710(7100) The Pedagogy of

 TheatreFall. 4 credits. Corequisite: relevant undergraduate class and permission of instructor. Staff.
Provides graduate students in the field of theatre an opportunity to work directly with a
faculty member to explore pedagogical theory and practice for undergraduate theatre classes in all areas of the curriculum.

## Acting

## THETR 155(1550) Rehearsal and Performance

Fall or spring. 1-2 credits; 1 credit per production experience per semester up to 2 credits per semester. Students must register for course in semester in which credit is earned. Prerequisite: students who are assigned roles after tryouts at department's scheduled auditions. Students should add this course only after they have been assigned roles. S-U grades only.
The study, development, and performance of roles in departmental theatre or dance productions or the study and practice of directing as experienced in assisting faculty and guest directors.

## THETR 205(2050) Rehearsal Workshop

Fall or spring. 2 credits. Limited to 30 students. Prerequisites: participation in a particular department production and permission of instructor. Staff.
Enables students participating in a particular production to gain expertise and/or knowledge to contribute to that production. The focus of the course depends on the needs of a particular production (e.g., history, choreography, textwork, dramaturgy).

## THETR 28012800) Introduction to Acting (LA-AS)

Fall or spring. 3 credits. Limited to 16 students per sec. Preregistration and registration only through roster in department office, 223 Schwartz Center. No online registration. Staff.
An introduction to the actor's technique and performance skills, exploring the elements necessary to begin training as an actor, i.e., observation, concentration, and imagination. Focus is on physical and vocal exercises, improvisation, and text and character. There is required play reading, play attendance, and some scene study.

## THETR 281(2810) Acting I (LA-AS)

Fall or spring. 3 credits. Limited to 14 students per sec. Prerequisites: sophomore standing and above; THETR 280 and
audition. Registration only through roster
in deparment office, 223 Schwartz Center. Practical exploration of the actor's craft through exercises in physical and psychological action, improvisation and scene study.

## [THETR 282(2820) Standard American Stage Speech (LA-AS)

Fall. 3 credits. Limited to 10 students. Prerequisites: THETR 280 and permission of instructor. Next offered 2007-2008. A. Van Dyke.

Introduction to Standard American Stage Speech. Study of various regional American accents and Standard American Stage Speech using the International Phonetic Alphabet (IPA) as a way to designate the vowel, diphthong, and consonant sounds of spoken English. The goal of this course is to learn speech for use in performing Shakespeare, Shaw, Chekhov, Moliere, etc.]

THETR 284(2840) Speech and Dialects for Performance (LA-AS)
Spring. 3 credits. Limited to 10 students. Primarily for department majors. Prerequisites: THETR 281 and permission of instructor. A. Van Dyke.
Development of speech and dialects in dramatic text.

## THETR 380(3800) Acting II (LA-AS)

Fall. 3 credits. Limited to 12 students.
Prerequisite: THETR 281 and audition. S. Cole.

Continuation of Acting I. Special consideration is given to a physical approach to

## characterization.

## THETR 381(3810) Acting III: Advanced Scene Study (LA-AS)

Spring. 3 credits. Limited to 10 students. Prerequisite: audition. Strong preference given to those who have taken THETR 446. B. Levitt.

Focuses on advanced problems for the stage. Monologues and scenes are drawn from
Shakespeare and classical sources.
[THETR 384(3840) Commedia: a
Contemporization of Physical Acting Styles and the Comic Approach (also VISST 385[3850]) (LA-AS)
Fall. 3 credits. Limited to 10 students. Prerequisite: THETR 281 and permission of instructor. Next offered 2008-2009. B. Milles.

A wholly physical acting course based in the practices of Commedia dell'arte-stock characters, physical lazzi, improvisation, street theatre-using improvisation, some mask work, clown and viewpoint training. An exploration of how to use the body to illuminate text, and how to mine text to maximize comedy.]

## THETR 385(3850) Advanced Studies in Acting Techniques (LA-AS)

Fall. 3 credits; may be repeated for credit. Limited to 8 students. Prerequisites: THETR 281, audition, and permission of instructor. Fall: The Techniques of Comedy. S. Cole. Acting in Comedy. Text: A study of there nature of comedy and laughter in the theatre and the techniques of acting which sustain the actor in the comedic style.

## THETR 386|3860) Solo Performance

Fall. 4 credits. Prerequisites: THETR 280,
281 and permission of instructor B. Levitt. THETR 386 was designed to explore the evolution and performance of material from nonscripted texts and focus on the performance of those texts by the solo performer. Material may be drawn from newspapers, novels, poetry, non-fiction,
biography, auto-biography, and interviews.

## [THETR 481(4810) Senior Seminar in Theater Exploration

Spring. 3 credits. Prerequisites: $300-\mathrm{level}$ acting course and/or senior theater student by permission of instructors. Next offered 2008-2009. B. Levitt and A. Van Dyke. This seminar will re-explore and summarize the techniques taught in acting and theater classes relating to performance and serve as a culminating experience for those undergraduates whose major study of interest during their four years at Cornell has been in the performance side of Theatre Arts. Over the semester, students will read and analyze material written by actors, agents, and scholars in acting technique, comparing it to what they have learned, and working toward creating a guide for graduating seniors who will pursue
performing arts. Studies will focus on auditioning, scene-work, cold reading, text analysis, and acting in film, theater, and television. The course will include lectures given by Resident Professional Teaching Associates, guest artists visiting the department, and possibly from members of other departments and the professional theater community.]

## Directing

## THETR 177(1770) Student Laboratory

 Theatre CompanySpring. 1-2 credits.
The Student Laboratory Theatre Company (SLTC) is a group of student-actors who earn credit by acting in three scenes directed by students taking THETR 498. Students enrolling in SLTC for credit earn 1 credit for two projects and 2 credits for three projects. SLTC also meets with directors once a week.

## THETR 398(3980) Fundamentals of Directing I (also VISST 398[3798])

 [LA-AS]Fall. 3 credits. Limited to 9 students. Prerequisite: permission of instructor. Special consideration given to students who have completed THETR 280 or are intending to continue in area of stage or screen directing. Students should see instructor one year in advance to sign up for course. D. Feldshuh.
Focused, practical exercises teach the student fundamental staging techniques that bring written text to theatrical life. A core objective is to increase the student's awareness of why and how certain stage events communicate effectively to an audience. Each student directs a number of exercises as well as a short scene.

## THETR 498(4980) Fundamentals of Directing II (LA-AS)

Spring. 4 credits. Limited enrollment. Prerequisite: THETR 280 and 398, and permission of instructor. Recommended: THETR 250 and 281. D. Feldshuh:
Builds on the staging techniques learned in Fundamentals of Directing 1. In this course each student directs actors from the Student Laboratory Theatre Company in a series of projects and public presentations focusing on specific directorial challenges.
THETR 499(4990) Practicum in Directing Fall or spring. 1-4 credits. Prerequisites: THETR 240, 250, 280, 398, 498, and permission of instructor. D. Feldshuh. Allows the student who has completed the appropriate prerequisites the opportunity to direct a full presentation of theatre in conjunction with a faculty mentor. May also involve an internship with a prominent director on campus or the opportunity to assistant direct a faculty or guest director.

## Playwriting

## THETR 348(3480) Playwriting (LA-AS)

Fall. 4 credits. Limited to 12 students. Prerequisite: permission of instructor. B. Milles.

Various approaches and techniques are examined as the student is introduced to the art and craft of dramatic writing. The student is required to read dramatic texts, observe theatre productions and rehearsals, and write. The semester culminates in the completion of a 20 - to 30 -minute one-act play.

## [THETR 349(3490) Advanced Playwriting

 (LA-AS)4 credits. Prerequisite: THETR 348 or permission of instructor. Next offered 2008-2009. B. Milles.
Continuation of THETR 348. An intensive writing class. Students are encouraged to explore a rich creative landscape culminating in the completion of a full length play. Focus is on the clarification of dramatic action with emphasis on conflict, theatrical language and refining the visual impulse.]
[THETR 497(4970) Seminar in Playwriting
1-4 credits. Prerequisite: THETR 348 and 349 and permission of instructor. Next offered 2008-2009. Staff.
Extension of THETR 348 and 349. Students formulate a process for developing a fulllength play, which they develop over the course of the semester. The class meetings are made up of discussions about the students process and creative tactics, and reading of material generated by the playwrights.]

## Design, Technology, and Stage Management

## Design

THETR 250(2500) Fundamentals of Theatre Design and Technology (LA-AS)
Fall and spring. 4 credits. Limited to 12
students. Not open to first-semester
freshmen. Registration only through
department roster in 223 Schwartz Center. Highly recommended: concurrent enrollment in 1 credit of Production Lab (THETR 151 or 251). Students required to purchase materials that instructors specify (approx. cost $\$ 50$ ). K. Goetz, W. Cross,
E. Intemann, and S. Bernstein.

Lectures, discussion, and project work . introduce the principles of designing scenery, costumes, lighting and sound, and the technical process of realizing designs on stage.

## [THETR 254|2540) Theatrical Makeup

## Studio

Spring. 3 credits. Limited to 10 students.
Prerequisite: permission of instructor. Registration only through department roster in 223 Schwartz Center. Students are required to purchase makeup kits that instructor provides (approx. cost $\$ 50$ ). It is expected that any interested student will have taken courses within the department in any of the areas of: design, acting, dance, or film, or will have completed rehearsal and performance (THETR 155) credit. Basic technique of makeup design and application for the stage including corrective, old age, likeness, and animals; use of some three-dimensional makeup and false facial hair.]

## THETR 319(3190) Music, Dance, and

 Light (also DANCE/VISST $319[3590]$ ) (LA-AS)Fall. 3 credits. Attendance at dance concerts and music concerts required. E. Intemann and A. Fogelsanger. Artistic values, parameters, and concerns of music (sound design), dance, and lighting design are compared and contrasted, and the combination of design elements is analyzed in contemporary dance. Includes writing in response to readings, audio and video recordings, and performances. Some classes devoted to creating sound, movement, and lighting.

## THETR $341(3410)$ CAD Studio for Theatre

 DesignFall and/or spring. 3 credits. Prerequisite: THETR 250 and 340 and permission of instructor. Registration only through department roster in 223 Schwartz Center. Experience in theatre production and graphic communication helpful but not essential. Staff.
Students will utilize commercially available computer assisted design software to explore the process of designing scenery, costume and lighting for the live theatre. AutoCad,
Vectorworks and Photoshop are some of the applications utilized

## THETR 343(3430) Costume History: From

 Fig Leaf to Vanity \# (LA-AS)Fall. 3 credits. Limited to 20 students
S. Bernstein.

Offers an overview of the history of clothing from the first signs of clothing to the early 20th century. It investigates social, political, economic, technological, geographic
ecological, and artistic influences on costume.

## THETR 362(3620) Lighting Design

 Studio I (also DANCE 362[3660], VISST 364[3620]) (LA-AS)Fall. 4 credits. Limited to 6 students.
E. Intemann.

The theory and practice of lighting design as a medium for artistic expression. This course explores the aesthetic and mechanical aspects of light and their application in a variety of disciplines. Emphasis is on understanding lighting's function in an environment and manipulating light effectively. Artistic style and viewpoint are also covered

## THETR 364(3640) Scenic Design Studio

 (LA-AS)Fall. 3 credits. Limited to 10 students Prerequisite: THETR 250 and 340 or permission of instructor. Recommended: experience in theatre production and graphic skills. Students are required to purchase materials that instructor will specify (approx. cost $\$ 50$ ). K. Goetz. An exploration of the process of designing scenery for the live theatre. Projects employ various media to explore dramatic use of architecture, the scenic space, and elements of interior design.

## THETR 365(3650) Automated Lighting and Control

Fall. 3 credits. Limited to 8 students.
E. Intemann and F. Sellers

Covers the understanding and application of light control technologies, including electrical systems, color, optics, dimming protocols, and console programming. Students complete a series of projects culminating in the programming and use of moving fixtures and lighting visualization software.

## THETR 366(3660) Costume Design

 Studio (LA-AS)Spring. 3 credits; may be repeated for credit Limited to 10 students. Students are required to purchase materials that instructor will specify (approx. cost $\$ 70$ ). S. Bernstein.

Design of costumes for the theatre, concentrating on script and character analysis, period research, design elements, figure drawing and rendering skills, and an understanding of production style.

THETR 368(3680) Sound Design and Digital Audio (also DANCE 368[3680], MUSIC 355[3431]) (LA-AS)
Spring. 3 credits. Prerequisite: permission of instructor. Recommended: some experience with audio/video recording or editing.
Basics of digital audio, psychoacoustics, and sound design as they apply to theatre, film, and music production. Weekly projects require time spent in the studio outside of class. Students create soundtracks for text and moving image, with final projects in 5.1 surround sound, using Pro Tools and Digital Performer.

## THETR 369(3690) Interactive

 Performance Technology (also DANCE 369[3560], MUSIC 356[3441]) (LA-AS)Fall. 3 credits. Prerequisite: laptop computer and MAX/MSP and Jitter software required, see www.cycling $74 . \mathrm{com}$ for student software pricing. Lab performance at end of semester. W. Cross and A. Fogelsanger.
Introduction to the multimedia programming platforms MAX/MSP/Jitter and their application to computer-interactive dance (interactive dance technology). Intended to bring together programmers and dancers. Each student will create software patches and movement pieces, and collaborate with others on a final project focusing on the input, manipulation, and output of movement, sound, video, graphics, and lighting in live dance performance. Topics include digital audio/video processing, MIDI control, sensor use, electroacoustic music, history of computer technology and dance up to the present, gestural expression,
choreography, composition, design, and aesthetics. Includes 2 -hour lab. There will be assigned online readings.

## THETR 371(3710) Costume Design

 Studio II (LA-A5)Fall. 3 credits. Limited to 10 students. Prerequisite: THETR 366, or THETR 250 with permission of instructor. Students are required to purchase materials that instructor will specify (approx. cost \$50). S. Bernstein.

Explores unconventional costume designs for theatre and dance. Deals with the special considerations found in many plays and performance pieces, such as the theatricalization of nonhuman subjects (e.g., animals, plants, machines, magical creatures), the visualization of music, or the support or enhancement of movement. Also covers alternative (some non-Western) ways to create character through costume, make-up, masks, and wearable forms of puppetry.
THETR 462(4620) Lighting Design Studio II (also DANCE 462[4660]) (LA-AS)
Spring. 4 credits. Limited to 6 students.
Prerequisite: THETR 250 or 362 or permission of instructor. E. Intemann. Concentrates on designing lighting for different genres of performance in various venues. Emphasis is placed on developing both the visual sophistication and the technical artistry of the lighting designer. Commitment, personal style, and professional presentation are stressed.

## THETR 464(4640) Scene Design Studio II

 (LA-AS)Spring. 3 credits. Prerequisite: THETR 364 or permission of instructor. Students are required to purchase materials that instructor will specify (approx. cost $\$ 50$ ). K. Goetz.

Projects and activities are tailored to the creative and developmental needs of the individual student with emphasis on developing professional standards and practices that would prepare the student for a major design assignment in the department production season.

## Technology

## THETR 252(2520) Technical Production

## Studio I

Fall. 3 credits. Limited to 6 students D. Hall and F. Sellers.

Stage Lighting and Sound Technology: the practical aspects of lighting and sound technology including equipment setup, engineering, electrics, organization, recording techniques, and production paperwork are explored through projects, lectures, and class discussions. In addition to twice-weekly class meetings the course requires a laboratory commitment of 50 hours for the semester.

## THETR 256(2560) Technical Production

 Studio IISpring. 3 credits. Limited to 6 students. Students are required to purchase materials that instructor will specify (approx. cost $\$ 15$ ). Prerequisite: THETR 250 or permission of instructor. Additional handson time in prop and paint shops required, to be discussed. C. Seakatz and

## T. Ostrander.

Scene Painting: introduction to the basic techniques of painting scenery, including but not limited to the layout and painting of bricks, marble, stone, and wood grain for the theatre. Individual projects in scene painting and participation on paint crew for productions are included.
Stage Properties: introduction to the processes of propmaking, including furniture construction and upholstery techniques, use of shop tools and materials, period research, and painting and finishing.

## THETR 340(3400) Theatrical Drafting and

## Technical Drawing Studio

Fall. 3 credits. Limited to 5 students.
Prerequisite: permission of instructor.
S. Brookhouse.

Implementation of the fundamentals of drafting and technical drawing. Introduction of the concept of an individual style in the approach to drafting for the theatre. Involves a series of projects to familiarize students with the convention and process of visualization and drafting, using both mechanical drafting techniques and AUTOCAD.

## THETR 352(3520) Themed Entertainment: The Technical <br> Perspective

Fall. 3 credits. Limited to 12 students. R. Archer.

Exploration into the integration of art and science in today's theme parks and interactive entertainment attractions. Papers, projects, and discussions deal with planning and development aspects of large-scale entertainment projects including architecture, engineering, construction, and attraction installation. Focus is on the specialized
entertainment technologies that make these attractions work: audio and lighting design, ride and show control systems, and special effects.

## THETR 354(3540) Stagecraft Studio

Fall. 3 credits. Prerequisite: FHETR 250 or permission of instructor. Highly recommended: concurrent enrollment in at least 1 credit of THETR 151 or 251. R. Archer.

Exploration of the techniques and practice of theatre operation, scenic construction, stage mechanics, rigging, painting, and model building

## THETR 356(3560) Costume Construction

 StudioSpring. 3 credits. Highly recommended:
concurrent enrollment in at least 1 credit of THETR 151 or 251 . Lab fee: $\$ 100$ (paid in class). R. MacPike.
Project/lecture/discussion class in costume research, patterning, cutting, construction, and fitting.

## THETR 360(3600) Costumes: Special Projects

Fall. 3 credits; may be repeated for credit. Prerequisite: permission of instructor. Lab fee: $\$ 150$ (paid in class). R. MacPike. Designed for students who have completed a basic construction class (in THETR or TXA, or another department). Each fall, this projectoriented course focuses on one of the following areas of costume crafts: millinery, fabric modification, or mask making. Students should check with the instructor to find out each fall which topic is being offered.

## Stage Management

THETR 153(1530) Stage Management Production Laboratory I (also DANCE 153[1630])
Fali and spring. 1-2 credits; may be repeated for credit. Before registering, students must attend orientation meeting at 7:30 P.M. in Kiplinger Theatre at Schwartz Center on first Tuesday of classes. Prerequisite: permission of instructor. P. Lillard.
Practical experience in theatrical production as assistant stage manager for a dance theatre concert or as a stage manager for readings, Black Box lab productions, or SLTC under the supervision of the faculty production manager. THETR 370 complements this course.

## THETR 253(2530) Stage Management

 Laboratory II (also DANCE 253[2630]Fall and spring. 1-5 credits; may be repeated for credit. Before registering, students must attend orientation meeting at 7:30 P.M. in Kiplinger Theatre at Schwartz Center on first Tuesday of classes.
Prerequisite: permission of instructor. P. Lillard.

Practical experience in theatrical production as assistant stage manager for a season production under the supervision of the faculty production manager. THETR 370 complements this course.

## THETR 353(3530) Stage Management

 Laboratory IIIFall and spring. 1-4 credits; may be repeated for credit. Before registering, students must attend orientation meeting at 7:30 p.M. in Kiplinger Theatre at Schwartz Center on first Tuesday of classes. Prerequisite: permission of instructor. P. Lillard.

Practical experience in theatrical production as stage manager for a dance theatre concert or an AUTP production under the supervision of the faculty production manager. THETR 370 complements this course.

## THETR 370(3700) Stage Management

 StudioFall. 2 credits. Prerequisite: THETR 250 or 280 or permission of instructor. Students are required to purchase materials that instructor will specify (approx. cost $\$ 10$ ). P. Lillard.

Introduction to the concepts and techniques of stage management as they relate to specific areas of production. Development of relevant communication skills and an understanding of the production process as experienced by a working stage manager or assistant stage manager. THETR 153, 253, and 353 complement this course.

## THETR 453(4530) Stage Management

 Laboratory IVFall and spring, 1-5 credits; may be repeated for credit. Prerequisite: admission to Advanced Undergraduate Theatre Program. P. Lillard.
Practical experience in theatrical production as stage manager for a season production under the supervision of the faculty production manager.

## Production Laboratories

## THETR 151(1510) Production Laboratory

 I (also DANCE 151[1610])Fall and spring. 1-3 credits; may be repeated for credit. No prerequisites or experience required. Orientation meeting at $7: 30$ p.m. first Tuesday of classes each semester in Kiplinger Theatre at Schwartz Center. P. Lillard, S. Brookhouse, and F. Sellers.

Provides practical experiences in theatrical production. Students can work on scenery, costumes, properties, lighting, or stage crew

## THETR 251(2510) Production Laboratory

 II (also DANCE 251[2610])Fall and spring. 1-3 credits; may be repeated for credit. Prerequisite: permission of instructor. Orientation meeting at 7:30 P.M. on first Tuesday of classes each, semester in Kiplinger Theatre at Schwartz Center. P. Lillard, D. Hall,
F. Sellers, and R. MacPike.

Practical experience in theatrical production, as a light board operator, sound board operator, video operator, sound technician, head dresser or scenery/props special project.

## THETR 351(3510) Production

## Laboratory III

Fall and spring. 1-3 credits; may be repeated for credit. Prerequisite: permission of instructor. P. Lillard,
R. Archer, S. Brookhouse, K. Goetz,
D. Hall, E. Intemann, and F. Sellers.

Practical experience in theatrical production as a master electrician, assistant technical director, assistant costume shop manager, or assistant to a faculty or guest director or designer.

## THETR 451(4510) Production

## Laboratory IV

Fall and spring. 1-4 credits; may be repeated for credit. Prerequisite: admission • to Advanced Undergraduate Theatre Program. P. Lillard, R. Archer,
S. Brookhouse, K. Goetz, D. Hall, and E . Intemann.

Practical experience in theatrical production, in the position of designer, shop manager, technical director, or sound engineer.

## Independent Study, Internships, and Honors

## THETR 30013000) Independent Study

Summer, fall, or spring. 1-4 credits. Independent study in the theatre allows students the opportunity to pursue special interests not treated in regularly scheduled courses. A faculty member, who becomes the student's instructor for the course, must approve the student's program of study and agree to provide continuing supervision of the work. Students must prepare a proposal for independent study, which is available in 225 Schwartz Center.

## THETR 485(4850) Undergraduate Internship

Fall, spring, or summer. 1-3 credits. To be eligible to enroll and receive credit for an internship, students must either be majors or be concentrators in the department. Students are responsible for arranging their own internships in consultation with the faculty in their area of choice before preregistration for the semester in which the internship is planned to take place. To receive credit within this course, the internship must be unpaid. Students must follow the rules and procedures stated in the departmental internship form.

## THETR 495(4950) Honors Research

 TutorialFall or spring. 4 credits. Prerequisite:
honors students in theatre
First of a two-semester sequence (the second is THETR 496) for seniors engaged in an honors project
THETR 496(4960) Honors Research Tutorial
Fall or spring. 4 credits. Prerequisite: honors students in theatre.
Second of a two-semester sequence (the first is THETR 495) for students engaged in an honors project.

## Film

D. Fredericksen (director of undergraduate studies in film), S. Haenni, M. Rivchin, A. Villarejo (on leave 2007-2008)

The study of film began in this department in the 1930 s and continues to be based here. In the intervening years, however, it has also spread into a significant number of other departments in the College: Africana studies, anthropology, Asian studies, comparative literature, English, German studies, government, history, psychology, Romance studies, and women's studies. This proliferation of courses has been accompanied by a comparable proliferation of perspectives and faculty concerns, e.g., the relationship of national cinemas to national literatures and specific cultures, film's relationships to myth and ideology, the use of film as historical evidence, film's efficacy as a rhetorical medium, and film's contribution to perennial issues in aesthetics, the history of the arts, and studies in cognition. However, foundational courses in film production and in the history, theory, and criticism of film as an art are centered in this department.

This richness of courses and perspectives is matched by the ways in which students may make film the focus of their undergraduate studies. The three ways currently being used are: (1) majoring in film within the Department of Theatre, Film, and Dance; (2) constructing an'individually tailored Independent Major in film (including the possibility of placing film in tandem with another medium or discipline); and (3) focusing on film as a College Scholar. Students interested in options 2 or 3 should consult both Don Fredericksen (director of undergraduate studies in film) and the director of the College Scholar Program or the director of the Independent Major program. Students interested in the first option should consult Don Fredericksen (director of undergraduate studies in film). In addition, students should be aware that the college has recently approved a five-course concentration in visual studies, which can be taken independently of, or in conjunction with, a major in film. Students interested in the visual studies concentration should contact its director, Shirley Samuels, in the Department of Art History and Visual Studies.

## Film Major Requirements

The department's film major requires a total of 50 credits in film and related courses. Students should note that a number of film coursesincluding two required "core" courses: (FILM 375 and 376 )-are offered in alternating years This means that students cannot fulfill the requirements for the major in less than two years and that they should plan accordingly, in consultation with their major advisor. In particular, students must plan to be in residence at Cornell during the fall semesters of both their junior and senior years to take FILM 375 and 376. Within the "core" required courses, FILM 274, Introduction to Film Analysis, is to be taken during the sophomore year. Note: Prospective majors must earn a grade of B (not B-) or higher in FILM 274 to be accepted into the major. Students may not enter the major until they have completed FILM 274 in the fall semester of their sophomore year.

Majors wishing to use the production courses in a substantial manner must plan carefully and work within certain limits. These courses are FILM 324, 377, 383, 422, 477, 478, 493. Enrollment in each of these courses is limited by the nature of the work and by facilities. Enrollment in FILM 422, 477, 478, and 493 depends on the quality of previous work in FILM 377 and/or 383; enrollment is not guaranteed. Majors without a strong interest in production can complete the production requirement with one course: FILM 377, after they have taken FILM 274 in their sophomore year. The total credits in production courses cannot exceed 20 hours; this limit is strictly enforced

1. A core of four film courses:

FILM 274 Introduction to Film
Analysis (offered every fall semester)
[FILM 375 History and Theory of Commercial Narrative Film (offered alternate fall semesters; next offered fall 2008 (prerequisite for film majors: FILM 274)]
FILM 376 History and Theory of Documentary and Experimental Film (offered alternate fall semesters;
offered fall 2007) (prerequisite for Film majors: FILM 274)

FILM 377 Introduction to 16 mm and Digital Filmmaking (offered fall 2007, spring 2008, and fall 2008; not offered spring 2009)
2. One of the following theatre courses:

THETR 250 Fundamentals of Theatre Design/Technology (offered every semester)

THETR 280 Introduction to Acting (offered every semester)
THETR 398 Directing I
(prerequisite: permission) (offered every fall semester)
3. Four courses ( $15-16$ credits) in film offered by Theatre, Film and Dance as below, or (with permission of advisor) by other departments:
[FILM 265 Studies in Film Analysis:
Hitchcock's Films (offered fall 2008) 4]
FILM 276 Survey of American Film (offered fall 2007)

FILM 329 Political Theory and Cinema (offered spring 2008)
FILM 305 (also AM ST 305) Americans Abroad (offered spring 2008)
FILM 344 American Film Melodrama (offered spring 2008)
[FILM 346 Film Noir (offered occasionally)

FILM 369 Fast-Talking Dames and Sad Ladies: 1940s and Now (offered yearly; offered spring 2008)
[FILM 378 Soviet Film of 20s and French Film of 60 s (offered occasionally)]
FILM 379 Modern Documentary
Film (offered alternate spring semesters; offered spring 2008)
FILM 383 Screenwriting (offered spring 2008)
[FILM 386 Cinema and Social Change (offered occasionally; next offered 2008-2009)]
FILM 393 International Film of the 1970s (offered fall 2007)

FILM 395 Video: Art, Theory, Politics (offered occasionally)
[FILM 422 Cinematography (offered spring 2009)

AS\&RC 435 African Cinema (offered spring 2008)
[FILM 455 History of Modern Polish Cinema (next offered spring 2009)
[FILM 473 Film and Spiritual Questions (offered alternate spring semesters; next offered spring 2009)
FILM 474 Jung, Film, and the Process of Self-Knowledge (offered alternate years; offered spring 2008)
[FILM 475 Seminar in the Cinema I (offered most years; next offered 2008-2009; topic varies; may be repeated for credit]
[FILM 476 Seminar in the Cinema II (offered occasionally; topic varies; may be repeated for credit]
FILM 477 Intermediate Film and Video Projects: Documentary and Experimental Workshop (offered alternate years; offered fall 2007)
[FILM 478 Intermediate Film and
Video Projects: Narrative Workshop (offered alternate years; offered fall 2008)]

FILM 493 Advanced Film and
Video Projects (offered spring 2008)
4. 15 credits of related course work inside or outside the Department of Theatre, Film and Dance (as approved by the major advisor). The courses chosen to fulfill this requirement should reinforce a major's particular interest in film and will not necessarily be film courses per se. For example, a student interested in the psychology of film, or in ethnographic film, or in film vis-ă-vis intellectual or social history, or in film and social change will be encouraged to choose related course work in those areas.
5. Students must earn at least a B (not B-) in FILM 274 to enter the major. In all subsequent courses used for the major a grade of C (not C -) must be achieved. Courses in which these minimums are not achieved must be repeated if the student is to receive credit in the major.
6. Course work in production cannot exceed 20 credit hours

## 4 Honors

Students who have maintained a GPA of 3.7 in their film major courses, and an average of 3.2 in all courses, may elect to work for honors in film during their senior year. They must consult with their advisor in the spring of their junior year about the honors program in film. Honors projects are possible in filmmaking and film analysis (history, criticism, theory). Projects in filmmaking require written analytical component related to the creative work

## The Advanced Undergraduate Filmmaking Program

The department offers advanced study in filmmaking to students who qualify on the basis of outstanding achievement in film studies and film production courses. Acceptance to the AUFP and admission to the advanced film production course (FILM 493) will be determined by a committee of film faculty in December of each year, based on applications from students who have a proposal (script or treatment) for a film or video project.

## Film Study Abroad

The College of Arts and Sciences, through this department and in concert with a number of other American colleges and universities, offers up to a full year of study at the Paris Center for Critical Studies and, through the er, at the University of Paris III. The center's film program is theoretical, critical, and historical. It is most useful to students whose major interest is in the academic study of film and serves as a complement to Cornell's film courses. Fluency in French is
required. FILM 274 and 375 are prerequisites. Inquiries should be addressed to Professor Fredericksen, Cornell's liaison with the center.

## Computing in the Arts Undergraduate Concentration

A concentration in Computing in the Arts with an emphasis on film is available both to film majors and to students majoring in other subjects. For more information, see "Computing in the Arts Undergraduate Concentration" under "Departments, Programs and Courses" in the "College of Arts and Sciences," or contact the Director of Undergraduate Studies in Film.
[FILM 265(2650) Studies in Film Analysis: Hitchcock's Films (also ENGLFGSS 263[2630]) (LA-AS)
Fall. 4 credits. Next offered 2008-2009. L. Bogel.

For description, see ENGL 263.]
FILM 274(2740) Introduction to Film Analysis: Meaning and Value (also FILM 674[6740], VISsT 274/674[2174/8740]) (LA-AS)
Fall. 4 credits. Limited to 40 students. Graduate students must enroll in FILM 674. D. Fredericksen.

Intensive consideration of the ways films generate meaning and of the ways we attribute meaning and value to films. Discussion ranges over commercial narrative, art cinema, documentary, and personal film modes. Prospective film majors should enroll in their sophomore year.

## FILM 276(2760) Survey of American Film (also AM ST 230[2760], VISST

 230[2300]) (LA-AS)Fall. 4 credits. Required film screenings; discussion once a week. Offered alternate years. S. Haenni.
For description, see AM ST 230.

## FILM 293(2930) Middle Eastern Cinema (also NES 293[2793], COM L 293[2930], JWST 291[2793], VISST 293[2193]) (LA-AS)

Fall. 4 credits. D. Starr.
For description, see NES 293.

## FILM 305(3050) Americans Abroad (also AM ST 305[3050], ENOL 352[3520], VISST 306[3605])

Spring. 4 credits. S. Haenni.
For description see AM ST 305.

## [FILM 324(3240) Animatlon Workshop:

 Experimental and Traditional Methods (LA-AS)Summer. 3 credits. Cost for equipment:
$\$ 150$. L. Tomlinson.
The art of animation involves many dimensions, including time and motion. This course introduces students to the fundamentals of traditional animation and the mechanics used to capture the illusion of movement. By modeling the projects on the work of artists who have pushed the potential of animation in new directions, students investigate innovative ways of animating sequential images and objects. Emphasizing tactile processes-drawing, sculpting, and painting-and recording the images, we create to capture movement and expression students explore a variety of experimental and fine-arts approaches used in modern-day animation.
[FILM 325(3250) Animation History and Practlce (LA-AS)
Summer. 3 credits. Limited to 12 students. Equipment fee: $\$ 75$. Next offered summer 2008. M. Tomlinson.

Beginning with the pre-history of animation, optical toys and magic lantern projections, and continuing through a century of animation history to contemporary work, this course investigates the history of animation from around the world, through a variety of handson production projects, as well as lectures, discussions, research, and screenings. Combining tactile and digital methods, students create weekly collaborative and individual animated films, incorporating lessons from the historical work studied.

FILM 329(3290) Political Theory and Cinema (also GERST 355[3550]) (CA-AS)
Spring. 4 credits. G. Waite.
For description, see GERST 355.
[FILM 341(3410) French Film (also FREN 336[3360]) (LA-A5)
Fall. 4 credits. Offered occasionally; next offered 2008-2009. T. Murray.]

## FILM 344(3440) American Film

 Melodrama (also AM ST 338[3440], ENGL 344[3440], VISST 345[3645]) (LA-AS)Spring. 4 credits. Recommended: some
background in film analysis. S. Haenni. Melodrama has often been dismissed as overwrought with emotion, moralizing, and sensationalism. Film studies, however, has reconceptualized melodrama as an intriguing "mode of excess" which powerfully and profoundly affects film audiences. In this course will examine how and to what purposes melodrama has been used in the U . S. context. We will look at different aspects of melodrama-its inheritance from 19th-century stage melodrama, its pictorialism, acting style, music; its uses of paranoia, entrapment, and fast-paced action. We will consider the form and function of melodrama in different periods-1950s America, the early 20th century, the Jazz Age, the economic Depression of the 1930 s, World War II, the contemporary moment. And we will ask questions such as: How does melodrama position and affect its spectators? How does it allow space for the representation of marginalized voices (of women and African Americans, for example)? How does it allow us to understand the nation? How does it address questions of social justice? How has melodrama been viewed and appropriated by oppositional audiences and fan cultures? What are the implications of film style for melodrama, and why is music so important to the genre? Screenings will include films by Griffith, Vidor, Cukor, Hitchcock, Ophuls, Sirk, Ray, Spielberg, and others and will be guided by readings in film history and film theory.

## [FILM 346(3460) FIIm Noir (also AM ST 348[3480], VISST 348[3480]) (LA.AS)

Spring. 4 credits. Recommended: some course work in film. Offered occasionally; next offered 2008-2009. S. Haenni.
Focuses on Hollywood films of the 1940s1950s known for their stylishness and commentary on the dark side of American life, and on "neo-noir" from the 1970s to the present. Considers stylistic aspects and cultural contexts

FILM 369(3690) Fast-Talking Dames and Sad Ladies: 1940s and Now (also ENGL/FGSS 369[3690]) (LA.AS)
Fall. 4 credits. L. Bogel.
For description, see ENGL 369.
[FILM 375(3750) History and Theory of the Commercial Narrative Film (also VISST 375[3175]) (LA-AS)
Fall. 4 credits. Prerequisite for film majors FILM 274. Offered alternate years; next offered 2008-2009 and 2010-2011. Fee for screening expenses, $\$ 10$ (paid in class). S. Haenni.

A survey of narrative cinema from around the word, with emphases on early narrative cinema, cinematic realism, interwar European modernist cinema, popular American film, post-World War II art cinema, and recent global cinema.]

## FILM 376(3760) History and Theory of Documentary and Experimental Film

 (also VISST 376[3176]) (LA-AS)Fall. 4 credits. Highly recommended: FILM 274. Offered alternate years. Fee for screening expenses: $\$ 10$ (paid in class). D. Fredericksen.

Analyzes canonical works in documentary film up to the end of World War II, including films by Vertov, Flaherty, Grierson, Hurwitz, Grierson, Wright, Capra, Riefenstahl, and the connection between documentary film and modernism(s) in the 1920s and 1930s. Also includes analysis of canonical works in the avant-garde/experimental/personal film tradition(s) in Europe and the United States from the 1920s to the 1980s, including French impressionism, surrealism, the New Realism, graphic cinema, and the several patterns of the American personal film during its heyday (1940s to the late 1970s).

## FILM 377(3770) Introduction to 16 mm

 and Digltal Filmmaking (LA-AS) Fall 2007, spring 2008 , and fall 2008. 4 credits. Limited to 12 students. Intended for juniors and seniors (who may need to sign up a year or more in advance), with priority given to film majors. Prerequisite: FILM 274 (or higher-level film studies course) and permission of instructor. Equipment fee: $\$ 150$ (paid in class). Average cost to each student for materials and processing is $\$ 500$. M. Rivchin.Creative, hands-on production course in
filmmaking, emphasizing the development of original ideas and the acquisition of basic technical skills in both 16 mm and miniDV formats: cinematography, lighting, sound recording and editing, and film and non-linear digital editing. Students complete several exercises and two short projects; the final project may be narrative, documentary, experimental, or animation and is shown in a public screening at the end of the semester on campus.

## [FILM 378(3780) Soviet Film of the 1920s

 and French Film of the 1960s (LA-AS)Spring. 4 credits. Fee for screening expenses: $\$ 10$ (paid in class). Highly recommended: FILM 375. Offered
occasionally. D. Fredericksen.
Intensive treatment of two distinct periods of radical innovation in film theory and history. Emphasis is on the animated relationship between theory and filmmaking during these two decades.]

FILM 379(3790) Modern Documentary Film (LA-AS)
Spring. 4 credits. Highly recommended: FILM 376. Fee for screening expenses: $\$ 10$ (paid in class). Offered alternate spring semesters. D. Fredericksen.
An intensive consideration of canonical documentary films from 1945 to the present. Emphases are on the documentary film as an artistic form with a distinct history and set of theoretical questions, as a sociopolitical force, as an ethnographic medium within and without a filmmaker's culture, and as a televised medium of persuasion and expression.

## FILM 383(3830) Screenwriting (LA-AS)

Spring. 4 credits. Limited to 12 students. Prerequisite: completed application, writing sample, and permission of instructor Students must go to 225 CT to apply. Staff. This course explores the fundamentals of traditional Hollywood and independent screenplays.

## [FILM 386(3860) Cinema and Soclal

 Change (LA-AS)Spring. 4 credits. Next offered 2008-2009. A. Villarejo.

Explores the role of cinema in social and political change that address processes of decolonization as well as issues of labor, health-care, gender and racial equity, globalization, war, and imperialism.]
FILM 393(3930) Internatlonal FIIm of the 1970s (also AM ST/VISST 393[3930]) (LA-AS)
Fall. 4 credits. Recommended: some background in film analysis. S. Haenni. More than being characterized by a retreat from political, critical cinema and by the reemergence of the Hollywood blockbuster such as The Godfather, Star Wars, and Jaws, the 1970s was also a period of enormous innovation and cross-fertilization in film history and film style. Profound changes in the film industry and film technology, along with larger social, political, and cultural developments, enabled new ways of understanding-and using-the cinematic image as well as film sound. In this course, we focus on the transnational nature of seventies film: the influence of European art cinema on American film; the reworking and rejuvenation of American film genres (neonoir, western, horror film, the road movie); European responses to and appropriation of American film genres, film conventions, and subject matter; Asian influences in the United States, particularly the martial arts film; and the emergence of film subcultures, such as black independent film and blaxploitation. Screenings may include work by directors such as Robert Altman, Francis Ford Coppola, Michelangelo Antonioni, Rainer Werner Fassbinder, and Charles Burnett and are guided by readings in film criticism and film history.
[FILM 422(4220) Cinematography (LA-AS) Spring. 4 credits. Limited to 8 students. Pre- or corequisite to FILM 493.
Prerequisite: permission of instructor. Letter grades only. Equipment fee: $\$ 150$.
Advanced camera and lighting techniques, designed for students who have taken at least FILM 377 and/or advanced
photography courses or computer
animation courses. Next offered 2008-2009. M. Rivchin.

Students work on a series of tests, short
exercises, and scene projects using sync and
non-sync 16 mm cameras, digital video cameras, camera movement apparatus, lighting instruments, a range of lighting instruments, filters, and gels and digital video cameras to expand their knowledge of the technical and aesthetic aspects of cinematography.]

## [FILM 430(4300) Topics in American

 Studies: The Cinema and the American City (also AM ST 430.10, VISST 430[4630]) (CA-AS)Fall. 4 credits. Weekly screenings TBA.
Next offered 2008-2009. S. Haenni.
The emergence of the cinema in the late-19th century coincided with the emergence of a new kind of metropolis, characterized, among other things, by new traffic systems (elevated train, subway, automobile), new racial, ethnic, and sexual regimes, and new urban planning. The cinema was inevitably affected by the ways in which the city developed, while at the same time it also made the city legible. In this course, we will examine how American cities and towns have been represented in film in different ways, as, for instance, musical symphonies, mysteries to be deciphered, or post-apocalyptic wastelands. We will explore how gender, racial, ethnic, class and sexual identities are negotiated in the modern, cinematic city. Screenings will range from silent and early sound films, such as The Crowd and 1930s musicals, to contemporary cinema, such as Do the Rigbt Thing and Blade Runner. Our viewings will be guided by readings in film and urban theory and history.]

## [FILM 455(4550) History of Modern

 Polish Film (LA-AS)Spring. 4 credits. Prerequisite: some film analysis course work. Next offered 20082009. D. Fredericksen.

Analysis of Polish film from 1945 to the present, within the context of Poland's postwar history. Topics include the period of socialist realism, the so-called "Polish School" (1956-1962), the cinema of moral anxiety, Solidarity cinema, and the Polish documentary tradition. Key directors considered include Ford, Wadja, Munk, Polanski, Skolimowski, Zanussi, Falk, Piwowski, Bugajski, Krzystek, Kijowski, Zaorski, Kieslowski, and Lozinski. Some attention is given to the development of Polish film theory. The extra-filmic context is set by such works as Norman Davies' Heart of Europe, Czeslaw Milosz' The Captive Mind, and Eva Hoffman's Exit into History.]

## [FILM 473(4730) Flim and Spiritual Questions (LA-AS)

Spring. 4 credits. Limited to 20 students. Offered alternate years; next offered 20082009. D. Fredericksen.

The use of film as a medium for the expression of spiritual questions has a long and rich history, although little attention is given to this fact in contemporary film studies. This seminar examines films and writings by filmmakers who are so inclined, including Baillie, Gardner, Bergman, Dreyer, Bresson, Gibson, Brakhage, Belson, Whitney, Rouquier, Newby, Kubrick, and Bae Yong-Kyun. Special attention is given to the work of Andrey Tarkovsky, the Russian film director and theorist. Readings include Tarkovsky's Sculpting in Time, Smith's Why Religion Matters, Eliade's The Sacred and the Profane, Edinger's The Christian Archetype, and Schrader's Transcendental Style in Film.]

## FILM 474(4740) Jung, Film, and the Process of Self-Knowledge (LA-AS)

Spring. 4 credits. Limited to 20 students.
Offered alternate years. D. Fredericksen.
"Know thyself" is one of the oldest and most enduring imperatives of the human spirit, and the raison d'être for liberal studies. This seminar traces in some detail the Jungian approach to this imperative and then tests its critical capacities with respect to films.

## [FILM 475(4750) Seminar in Cinema (LA-AS)

Fall. 4 credits. Next offered 2008-2009.]
FILM 476(4760) Seminar In the Cinema II (LA-AS)
Fall or spring. 4 credits. Offered occasionally.
FILM 477(4770) Intermedlate Film and Video Projects: Documentary and Experimental Workshop (also VISsT 477(4770]) (LA-AS)
Fall. 4 credits. Limited to 8 students. Prerequisites: FILM 377 as minimum production; priority given to those who have taken FILM 376, 379, or 386 and permission of instructor based on project proposals. Equipment fee: $\$ 150$ (paid in class). Film projects costs: $\$ 300-\$ 1,500$; video: $\$ 100-\$ 400$. M. Rivchin.
Intensive course in 16 mm filmmaking and digital video in which each student develops a significant documentary or experimental project both critically and creatively. Readings, discussions, and exercises are designed to increase the student's knowledge and practice of: cinematography, lighting, sync-sound filming, and editing techniques; working with labs; digital video camera; and nonlinear (Final Cut Pro and AVID) digital editing.
[FILM 478(4780) Intermediate Film and Video Projects: Narrative Workshop (LA-AS)
Fall. 4 credits. Limited to 8 students. Prerequisites: FILM 377 as minimum production; priority given to those who have taken FILM 375 or 383: THETR 398 or 413 , and permission of instructor based on proposals. Equipment fee: $\$ 150$ (paid in class). Film projects costs: $\$ 500-1,500$;
video: $\$ 100-200$. Next offered 2008-2009. M. Rivchin.

Intensive course in 16 mm filmmaking and digital video in which each student develops a significant, original narrative script project that he or she then directs, shoots in crews, and edits. Student may opt for narrative documentary or experimental work as well. Readings, discussions, and exercises are designed to increase the student's knowledge and practice of directing; cinematography, lighting, sync-sound filming, and editing techniques; working with labs and sound houses; digital video camera; and digital (Final Cut Pro, AVID, and ProTools) editing.]

## FILM 405(4850) Undergraduate

 InternshipFall, spring, or summer. 1-3 credits. To be eligible to enroll and receive credit for an internship, students must either be majors or concentrators in the department. Students are responsible for arranging their own internships in consultation with the faculty in their area of choice before preregistration for the semester in which the internship is planned to take place. To receive credit within the course, the internship must be unpaid.

Students must follow the rules and procedures stated on the departmental internship form.

## FILCM 493(4930) Advanced Film and Vldoo Projects (LA-AS)

Spring. 4 credits. Limited to 6-8 students. Permission only. Prerequisite: minimum FILM 377, priority given to those who have taken 477, 478, or 324. Recommended: FILM 383 and THETR 398. Equipment fee: $\$ 150$. Project costs: $\$ 500-2,000$. M. Rivchin. Intensive filmmaking course in which students focus on developing and producing a single, already-proposed ( $15-30 \mathrm{~min}$.) 16 mm film or digital video project over the semester. Students direct and edit their own (or collaborative) projects working in crews for sync-sound dialog narrative films or documentaries and in small groups for technical exercises and assisting in non-sync projects. Readings, discussions, and exercises are designed to increase the student's knowledge and practice of script revision; directing; scene breakdowns, auditions, and casting; cinematography, lighting, sync-sound filming, and editing techniques; working with labs and sound houses; digital video camera; and digital (Final Cut Pro, AVID, and ProTools) editing.

## FILM 674(6740) Introduction to Film Analysis: Meaning and Value

Fall. 4 credits. Limited to 10 graduate students. D. Fredericksen.
Intensive consideration of the ways films generate meaning and of the ways we attribute meaning and value to films. Discussion ranges over commercial narrative, documentary, and personal film modes. Graduate students who intend to teach film at the undergraduate level are especially welcome. In addition to full participation in the work of FILM 274, graduate students read and discuss in tutorials primary sources in film theory.

## FILM 722(7220) Independont Study in FIIm for Graduate Students <br> Fall or spring. Staff.

## Related Courses in other Departments

COM L 408 Global Martial Arts Film and Literature. Fall. 4 credits. Liu.
ENGL 469 The Paranoid Style in Contemporary American Film and Fiction. Spring. 4 credits. Attell.

S HUM 421 Cutting and Film Cutting. Spring. 4 credits. Fathy.
S HUM 428 Sensing Thinking. Spring. 4 credits. Kronengold.

## Dance

Faculty: J. Chu, A. Fogelsanger (director of undergraduate studies in dance), E. Intemann, J. Kovar, J. Morgenroth, J. Self, B. Suber.

The dance program offers courses in dance technique, improvisation, composition, performance, anatomical analysis of movement, dance technology, music for dance, and the history, theory, and criticism of dance. Technique courses include introductory dance technique, modern dance at three levels, and Western classical dance at three levels. (Other dance forms, such as Indian dance, and Javanese dance, are offered periodically. A variety of courses in other dance idioms, taken through the Physical Education program, supplement these
offerings.) Technique courses develop strength, flexibility, coordination, and the ability to perceive and reproduce phrases of dance movement with clarity of rhythm, body design, and expression. The more advanced courses require the ability to perform complex phrases in various styles. Students may earn up to 16 academic credits ( 2 each semester) in technique courses. Students may also satisfy the physical education requirement by taking dance technique courses or other movement courses in the dance program. Students taking technique for academic credit must also register through their own colleges. The schedule for all dance technique courses is available in the main office of the Sheila $W$. and Richard J. Schwartz Center for the Performing Arts.
The faculty offer rehearsal and performance workshops in which they choreograph and rehearse original dances, performed in public concert. Admission to rehearsal and performance courses is by permission. Students may receive one academic credit per semester (S-U grades only) when performing in student-faculty concerts by registering for DANCE 155

## Dance Major Requirements

A revised dance major has been approved for implementation in Fall 2006. Students accepted into the major through Spring semester 2006 may choose to meet either the old requirements or the new. Students accepted beginning in Fall semester 2006 must satisfy the new requirements below. Copies of the previous requirements may be obtained from the director of undergraduate studies in dance through Spring 2008.
Prerequisites: 2 credits in category I below and one course in category II below.
Prerequisites count towards the 40 credits fulfilling the major.
The major: 40 credits (towards which the prerequisites for the major count) are required of all students majoring in dance as follows:

1. 6 credits: six 1 -credit movement courses chosen from Dance Technique (DANCE 122, 230, 231, 232, 303, 304, 306, 308, 309), Explorations (DANCE 233, 234), Improvisation (DANCE 201), Indian Dance (307), and other courses approved by the dance faculty. The 6 credits must include at least 2 from Dance Technique courses, and at least 2 from Explorations and Improvisation courses. Any two of these courses taken to satisfy the university's Physical Education requirement may be counted towards the major, thus decreasing the number of academic credits possibly to as low as 38 . Movement courses taken for 0 academic credits do not count towards the major.
II. 14 credits: Dance composition (DANCE 210, 310) and history/theory (DANCE 313, 418).
III. 2 credits: 1 credit of performance (DANCE 155 ) and 1 credit of production (DANCE $151,153,251$, or 253 ).
IV. 18 credits: selected from Dance and related fields, including: at most two 1 -credit movement courses beyond those required in category I; at most four credits in DANCE 151, 153, 155, 251, 253, and 316 beyond those required in category III; and at most two courses outside of Dance, which may include courses on sound,
music, light, non-western movement forms, design, performance and visual studies, and must be approved by the dance faculty. Otherwise any Dance courses may be used to satisfy category IV.

In all courses used for the dance major, a grade of $C$ (not C-) must be achieved. Courses in which this minimum is not achieved must be repeated if the student is to receive credit in the major.
A partial list of courses from outside Dance that may be used to satisfy part IV of the major requirements includes MUSIC 103, 104 105, 107, and 108; and THETR 250.

## Henors

Students who have maintained a GPA of 3.5 in classes for the dance major and an average of 3.0 in all courses may elect to work for honors in dance during their senior year. They must consult with their advisor in the spring of their junior year about the honors program in dance.

## Computing in the Arts Undergraduate Concentration

A concentration in Computing in the Arts with an emphasis on dance is available both to dance majors and to students majoring in other subjects. For more information, see "Computing in the Arts Undergraduate Concentration" under "Departments, Programs and Courses" in the "College of Arts and Sciences," or contact the Director of Undergraduate Studies in Dance, danceprogram@cornell.edu. Information is also online at www.cis.cornell.edu/ ComputingArts/.

## Dance Technique

Students may register for any Western dance technique course (DANCE 122, 230, 231, 232, $303,304,306,308$, and 309) for 0 or 1 academic credit, with a limit of 2 credits per semester and 16 credits total. That is, in a single semester students may take at most two 1-credit dance technique courses; all additional dance technique courses must be taken for 0 credit. All these courses may be repeated for credit, and students will usually be placed in a given course for at least two semesters.
Dance Improvisation (DANCE 201), Explorations in Movement and Performance (DANCE 233), and Indian Dance (DANCE 307) may be taken for 0 or 1 academic credit, which does not count as part of the 2 credit per semester and 16 credits total limit above.
Students also have the option to receive physical education (PE) credit for all the courses above to satisfy the university's physical education requirement. Students may not get Dance and PE credit simultaneously for the same course.
The courses Dance Technique I (DANCE 122), Dance Improvisation (DANCE 201), Explorations in Movement and Performance (DANCE 233), and Indian Dance (DANCE 307) are introductory courses open to all students. Students registering in Dance may pre-enroll, enroll online, or sign up with the Department of Theatre, Film, and Dance registrar in 223 Schwartz before the end of the add period; they will need a drop/add slip. Students registering in PE may pre-enroll, or add during the one- or two-day PE registration before the
first day of classes; afterward, registration is not allowed.
The non-introductory dance technique courses (DANCE 230, 231, 232, 303, 304, 306, 308, and 309) will now allow online pre-enrollment and online enrollment, but the instructor will ultimately use his or her own discretion to determine the right classes for a student to attend. All students, and new students in particular, should be prepared for the possibility of being asked to switch courses during the first few weeks of the semester.
The advanced dance technique courses (DANCE 303, 304, 306, 308, and 309) may be taken with an additional 1 -credit academic component, Writing Dance Criticism (DANCE 316). Students may also receive credit for performing in two ways, by being cast in a faculty-choreographed dance (DANCE 155), and by dancing in student-choreographed works made for composition courses (DANCE 156). Any two 1 -credit dance courses may be aggregated to count as one-half course for the purpose of satisfying the College of Arts and Sciences 34 -course requirement. They do not satisfy a distribution requirement.

## DANCE 122(1200) Dance Technique I

 (also PE 160[1180])Fall and spring. 0 to 1 credit; may be repeated. Satisfies PE requirement if taken as PE. Attendance at dance concerts required. S-U grades only. Fall, J. Kovar,
J. Chu; spring, J. Morgenroth, J. Self. Entry-level class. Covers the fundamentals of elementary dance training. Movement sequences focusing on rhythm, placement, and vitality of performance through an anatomically sound dance technique.

## DANCE 127(1300) Non-Western Dance

## Techniques

Spring. 0 to 1 credits. Staff.
Study and practice of basic movement vocabulary and dances in performance traditions outside of the European and American concert genres of ballet and modern dance. Specific form to be studied will vary. No previous experience in dance is necessary. May be repeated for credit.

## DANCE 155(1250) Rehearsal and

 PerformanceFall and spring. 1 credit. Students must register for course in semester in which credit is earned; requests for retroactive credit are not honored. Prerequisite students cast in faculty-choreographed dances. Students may add this course only after they have been assigned roles. S-U grades only.
Includes the study, development, and performance of roles in departmental dance productions.

## DANCE 156(1500) Dance Performance

 WorkshopFall and spring. 1 credit. Attendance at dance concerts is required. May be repeated. S-U grades only. Fall, B. Suber; spring, J. Chu.
Students learn and perform dances
choreographed by Dance Composition students. Course work includes: rehearsing an average of two hours a week with student choreographers, attending dance composition class (faculty led) once a week for 90 minutes, and possibly performing in departmental
dance productions or mid or end of semester class showings. Students in this course will receive feedback on their performance from
the faculty member teaching the Composition course and from the composition students within class discussion periods, to help them refine their skills as performers (including dynamics, focus, phrasing, rhythm, dramatic presence, etc.) in both classroom and public showing of student work. They will sometimes participate in class discussion of the student compositions, gaining insight into the compositional process. This type of participation will be an introduction to dance composition for students interested in pursuing the composition curriculum.

## DANCE 201(2480) Dance Improviastion

Fall. 1 credit. Limited to 12 students.
Attendance at dance concerts required. S-U grades only. A. Fogelsanger.
When the body knows when, where, and how to move without prior direction, we call that improvisation. This course coaxes inspiration. seeking to make it reliable and to keep it surprising. It offers the possibility of "training" one's movement instincts to respond relevantly and with spontaneity. Solo and group forms are covered. Live musical accompaniment.

## DANCE 230(2200) Dance Technique II

Fall. 0 to 1 credit; may be repeated. S-U
grades only. Satisfies PE requirement if
taken as PE. Attendance at dance concerts
required. Fall, J. Self.
Introductory dance technique intended for students with some dance training. Material covered includes attention to rhythm, design, and movement expression.
[DANCE 231(2210) Dance Technique II/] Classical (wlso PE 161)
Spring. 0 to 1 credit; may be repeated. Satisfies PE requirement if taken as PE. Attendance at dance concerts required. S-U grades only. Next offered 2008-2009. B. Suber.

Introductory Western classical technique intended for students with some dance training. Includes basic barre and centre work focusing on presence and presentation.]
DANCE 232(2220) Dance Technique II/ Modern (also PE 162)
Spring. 0 to 1 credit; may be repeated. S-U grades only. Satisfies PE requirement if taken as PE. Attendance at dance concerts required. J. Kovar.
Introductory modern technique intended for students with some dance training. Material covered includes specific spinal and center work with attention to rhythm, design, and movement expression.
DANCE 233(2410) Explorations in Movement and Performance (also PE 163, VISST 233[2533])
Spring. 0 or 1 credit. Limited to 16
students. Satisfies PE requirement if taken as PE. Attendance at dance concerts required. S-U grades only. J. Self. A physically demanding exploration into various movement realms. Specific subjects covered are genderized movement, erotic power, spiritual power, ritual, and performance. Techniques include extensive use of breath, animal movement, improvisation, and group games. This course requires an eagerness to investigate the nature of performance and explore unfamiliar territory in movement.
[DANCE 234(3410) Explorations in Movement and Performance Il: Masculine, Feminine, or Neutral Spring. 0 or 1 credit. Limited to 16 students. Prerequisite: DANCE 201, 233, or permission of instructor. Satisfies PE requirement if taken as PE. Attendance at dance concerts required. S-U grades only. Next offered 2008-2009. J. Self.
Continues themes from Explorations in Movement and Performance (DANCE 233), with special emphasis on the differences and similarities between "masculine" or "feminine" expressions in movement and performance.]
DANCE 235(2430) Hip-Hop, Hollywood, and Home Movies: Exploring Movement and Media (also PE 164, VISST 235[2430])
Fall. 3 credits. Permission of instructor. Letter grades. Requirements include attendance at performances with written responses, selected readings, and homemovie production. J. Self.
This course is a laboratory for generating and exploring contemporary dance forms. Monday sessions are devoted to viewing media and discussion. We will be looking at early B-boy films, recent dance-battle documentaries, classic dance clips from Hollywood films, and other related pieces (Black Dance, Show Dance, Art Dance). Wednesday is a laboratory for trying out movements and creating simple dance/music videos (home-movies). This course will be of special value for choreographers using popular dance forms and those interested in the history of popular culture. Everyone must be willing and able to improvise dance moves, teach classmates and exchange movement ideas.
[DANCE 236(2450) Public Voice and Civic Gesture (also THETR 236[2360], VISST 236[2360])
Fall. 1 credit. Next offered 2008-2009. B. Suber and B. Milles.

This course combines acting and movement techniques encouraging process-oriented work. Focusing on performance in civic spaces, the class works to examine the politics of status and the social role of bodily (including vocal) expression of both performer and audience. Working within the specific context of urban public spaces, the class will question the function of monument and the character of urbanism in relation to individual bodies while understanding how these bodies combine to create a body politic. The class will consider traditional tools of political and social satire, including Commedia dellarte Fundamental in commedia is the exploration of status, the gradations of power and influence and role-playing. Students will create their own texts and movement as well as draw from other textual and visual sources. The class will conclude with a public performance.]

## DANCE 303(2240) Dance Technique Workshop (also PE 165, VISST 303[3503])

Spring. 0 to 1 credit; may be repeated.
Satisfies PE requirement if taken as PE. Attendance at dance concerts required. S-U grades only. Requirements include attendance at performances with written responses. J. Self.
Primarily Parallel Universe. The course will explore working primarily in parallel position as a basic technique for strengthening the legs, posture and physical presence by blending movements from Modern Dance, Jazz, Hip

Hop, Yoga and other related forms. Students must be willing to experiment with new concepts of constructing movement techniques.]

## DANCE 304|3210) Dance Technique III/ Classical (also PE 166)

Fall and spring. 0 to 1 credit; may be repeated. Satisfies PE requirement if taken as PE. Attendance at dance concerts required. S-U grades only. B. Suber. Intermediate Western classical technique Work is done on strengthening the body through a movement technique emphasizing presence and musicality based on harmonic muscular control.

## DANCE 306(3220) Dance Technique III/

 Modern (also PE 167)Fall and spring. 0 to 1 credit; may be repeated. Satisfies PE requirement if taken as PE. Attendance at dance concerts required. S-U grades only. Fall,
J. Morgenroth; spring, J. Chu.

Intermediate modern technique focusing on rhythm, placement, and phrasing for students who are prepared to refine the skills of dancing. Students are challenged by complex phrases and musicality.
DANCE 308(4220) Dance Technique IV/ Modern (also PE 168, VISST 308[3508])
Fall and spring. 0 to 1 credits; may be repeated. Satisfies PE requirement if taken as PE. Attendance at dance concerts required. S-U grades only. Fall, J. Chu; spring, B. Suber
Advanced and pre-professional Modern technique. A continuation of and supplement to DANCE 306

## DANCE 309(4210) Dance Technique IV/

 Classical (also PE 169)Fall and spring. 0 to 1 credit; may be repeated. Satisfies PE requirement if taken as PE. Attendance at dance concerts required. S-U grades only. B. Suber.
Advanced and pre-professional Western
classical. A continuation of and supplement to DANCE 304.

## DANCE 316|3240) Writing Dance Criticlsm

Fall and spring. 1 credit; may be repeated Corequisite: DANCE 303, 304, 306, 308, or 309. Attendance at two or three concerts required. Fall, J. Chu, B. Suber, and J. Morgenroth; spring, J. Chu, B. Suber, and J. Self.

Dance criticism for incorporation with technique. Topics rotate depending on instructor, class focus, and relevance to guest dance companies. Attendance at two or three concerts required (same as for dance technique), additional readings and/or viewing of recorded performances as assigned by instructor, and three five- to seven- page analytic papers.

## DANCE 355(3250) Repertory

Spring. 0 or 1 credit. Prerequisite: permission of instructor. Attendance at dance performances required. J. Chu. Reconstructs a dance by an important modern dance choreographer. Through a close examination of the composition process, and with readings, the course studies the historical and aesthetic role of this work and its continued influence today.

DANCE 407(4399) Early Dance (also MUSIC 407[4511])
Fall. 1 credit. R. Harris-Warrick.
For description, see MUSIC 407.

## Dance Composition

DANCE 210(2500) Beginning Dance Composition (also VISST 211[2711]) (LA-AS)
Fall and spring. 3 credits. Attendance at dance concerts required. Fall, B. Suber; spring, J. Chu.
Weekly assignments in basic elements of choreography. Students compose and present short studies that are discussed and reworked. Problems are defined and explored through class improvisations. Informal showing at end of semester. Includes informal showing of work.

## DANCE 310(3500) Intermediate Dance

 Composition I (LA-AS)Fall and spring. 3 credits. Prerequisite:
DANCE 210. Fall, B. Suber; spring, J. Chu. Intermediate choreographic projects are critiqued in progress by faculty and peers. Consideration of design problems in costuming and lighting. For full description, see DANCE 210.

## DANCE 311(3510) Intermediate Dance

 Composition II (LA-AS)Fall and spring. 3 credits. Prerequisite:
DANCE 310. Co- or prerequisite: DANCE 323 or 324 . Attendance at dance concerts required. Fall, B. Suber; spring, J. Chu.
Continuation of DANCE 310. For full
description, see DANCE 210.

## DANCE 324(3530) Music and Choreography (also MUSIC 408[4512]) (LA-AS)

Spring. 3 credits. Attendance at dance concerts and music concerts required. A. Fogelsanger.

Intended to expose students to music they probably have not heard and are unlikely to seek out on their own, particularly contemporary "classical" music and music used in modern concert dance; to mark out the possible relationships between music and dance when combined in concert; and to pull apart the compositional construction of musical pieces to consider what musical structuring ideas might be profitably applied by choreographers to making dances. The course also considers examples from film and the plastic arts, provides students with some experience making sound and movement, and includes discussion of and writing about concerts, and audio and video recordings. Reading topics include criticism and aesthetics of dance, music, and the arts in general, in particular concentrating on counterpoint, minimalism, improvisation, and polystylism DANCE 324 replaces the sequence DANCE 212-323.
DANCE 410(4500) Advanced Dance

## Composition I (LA-AS)

Fall and spring. 3 credits. Prerequisite DANCE 311. Attendance at dance concerts required. Fall, B. Suber and J. Self; spring, J. Chu.

Students work on advanced choreographic problems, to be presented in performance. Work in progress is critiqued by faculty members on a regular basis. For full description, see DANCE 210.

## DANCE 411(4510) Advanced Dance

 Composition II (LA-AS)Fall and spring. 3 credits. Prerequisite: DANCE 410. Attendance at dance concerts required. Fall, B. Suber and J. Self; spring, J. Chu.

Continuation of DANCE 410. For full
description, see DANCE 210.

## DANCE 491 (4010) Senior Project in

 DanceFall and spring. 3 credits; students receive grade when DANCE 492 is completed.
Prerequisite: DANCE 311; senior dance majors.
First of a two-semester sequence (the second is DANCE 492) for senior dance majors.
Students create a project in choreography and performance, dance, film or video, dance pedagogy, or other appropriate area agreed on with their senior project advisor and committee. In addition, there is a 15 -page paper that expands their work into a historical, theoretical, or aesthetic context. For guidelines see the director of undergraduate studies in dance.

## DANCE 492(4020) Senlor Project in

 Dance IIFall or spring. 3 credits. Prerequisite: DANCE 491
Second of a two-semester sequence (the first
is DANCE 491) for senior dance majors.

## History, Criticism, and Theory

DANCE 312(3120) The Moving Body: Form and Function (PBS supplementary list)
Fall. 3 credits. J. Morgenroth.
Examines the bodily systems involved in human movement with particular attention to dance movement. Readings in texts on human anatomy, physiology, and kinesiology.

## DANCE 313(3141) History: The Body in

 Performance (LA-AS)Fall. 4 credits. Prerequisites: Readings,
viewing of videos, and attendance at live
performances. Letter grades only. J. Chu. How does the social production of dance reflect its historical context? What is the meaning of the "beautiful" in dance? Beginning with 16th-century court dances, we will explore how aesthetics have been aligned both with and against politics in various periods and genres of the performing body, looking at dance as insiders' diplomacy and outsiders' rebellion. Is postmodern dance a discourse of its past? What is the contemporary relationship among African, European, and stubbornly American traditions? This course is designed to promote a critical appreciation of dance, its values and its ambitions, by developing an historical and cultural understanding.

## DANCE 418(4080) Seminar in Dance Studies (also VISST 419[4719]) (CA-AS)

Spring. 4 credits. Limited to 15 students. J. Morgenroth.

Topic for Spring 2008: Movement in Time or Space

According to modern science, we live in a spacetime continuum. The visual arts, including dance, painting, sculpture, film, and theater, create their own spacetimes in which they perform and present their work. While the arts and sciences are often thought of as existing in separate worlds, practitioners of each realm are exploring similar questions within their own modes of inquiry. Thinking
about dance performance will be pivotal in this course, looking at the ways in which artists in the 20th century have warped traditional notions of time and space. We will also consider how scientific theories about time and space have affected the arts. We will view selections and excerpts from dances and theater pieces by Merce Cunningham, Anna Halprin, Trisha Brown, Elizabeth Streb, Robert Wilson, Eiko \& Koma. There will be a variety of writing assignments and an individual or paired project that will ask that you reexamine and renew your assumptions about time and space.

## [DANCE 424(4089) Formalist Aesthetics

 of Modernism and Postmodernism in Music, Dance, and PaintingSpring. 4 credits. Limited to 15 students.
Next offered 2008-2009. A. Fogelsanger. This seminar examines the formalist side of the aesthetics of modernism from the idea of absolute music and the rise of abstraction in painting, through atonality, modern dance, minimalism, and postmodernism. Includes readings of Sally Banes, Monroe Beardsley, Walter Benjamin, Hans Bertens, Peter Berger, Italo Calvino, Roger Copeland, Susanne Langer, David Michae Levin, Susan Manning, Leonard Meyer, Yvonne Rainer, Meyer Schapiro, Susan Sontag, and others.]

## DANCE 490(4000) Senior Paper in Dance

Fall and spring. 4 credits. Prerequisite:
DANCE 418, senior standing. Attendance at
dance concerts is required.
Under faculty direction, the students write a senior paper in dance history, criticism, or theory.

## Interdisciplinary Courses

DANCE 237(2580) Courses of Action (LA-AS)
Fall. 3 credits. J. Self.
This course is a hands-on, pro-active course devoted to studying current performance venues on the Cornell Campus, the Tompkins County area, New York State, New York City and beyond. There will be several components, including a movement/warm-up sequence in every class meeting and some additional movement exercises to promote flexibility and movement awareness. Each session will also include some performance history. Most importantly, it will include planning, creating, and producing short-term and long-term events. This includes finding venues, finding financial support and promotion. Events at Cornell in the Schwartz Center Summer Series will be included as well as interacting with New York State Dance Force members which include artists, producers, and presenters from around New York State and NYC. In addition, we would be working via e-mail and live contact with the internationally renowned performance artist, Robert Wilson as consultant for creating international works of performance. The course will include visits to venues in NYC (Dance Theater Workshop, Danspace at St. Mark's Church in the Bowery), as well as visits to Robert Wilson's Watermill Arts Center on Long Island, and other upstate venues in Rochester, Elmira, Buffalo and Albany.
DANCE 258(3550) Techno Soma Kinesics: Repositioning the Performing Body in Space through the Lenses of Digital Media (LA-AS)
Spring. 4 credits. B. Suber.

Works to expand the specific aesthetics of live performance (music, theatre, and dance) and traditional technological media presentation (sound, film, and video) through the use of emerging digital technologies. Included in the process is the analysis of built environments that both inspire and are clesigned to be inhabited by these disciplines. This studio course explores the resulting neo-performance forms being created within the range of digital media processing; such as gallery installations, multimedia dance-theatre, personal interactive media (games and digital art) and web projects. Computer-imaging and soundproduction programs are examined and used in the class work (human form-animation software [Life Forms], vocal recording and digital editing [Protools and Hyperprism], digital-imaging tools [Photoshop, Final Cut Pro, Flash, Dreamweaver, and Director]. The new context of digital performance raises questions concerning the use of traditional lighting, set, costume, and sound-design techniques that are examined as they are repositioned by digital-translation tools with the goal of creating experimental and/or conceptual multimedia performance and/or installation work. Theoretical texts on dance and theatrical performance, film studies, the dynamic social body, architecture, and digital technology are also used to support conceptual creative work.
DANCE 319(3590) Music, Dance, and Light (also THETR 319[3190], VISST $319[3519]$ ) (LA-AS)
Spring. 3 credits. Attenclance at dance
concerts and music concerts requirect.
E. Intemann and A. Fogelsanger.

Artistic values, parameters, and concerns of music (sound design), dance, and lighting design are compared and contrasted, and the combination of design elements is analyzed in contemporary dance.
DANCE 358(4550) Techno Soma Kinesics II: Repositioning the Performing Body in Space through the Lenses of Digital Media (LA-AS)
Spring. 4 credits. B. Suber.
Continuation of DANCE 258. DANCE 358 expands on principles using more complex and interactive software using MAX/MSP and Jitter. Director, DVI) Studio Pro, and Dreamweaver.

## DANCE 369(3560) Interactive

 Performance Technology (also THETR 369[3690], MUSIC 356[3441]) (LA-AS)Fall. 3 credits. Prerequisites: laptop
computer and MAX/MSP software and
Jitter software required, see www.
cycling 74 .com for student software pricing.
Lab performance at end of semester.
W. Cross and A. Fogelsanger.

Introduction to the multimedia programming platforms MAX/MSP/Jitter and their application to computer-interactive dance (interactive dance technology). Intended to bring together programmers and dancers. Each student will create software patches and movement pieces, and collaborate with others on a final project focusing on the input, manipulation, and output of movement, sound, video, graphics, and lighting in live dance performance. Topics include digital audio/video processing, MIDI control, sensor use, electroacoustic music, history of computer technology and dance up to the present, gestural expression,
choreography, composition, design, and aesthetics. Includes 2 -hour lals. There will be assigned online readings.
[DANCE 391(3570) Media Arts Studio I (also ART/MUSIC/FILM 391, ARCH 459/659) (LA-AS)
Fall or spring. 3 credits. Prerequisite: permission of instructor and junior standing, minimum FILM 377 or 277 , or DANCE 258. Equipment fee: $\$ 50$ (paid in class). Next offered 2008-2009.
Participating faculty include M. Rivchin, film; B. Suber, dance.
A collaborative interdisciplinary studio course in a variety of digital and electronic media, including art, architecture, music, dance, film, and video.]

## Production

DANCE 151(1610) Dance Production Laboratory I (also THETR 151[1510])
Fall and spring. 1-3 credits; may be repeated for credit. Prerequisite: permission of instructo. No experience required. Orientation meeting at $7: 30 \mathrm{p} . \mathrm{m}$. first Tuesday of classes each semester in Kiplinger Theatre at Schwartz Center. P. Lillard.

Provides practical experiences in running
stage crew or dresser crew for dance.

## DANCE 153(1630) Dance Stage

 Management Production Laboratory I (also THETR 153[1530])Fall and spring. 1-2 credits; may be repeated for credit. Before registering, students must attend orientation meeting at 7:30 p.m. in Kiplinger Theatre at Schwartz Center on first Tuesday of classes.
Prerequisite: permission of instructor. P. Lillard.

Practical experience in dance production as assistant stage manager for a dance theatre concert under the supervision of the faculty production manager. THETR 370 complements this course.

## DANCE 251(2610) Dance Production

 Laboratory II (also THETR 251[2510]) Fall and spring. $1-3$ credits; may be repeated for credit. Prerequisite: permission of instructor. Orientation meeting at 7:30 p.m. on first Tuesday of classes each semester in Kiplinger Theatre at Schwartz Center. P. Lillard, D. Hall,F. Sellers, and R. MacPike.

Practical experience in dance production, as a light board operator, sound board operator, video operator, or head dresser.

## DANCE 253(2630) Dance Stage

 Management Laboratory II (also THETR 253[2530])Fall and spring. 1-4 credits; may be repeated for credit. Before registering, students must attend orientation meeting at 7:30 p.m. in Kiplinger Theatre at Schwartz Center on first Tuesday of classes.
Prerequisite: permission of instructor.

## P. Lillard.

Practical experience in theatrical production as assistant stage manager for the dance mainstage concert under the supervision of the faculty production manager. THETR 370 complements this course.

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DANCE 362(3660) Lighting Design Studio
        I (also THETR/VISST 362[3620])
        (LA-AS)
For description, see THETR 362.
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DANCE 368(3680) Sound Design and Digital Audio (also THETR 368[3680], MUSIC 355[3431]) (LA-AS)
For description, see THETR 368.
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## DANCE 462[4660) Lighting Design Studio II (also THETR 462[4620]) <br> For description, see THETR 462.

## Independent Study, Internships, and Honors

 DANCE 300(3000) Independent StudySummer, fall, or spring, $1-4$ credits. Independent study in the dance allows students the opportunity to pursue special interests not treated in regularly scheduled courses. A faculty member, who becomes the student's instructor for the course must approve the student's program of study and agree to provide continuing supervision of the work. Students must prepare a proposal for independent study, which is available in 225 Schwartz.

## DANCE 485(4850) Undergraduate Internship

Fall, spring, or summer. $1-3$ credits. To be eligible to enroll and receive credit for an internship, students must be majors in the department. Students are responsible for arranging their own internships in consultation with the faculty in their area of choice before preregistration for the semester in which the internship is planned to take place. To receive credit within this course, the internship must be unpaid. Students must follow the rules and procedures stated in the departmental internship form.

## DANCE 495(4050) Honors Research

 TutorialFall or spring. 4 credits. Prerequisite: honors students in dance.
First of a two-semester sequence (the second is DANCE 496) for seniors engaged in an honors project. For guidelines, see the director of undergraduate studies in dance.

## DANCE 496|4060) Honors Research

 TutorialFall or spring. 4 credits. Prerequisite: honors students in dance.
Second of a two-semester sequence (the first is DANCE 495) for students engaged in an honors project.

## Tracks toward admission into the advanced undergraduate theatre program

Design, Technology, and Stage Management
Recommended for individuals interested in a
Design, Technology, or Stage Management track:
THETR 250 Fundamentals of Theatre Design and Technology
THETR 151 and 251 Production Lab I and II (at least 1 credit of each)
Recommended for Scenic Design emphasis:
THETR 340 Theatrical Drafting and
Technical Drawing Studio
THETR 351 Production Lab III (as design assistant)
THETR 354 Stagecraft Studio
THETR 364 Scene Design Studio
Upon admission to the program:
THETR 451 Production Lab IV (at least 1 credit)
Recommended for costume design or costume shop management emphasis:
THETR 351 Production Lab III (as design assistant)
THETR 356 Costume Construction Studio
THETR 366 Costume Design Studio I

THETR 371 Costume Design Studio II
Upon admission to the program:
THETR 451 Production Lab IV (at least 1 credit)
Recommended for Lighting Design or costume shop management emphasis:
THETR 252 Technical Production Studio I
THETR 351 Production Lab III (as student electrician)
THETR 351 Production Lab III (as design assistant)
THETR 362 Lighting Design Studio I
Upon admission to the program:
THETR 451 Production Lab IV (at least 1 credit)
Recommended for Sound Design emphasis:
THETR 251 Production Lab II (as student sound technician)
THETR 252 Technical Production Studio I
THETR 351 Production Lab III (as design assistant)
THETR 368 Sound Design Studio
Upon admission to the program:
THETR 451 Production Lab IV (at least 1 credit)
Recommended for Technical Direction emphasis:
THETR 252 Technical Production Studio I
THETR 256 Technical Production Studio II
THETR 340 Theatrical Drafting and Technical Drawing Studio
THETR 351 Production Lab III (as assistant technical director)
THETR 354 Stagecraft Studio
Upon admission to the program:
THETR 451 Production Lab IV (at least 1 credit)
Recommended for Stage Management emphasis:
THETR 253 or 353 Stage Management Lab II or III-two assignments
THETR 280 Introduction to Acting
THETR 370 Stage Management Studio
THETR 398 Fundamentals of Directing I
Upon admission to the program:
THETR 453 Stage Management Lab IV

## Directing

Recommended for individuals interested in a directing track:
THETR 151 and THETR 251 Production Lab I and II (at least 2 combined credits)
THETR 240/THETR 241 Introduction to Western Theatre (one semester only)
THETR 250 Fundamentals of Design and Technology
THETR 280 Introduction to Acting
THETR 398 Directing I
THETR 498 Directing II

## Playwriting

Recommended for individuals interested in a playwriting track:
THETR 240/241 Introduction to Western Theatre (one semester only)
THETR 250 Fundamentals of Design and Technology
THETR 280 Introduction to Acting
THETR 348 Playwriting
THETR 349 Advanced Playwriting
Students in the advanced undergraduate
theatre program may also elect to take FILM 485 (Undergraduate Internship) in addition to or in place of one production assignment.

## TURKISH

See "Near Eastern Studies."

## TWI/AKAN

See "Africana Studies and Research Center,"

UKRAINIAN
See "Department of Russian."

## URDU

See "Department of Asian Studies."

## VIETNAMESE

See "Department of Asian Studies."

## VISUAL STUDIES UNDERGRADUATE CONCENTRATION

Visual studies is a concentration that provides students with an interdisciplinary approach to visual art, media (including digital works), performance, and perception. Faculty from departments throughout the college offer courses toward the concentration, drawing on such various disciplines as the history of art, film, literary studies, psychology, theatre, and others. Requirements for the concentration include the core course VISST 200
Introduction to Visual Studies, which introduces srudents to critical thinking about visual studies as well as close textual analysis in social and historical contexts. Responsibility for teaching the core course rotates among faculty affiliated with the concentration, and the course, as much as possible, entail interdepartmental collaboration in the form of team-teaching or visiting lectures. In addition to the core course, students must take one course within the Theory/Practice group plus three additional courses at the 300 level or above. No more than two courses from the concentration may be double-counted toward a student's major. All courses must be taken for a letter grade.
Students interested in pursuing the concentration should first discuss it with their current advisors, and then either download the form from the visual studies web site (www.arts.cornell.edu/histart/vstudies.html) or contact the visual studies undergraduate coordinator, Gina Miller. After completing the form, students should attach a copy of their transcript and submit it to Gina Miller, GM08 Goldwin Smith Hall. Students who have not been in contact with a visual studies advisor will have one selected for them from among the concentration's affiliated faculty.

## Interdisciplinary Graduate Concentration

In the spring of 2004, Cornell began plans for an interdisciplinary graduate concentration in visual studies that will take several years to institutionalize. The concentration in visual studies is not meant to substitute for
disciplinary training, which will not be waived by the addition of interdisciplinary courses. The "Course List in Visual Studies for 2007 $2008^{\prime \prime}$ alerts incoming students to courses that may be relevant to their interests, and aids them in discovering the network of professors working in visual studies, spanning multiple departments and schools at Cornell.

## Visual Studies Concentration Course List

VISST 101(1101) Visual Literacy and Interior Design (also DEA 101)
Fall. 3 credits. J. Elliott.
For description, see DEA 101
VISST 200(2000) Introduction to Visual Studies (also COM L 200[2001], ENGL 292[2920]) (LA-AS)
Spring. 4 credits. Requirement for undergraduate concentrators. M. Fernandez.

Provides a broad introduction of modes of vision and the historical impact of visual images, visual structures, and visual space on culture, communication, and politics. The question of "how we see" is discussed in terms of (1) procedures of sight (from optical machines to the psychology of vision and the philosophy of aesthetics); (2) spaces of vision (from landscapes to maps to cities); (3) objects of vision (from sacred sites to illuminated books to digital art); and (4) performances of vision (race, sexualities, ethnicities, cultures). Of importance to the course is the practical and conceptual relation of 20th-century visual technologies
(photography, cinema, video, and computing) to their historical corollaries in the arts. The course draws on the visual traditions of both Western and non-Western societies and study texts that have defined the premises and analytic vocabularies of the visual. Through viewings, screenings, collaborative writing, and art projects, students develop the critical skills necessary to appreciate how the approaches that define visual studies complicate traditional models of defining and analyzing art objects. Guest lecturers occasionally address the class. Requirements: two objective midterm exams; occasional listserve postings; two five-page papers.

VISST 203(2020) Introduction to Feminist Theory (also FGSS 202[2020])
Fall. 3 credits. D. Reese
For description, see FGSS 202.

## VISST 211(2711) Beginning Dance

 Composition (also DANCE 210[2500]) Fall and spring. 3 credits. Concurrent enrollment in DANCE 212 and a dance technique class at appropriate level. Attendance at dance concerts required. Fall, B. Suber; spring, J. Chu.VISST 219(2190) Thinking Surrealisms (also ART H 219[2019], COM L 220[2200])
Spring. 3 credits. B. Maxwell.
For description, see COM L 220.]
VISST 230(2300) Survey of American Film (also FILM 276[2760], AM ST 230[2760])
Fall. 3 credits. S. Haenni.
For description, see AM ST 230.
[VISST 233(2533) Explorations in Movement (also DANCE 233[2410]) Fall. 0 to 1 credit. Limited to 16 students Attendance at dance concerts required. J. Self.

For description, see DANCE 233]
VISST 235(2430) Hip-Hop Hollywood (also DANCE 235[2430], PE 161[1181])
Fall. 3 credits. J. Self.
For description, see DANCE 235
[VISST 236(2430) Public Voice and Clivic Gesture (also DANCE 236[2450], THETR 236[2360])
Fall. 1 credit. P. Suber and B. Milles.
For description, see DANCE 236.]
VISST 244(2744) Gamelan in Indonesian History and Cultures (also MUSIC 245[1341], ASIAN 245[2245])
Fall and spring. 3 credits. Prerequisite permission of instructor. No previous knowledge of musical notation or performance experience required. Staff. For description, see MUSIC 245.

VISST 245(2645) Renaissance and Baroque (also ART H 245[2400]) Fall. 4 credits. Each student must enroll in a sec. C. Lazzaro.
For description, see ART H 245.
VISST 274/674(2174/6174) Introduction to Film Analysis: Meaning and Value (also FILM 274/674[2740/6740])
Fall. 4 credits. Limited to 40 students. Graduate students should enroll in FILM 674. D. Fredericksen.

For description, see FILM 274/674.
VISST 293(2193) Middle Eastern Cinema (also NES 293[2793], COM L/FILM 293[2930], JWST 291[2793])
Fall. 4 credits. D. Starr.
For description, see NES 293.
[VISST 305(3305) Visual Perception (also PSYCH 305[3050])
Fall. 4 credits. Limited to 20 students.
Prerequisite: PSYCH 205 or permission of instructor. J. Cutting.
For description, see PSYCH 305.$]$
VISST 306(3605) Americans Abroad (also AM ST/FILM 305[3050], ENGL 352[3520])
Spring. 3 credits. S. Haenni.
For description, see AM ST 305.
[VISST 308(3508) Dance Technique IV/ Modern (also DANCE 308[4220], PE 161[1181])
Fall. 1 credit. By placement only; no preenrollment. Attendance at dance concerts required. J. Chu.
For description, see DANCE 308.]
VISST 319(3519) Music Dance and Light (also DANCE 319[3590])
Spring. 3 credits. E. Intemann and
A. Fogelsanger.

For description, see DANCE 319
[VISST 335(3735) Modern Western Drama, Modern Western Theatre: Theory and Practice [also THETR 335, ENGL 335[3530])
Fall. 4 credits. N. Salvato.
For description, see THETR 335.]

VISST 342(3342) Human Perception: Application to Computer Graphlcs, Art, and Visual Display (also PSYCH/ COGST 342[3420], PSYCH 642[6420])
Fall. 3 or 4 credits; 4 -credit option involves term paper. Prerequisite: PSYCH 101 or permission of instructor. PSYCH 205
strongly recommended. D. Field.
For description, see PSYCH 342.

## VISST 345(3645) American Film

 Melodrama (also FILM 344[3440], AM ST 338[3440], ENGL 344 [3440], FGSS 345[3450])Spring. 3 credits. S. Haenni.
For description, see FILM 344.
[VISST 348|3480) Film Noir (also AM ST 348[3480], FILM 346[3460])
Spring. 4 credits. S. Haenni.
For description, see FILM 346.
VISsT 356(3560) Computing Cultures (also SeTS/COMM/INFO 356[3561])
Spring. 4 credits. P. Sengers.
For description, see S\&TS 356.
VISST 362(3660) Impressionism in Society (also ART H 362\{37601)
Spring. 4 credits. Not open to freshmen.
Recommend: ART H 245. L. Meixner.
For description, see ART H 362.
VISST 364(3620) Lighting Design Studio I (also THETR 362[3620], DANCE 3623660])
Fall. 4 credits. E. Intemann.
For description, see THETR 362.
VISST 366(3466) History and Theory of Digital Art (also ART H 366[3650])
Fall. 4 credits. M. Fernandez.
For description, see ART H 366.
VISST 372(3672) The Art of the Historical Avant-Garde (also GERST 377[3770], ART H 372[3672])
Fall, 4 credits. P. McBride.
For description, see GERST 377.
[VISST 375(3175) History and Theory of Commercial Narrative Film (also FILM 375[3750])
Fall. 4 credits. Fee for screening expenses:
$\$ 10$ (paid in class). S. Haenni.
For description, see FILM 375.]
VISsT 376(3176) History and Theory of Documentary and Experimental Flim (also FILM 376[3760])
Fall. 4 credits. Fee for screening expenses:
$\$ 10$ (paid in class). D. Frederickson.
For description, see FILM 376.
[VISST 385(3850) Commedia: A Contemporization of Physical Acting Styles and the Comic Approach (also THETR 384[3840])
Fall. 4 credits. Next offered 2008-2009.
B. Milles.

For description, see THETR 384.]
[VISST 387(3870) Literature and FIIm of South Asla (also COM L 386[3860], ASIAN 387[3387])
Spring. 4 credits. Next offered 2008-2009.
A. Banerjee.

For description, see COM L 386.]
VISST 393(3930) International Film of the 1970s (also AM ST/COM LFILM 393[3930])
Fall. 4 credits. S. Haenni.
For description, see FILM 393.

## VISST 394(3655) The House and the

 World: Architecture of Asia (also ART H 395[3855])Spring. 4 credits. K. McGowan.
For description, see ART H 395.
VISST 396(3696) Arts of Southeast Asla (also ART H 396[3850])
Fall. 4 credits. K. McGowan.
For description, see ART H 396.

## VISST 398(3798) Fundamentals of

 Directing I (also THETR 398[3980])Fall. 3 credits. Limited to 10 students. Prerequisite: permission of instructor. Special consideration given to students who have completed THETR 280 or intend to continue in area of stage or screen directing. Students should see instructor one year in advance to sign up for course. D. Feldshuh

For description, see THETR 398.

## VISST 400(4200) Proseminar (also ART H

 400/600[4100/6100]]Fall and spring. 4 credits. Limited
enrollment. Prerequisite: History of Art
majors only. M. Fernandez and I. Dadi.
For description, see ART H 400

## VISST 407(4607) The Museum and the Object (also ART H 407[4107])

Fall. 4 credits. Prerequisites: History of Art majors only. Not open to freshmen or sophomores without permission of instructor. All classes meet in Johnson Art Museum Study Gallery. K. McGowan.
For description, see ART H 407
[VISST $412(4120)$ Sclence, Technology and Culture (also COM L 410[4100], S\&T8 412[4101])
4 credits. Next offered 2008-2009.
A. Banerjee.

For description, see COM L 410.]
VISST 415(4615) Environmental Interventions (also 5 HUM 415,
S8TS 415[4151], INFO 415[4150])
Fall. 4 credits. P. Sengers.
For description, see S HUM 415.

## VISST 419(4719) Movement in Time and

 Space (also DANCE 418[4080])Spring. 4 credits. J. Morgenroth.
For description, see DANCE 418

## VISST 425(4625) Rasta, Race, and

 Reslstance [also ART H 425[4525], AS\&RC 426[4526])Fall. 4 credits. P. Archer-Straw. For description, see ART H 425.

## VISST 426(4260) Adaption: Text/

 Theatrically (also THETR 426[4260])Spring. 4 credits. B. Milles.
For description, see THETR 426.
[VISST 480(4800) Advanced Seminar in American Literature: Visual Culture in Women's Literature (also ENGL FGSS 479[4790], ART H 479[4979])]
VISST 506(5106) Contemporary African Diaspora Art (also ART H 506[5505], ASERC 506[6500])
Fall. 4 credits. P. Archer-Straw.
For description, see ART H 506.

## VIS5T 619(6619) Translation in Theory

 (also ASIAN 619[6619], COM L 616[6160])Spring. 4 credits. B. deBary.
For description, see ASIAN 619.

VISST 634/6340) Deleuze and Lyotard:
Aesthetic Excess and Artistic
Practice (also ENGL 629[6290], COM L 634[6340], FREN 672[6720])
Spring. 4 credits. T. Murray,
For description, see COM L 634.
VISST 665(6625) Race, Gender, and Crossing Water (also ENGL 665[6650])
Spring. 4 credits. S. Samuels.
For description, see ENGL 665.
[VISST 666(6466) Media Theory: Film and Photography (also GOVT 666[6665])
Fall. 4 credits. Next offered 2009-2010.
D. Rubenstein.

For description, see GOVT 666.]
VISST 674(6174) Intro to Film Analysis (also FILM 274/674[2740/6740])
Fall. 4 credits. D. Fredericksen.
For description, see FILM 274.

## WELSH

See "Department of Linguistics."

## WRITING PROGRAM

See "John S. Knight Institute for Writing in the Disciplines."

## YIDDISH

See "Department of Near Eastern Studies."

## ZULU

See "Africana Studies and Research Center."

## FACULTY ROSTER

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Abusch, Dorit, Ph.D., U. of Massachusetts, Amherst. Assoc. Prof., Linguistics
Adams, Anne, Ph.D., U. of Michigan. Prof. Emerita, Africana Studies and Research Center
Adams, Barry B., Ph.D., U. of North Carolina. Prof. Emeritus, English
Adams, James E., Ph.D., Cornell U. Assoc. Prof., English
Adelson, Leslie A., Ph.D., Washington U. Prof., German Studies
Ahl, Frederick M., Ph.D., U. of Texas, Austin. Prof., Classics/Comparative Literature
Alexander, James P., Ph.D., U. of Chicago. Prof., Physics/LEPPT
Alexandridis, Annetta, Ph.D., Ludwig-Maximilians-U. Munich (Germany). Asst. Prof., History of Art
Alkire, Elbern H., Ph.D., Cornell U. Sr Lec., Romance Studies
Allmendinger, Richard W., Ph.D., Stanford U. Prof., Earth and Atmospheric Sciences/ INSTOC ${ }^{*}$
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Almy, James, Ph.D., U. of California, Irvine. Lec., Chemistry
Altschuler, Glenn C., Ph D., Cornell U. The Thomas and Dorothy Litwin Professor of American Studies, American Studies
Ambegaokar, Vinay, Ph.D., Carnegie Inst. of Technology. Goldwin Smith Professor of Physics Emeritus, Physics/LASSP*
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Anderson, Benedict R., Ph.D., Cornell U. Aaron L. Binenkorb Professor of International Studies Emeritus, Government
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Armstrong, James, M.M., Bowling Green State U. Lec., Music

Arnesen, Ingrid, M.A., U. of California, Davis; M.A. SUNY Stony Brook. Sr. Lec., English for Academic Purposes
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Prof., Africana Studies and Research Center
Auffret, Isabelle, M.A., L'Universite Catholique de l'Ouest (France). Lec., Romance Studies

Back, Allen H., Ph.D., U. of California, Berkeley. Sr. Lec., Mathematics
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Baird, Barbara, Ph.D., Cornell U. Prof., Chemistry and Chemical Biology
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Beneria, Lourdes, Ph.D., Columbia U. Prof., City and Regional Planning/Feminist, Gender, \& Sexuality Studies
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DeVoogd, Timothy J., Ph.D., U. of Illinois. Prof., Psychology
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Elaqad, Hisam, M.A., U. of Michigan. Sr. Lec.

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Evangelista, Matthew, Ph.D., Cornell U. Prof., Government
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Fakundiny, Lydia E., B.Phil., B.Litt, Oxford U. (England). Sr. Lec., English
Falk, Oren, Ph.D., U. of Toronto (Canada). Asst. Prof., History
Falkson, Louis, M.A., Harvard U. Sr. Lec, Economics
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Farrell, Roger H., Ph.D., U. of Illinois. Prof. Emeritus, Mathematics
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Feldman, Richard L., M.A., U. of Illinois, Urbana-Champaign.
Feldshuh, David, Ph.D., U. of Minnesota. Prof,, Theatre, Film and Dance
Ferguson, Melissa, Ph.D., New York U. Asst. Prof., Psychology
Fernández, María, Ph.D., Columbia U. Asst. Prof., History of Art
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Fine, Gail J., Ph.D., Harvard U. Prof., Philosophy/Classics
Finlay, Barbara L., Ph.D., Massachusetts Inst. of Technology. William R. Kenan, Jr. Professor of Psychology
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Francis, Paul, Ph.D., U. Coll. London (England). Assoc. Prof., Computer Science
Frank, Jason, Ph.D., Johns Hopkins U. Gary S Davis Asst. Professorship of the History of Political Thought, Government
Fredericksen, Donald L., Ph.D., U. of Iowa. Prof., Theatre, Film and Dance
Freed, Jack H., Ph.D., Columbia U. Prof., Chemistry and Chemical Biology
Fried, Debra, Ph.D., Yale U. Assoc. Prof., English
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Furman, Nelly, Ph.D., Columbia U. Prof. Emerita, Romance Studies

Gainor, Ellen J., Ph.D., Princeton U. Prof., Theatre, Film, and Dance
Gair, James W., Ph.D., Cornell U. Prof. Emeritus, Linguistics
Galik, Richard S., Ph.D., Cornell U. Prof., Physics/LEPP
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[^0]:    GOVT 405(4051) The Postmodern Presidency: 2004 (CA-AS)
    Spring. 4 credits. D. Rubenstein

[^1]:    See the list of courses with overlapping content at the end of the introduction.

[^2]:    *See the list of courses with overlapping content at the end of the introduction.

[^3]:    -See the list of courses with overlapping content at the end of the introduction.

[^4]:    *See the list of courses with overlapping content at

[^5]:    *See the list of courses with overlapping content at

[^6]:    *See the list of courses with overlapping content at the end of the introduction.

[^7]:    *See the list of courses with overlapping content at the end of the introduction.

