

Finding Needles in Haystacks: A Software Tool to Improve the Accessibility of Range Management Information

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Introduction:
The last collection of terms that was created specifically for rangelands was published by the Society for Range Management in 1998. Much has changed in range science in the past 22 years and the field will continue to evolve with the needs and concerns of land managers. A targeted thesaurus for range science should reflect those changes and have the ability to be updated on a regular basis. In addition, establishing relationships between thesaurus terms can make relevant information more accessible. The thesaurus concepts and relationships are the basis for tagging and referencing source material in search applications.

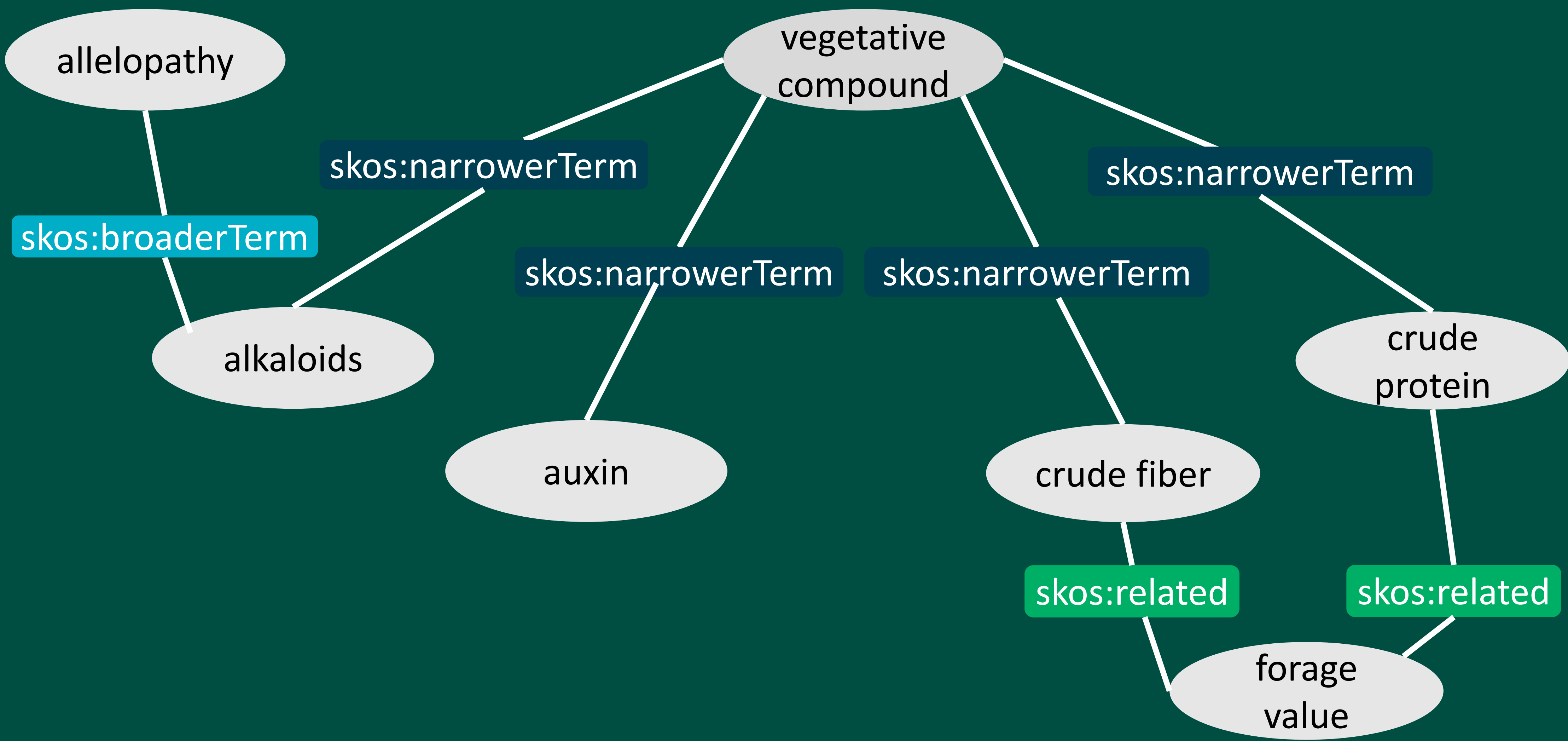
- Methods:**
1. Compile **collections of terms** from published sources such as:
 - Society for Range Management (1998)
 - National Range and Pasture Handbook (2003)
 - Utilization Studies and Residual Measurements (1999)
 2. Consult with **source material experts** on compiled terms and their definitions
 - Terms to be added
 - Terms to be removed
 - Maintain/change existing definitions
 - Reconcile multiple definitions for one term
 3. Build **hierarchical relationships** between terms
 - Using the SKOS vocabulary
 - Terms and their definitions live in a database called VocBench
 4. Use the terms and hierarchical relationships to **tag, annotate, and organize a curated collection** of reference material for land managers

- Outcomes:**
1. A **search application** based on the combination of the new thesaurus and curated reference materials
 - The goal of this application is to make credible range science reference material more easily accessible to land managers (focus on the western U.S.)
 2. Rangeland terms **integrated with the UN's AGROVOC**
 - AGROVOC is a vocabulary system maintained by the Food and Agriculture Organization (FAO) of the United Nations.
 - Consists of +750,000 terms in 35 languages but it has **very few rangeland terms (n = 308)**.
 - Increases access to rangeland knowledge outside of the U.S. and to other disciplines.

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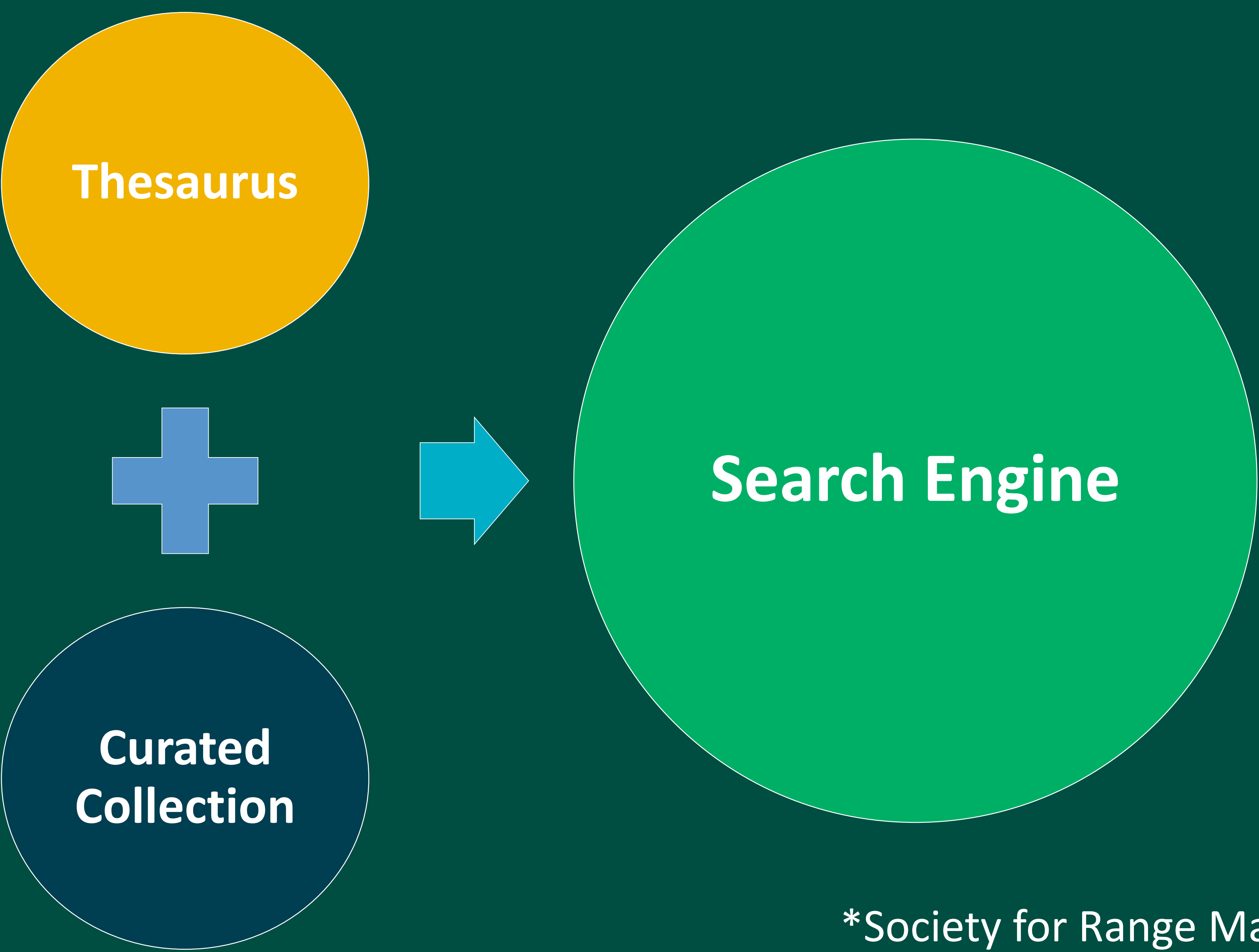


The SRM* glossary has not been updated since 1998.



A thesaurus of rangeland terms for tagging specific content within manuals, fact sheets, and reports.

Making relevant information more accessible to land managers to help them make information-based decisions.



*Society for Range Management