

Proposed Ideas for DFT IG

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Simple Knowledge Organization System (SKOS)

- Terms as concepts
- Concept metadata
- Concept hierarchy
- Concept schemes and mapping concepts
- Collections of concepts

DFT Data terminology in SKOS

- Terms become instances of `skos:Concept`
- Metadata stored using `skos:definition`, `skos:example`, and `skos:scopeNote`, etc.
- Optionally define concept collections
- Optionally define hierarchical relationships using `skos:broader`, `skos:narrower`

Mapping across vocabularies

- Terms with 'similar meanings', synonyms across dialects, etc.
- Vocabularies/terminologies are concept schemes
- Concepts linked using `skos:closeMatch` and `skos:exactMatch`
- Natural Language Processing techniques to establish similarity

Potential Applications Natural Language Processing

- Similarity between terms
- Analytics on usage of terms
- Grouping/clustering of concepts
- Based on a corpus of text (scientific publications, etc.)

Vocabulary service

- Host data terminology as a service
- Provides persistence and access
- Possibly multiple vocabularies
- In collaboration with VSIG?

Intro to SKOS

W3C SKOS Primer <https://www.w3.org/TR/2009/NOTE-skos-primer-20090818/>

General info by IBM <http://www.ibm.com/developerworks/library/x-skostaxonomy/>

Concise intro by Dataversity <http://www.dataversity.net/introduction-to-skos/>