

Taxonomist/Ontologist/Semantic Analyst Professional Pathway — Required and Recommended Courses

Description:

Information professionals who design, create, and maintain specific controlled vocabularies and structured taxonomies used for organizing, indexing, and retrieving information with the goal to significantly improve the findability and search experience of an institution’s external users and the internal community. In addition, they create knowledge graphs and linked metadata schemes, map metadata, work with linked data, mine for data internally and externally, and collaborate with others on semantic technology projects.

REQUIRED MLIS CORE (16 CREDIT HOURS)		
LIS 60010	The Information Landscape	3
LIS 60020	Information Organization	3
LIS 60030	People in the Information Ecology	3
LIS 60040	Information Institutions and Professions	3
LIS 60050	Research and Assessment in Library and Information Science	3
LIS 60280	Master’s Portfolio in Library and Information Science	1

FOUNDATIONAL (KEY) COURSES (12 CREDIT HOURS)		
LIS 60510	Digital Technologies I: Data Fundamentals	1
LIS 60511	Digital Technologies II: Internet Fundamentals	1
LIS 60512	Digital Technologies III: Systems Fundamentals	1
LIS 60636	Knowledge Organization Structures, Systems and Services	3
LIS 60637	Metadata Architecture and Implementation	3
KM 60370	Semantic Analysis Methods and Technologies	3

RECOMMENDED ELECTIVES (CHOOSE AT LEAST 9 CREDITS)		
---	--	--

LIS 60602	Cataloging and Classification I	3
LIS 60613	Information Needs, Seeking and Use	3
LIS 60641	Information Storage and Retrieval Systems (prerequisites = LIS 60510, LIS 60511, LIS 60512)	3
LIS 60649	Indexing and Abstracting	3
LIS 60692 <u>or</u> LIS 60092	Practicum—Libraries and Information Centers <u>or</u> Master’s Internship in Library and Information Science	2-3
KM 60302	Foundations of Document Management	3
UXD 60101	Information Architecture	3

Consult with your faculty advisor for additional coursework if you are interested in specialized collections, such as music, media, medical literature, etc.

Indexing and Abstracting Professional Pathway — Additional Information and Resources

Competencies (knowledge, skills):

- Demonstrate knowledge of information management technologies and systems, including data structure, data systems and tools, related software, and data management policies and practices;
- Experience with ontology development using standard languages (RDF(S)/OWL, SKOS, and tools. Knowledge of theories, principles, and standards for metadata, classification, subject and descriptive cataloging, and knowledge organization;
- Good understanding and knowledge of data modeling (conceptual, logical, physical), data flow diagrams, taxonomic models, metadata management designs, and vocabulary standards;
- Knowledge of planning, designing, and implementing a domain or enterprise knowledge taxonomy, architecting and designing the application of metadata standards, controlled vocabularies and data rules, and establishing information management best practices;
- User experience principles and concepts.

International Society for Knowledge Organization
(ISKO)
Special Libraries Association (SLA)

Additional skills:

- Aptitude for complex, analytical, and detailed work;
- Effective verbal and written communication skills;
- Flexibility/ability to adjust to changes;
- High attention to detail, and accuracy;
- Organizational and project management skills;
- Strong understanding of technical environments, their use, tenets, integration and interactions;
- Understanding of the research and grant process;
- Working across divisions and diverse populations.

Professional organizations:

Association for Information Science and Technology (ASIS&T):

- Special Interest Group: Classification Research (SIG-CR)
- Special Interest Group: Knowledge Management (SIG-KM)

Dublin Core Metadata Initiatives (DCMI)

Professional conferences:

NKOS workshop (US., Europe)
Ontology Summit
Taxonomy Boot Camp (US, UK)

Sample job titles:

Business Analyst/Taxonomist
Digital Taxonomist (Data Engineer)
Knowledge Engineer (Taxonomist)
Knowledge Manager/Taxonomy Lead
Ontologist
Ontology Engineer
Semantic Analysis/Interoperability Engineer
Taxonomist/Content Specialist
Taxonomist/Metadata Consultant
Taxonomy and Knowledge Management Analyst
Taxonomy Manager
UX Taxonomist – Information Architecture

Other related pathways in the Information Organization cluster:

Archival Description Professional
Cataloging and Metadata Professional

Indexing and Abstracting Professional
Metadata Designer and Architect
Museum Documentation and Cultural Object
Cataloging Professional