Linked Open Data for DSpace

Outdated

This proposal is outdated. LOD support was added to DSpace 5. See Bringing DSpace into the Semantic Web and the DSpace 5 Documentation for information on the realised LOD support.

LOD for DSpace

EPrints supports VOID and LoD, http://semanticweb.org/wiki/VoiD **So should we**.

VoID (from "Vocabulary of Interlinked Datasets") is an RDF based schema to describe linked datasets. With VoID the discovery and usage of linked datasets can be performed both effectively and efficiently. A dataset is a collection of data, published and maintained by a single provider, available as RDF, and accessible, for example, through dereferenceable HTTP URIs or a SPARQL endpoint.

Initial Support

Previous work did happen on creating a rendering of RDF linked in the header for DSpace@MIT, this was since dropped from MIT's instance but the source is still in the SCM repository modules section.

http://scm.dspace.org/svn/repo/sandbox/dspace-xmlui-rdf-aspect/

http://scm.dspace.org/svn/repo/sandbox/dspace-rdf/

Advanced Support

What is needed for advanced LoD participation is a SPARQL endpoint that can be queried to return RDF descriptions of DSPace content. I propose we leverage the semantic storage GSoC project, but introduce a Tupelo based endpoint that will basically be a confiugrable web-application

http://dlt.ncsa.illinois.edu/wiki/index.php/Tupelo_Server_Webapp

We would engineer this Tupelo Service to expose the semantic storage details from the storage-

GSOC10 - Storage Service Implementations Based on Semantic Content Repository

This is proposal that would be good for a GSoC project this year.