## Mapping between linked data vocabularies in ARIADNE

Douglas Tudhope, Ceri Binding

Hypermedia Research Group

University of South Wales

Semantic Enrichment Enabling Sustainability of Archaeological Links (SENESCHAL) was a project coordinated by the Hypermedia Research Unit at the University of South Wales. The project aims included widening access to key vocabulary resources. National cultural heritage thesauri and vocabularies are used by both national organizations and local authority Historic Environment Records and could potentially act as vocabulary hubs for the Web of Data. Following completion, a set of prominent UK archaeological thesauri and vocabularies is now freely available as Linked Open Data (LOD) via <a href="http://www.heritagedata.org">http://www.heritagedata.org</a> - together with open source web services and user interface controls.

This presentation will reflect on work done to date for the ARIADNE FP7 infrastructure project (<a href="http://www.ariadne-infrastructure.eu">http://www.ariadne-infrastructure.eu</a>) mapping between archaeological vocabularies in different languages and the utility of a hub architecture. The poly-hierarchical structure of the Getty Art & Architecture Thesaurus (AAT) was extracted for use as an example mediating structure to interconnect various multilingual vocabularies originating from ARIADNE data providers. Vocabulary resources were first converted to a common concept-based format (SKOS) and the concepts were then manually mapped to nodes of the extracted AAT structure using some judgement on the meaning of terms and scope notes. Results are presented along with reflections on the wider application to existing European archaeological vocabularies and associated online datasets.