

## LIBRARY AS UNIVERSITY'S DATA HUB

#### CREATING, DISTRIBUTING AND USING LINKED DATA

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#### CONCEPT

Helsinki University library is developing a service called UHOD (University of Helsinki Open Data), which works as a linked data broker for any kind of data that is considered useful i.e. provides added value. The idea is to turn already published data, via data dumps or APIs, first into one internal interlinked graph of datasets, which then can be utilized to provide different kinds of views for public consumption.

### PLATFORM

Main Implementation of UHOD consists of five main components: ETL tool, processing components, back-end data storage, front-end data storage and front-end data service APIs. Communication layer is implemented using messaging middleware solution. Processing component are internal services that can be any self-contained service ranging from simple text substitution to complex named-entity recognition.

Platform does not enforce any predetermined data model for incoming data. The only requirement is that data can be transformed to RDF, which is the format that platform uses internally for all the operations. Detailed provenience information is associated with every set of original and generated data. Provenance information is also exposed through an API in order to facilitate validation and feedback processes from the users of the data APIs.

# CURRENT STATUS

Library currently runs two UHOD instances. One combines data from the national ontology service (finto.fi), CRIS and Semantic MediaWiki to provide thesis related repository URIs and multilingual labels for subjects, organizational units and disciplines. Same instance is also used by the university IT services to enhance search UI. The other instance is dedicated to data from the ILS with links to relevant datasets (e.g. Geonames).





