

Abstract

Increasing amount information in the web or in large repositories gives rise to the idea of using semantic information in information retrieval (IR) systems. A number of these IR systems use ontologies to enrich the search task with domain knowledge. This thesis presents a framework for using the domain knowledge encoded in ontology to make the search task more domain specific. We also propose an approach for preparing context vector for the entities of ontology. The context vectors (CV) reflect the semantic closeness of words with the entities of ontology. The context vectors are used for ranking of the search results. Experimental evaluation of the proposed model has shown good results in comparison to a traditional search engine.