

The dissertation focuses on library automation. It examines relationships between the field of library automation and library management systems and the needs of libraries in relation to the process of library software selection. The main goal of the dissertation has been to create a library automation domain ontology and to develop tools to support a decision-making process of library software selection. The domain ontology has been created; it describes the field of library automation in relation to library systems, which are set in the broader context of the field of library automation and are regarded in terms of needs of libraries in connection to library software change. To obtain terms for ontology entity names both quantitative and mixed research methods were used, namely the analysis of scholarly texts on library automation and library systems; text analyses were performed using Voyant Tools software. Object properties and relationships among entities in ontology are based on the results of a qualitative survey of the needs of libraries in relation to the library management software. Based on the domain ontology, flowcharts have been created that illustrate the library's decision-making process when selecting a library management system. During the work on the dissertation, a methodological guidelines entitled Přípravujeme změnu knihovního softwaru (Preparing For ILS Migration) have been developed.