Abstract

Scholarly knowledge graph is a knowledge graph that is used to represent knowledge contained in scientific publication documents. The information we can find in a scientific publication document is as follows: author, institution, name of journal/conference, and research topic. A knowledge graph that has been built is usually still not perfect. There is some information that is still incomplete and could still be added. This can be solved with knowledge graph completion, which is a method for finding missing or incorrect relationships with the aim of improving the quality of a knowledge graph. Then knowledge graph completion is carried out on a scholarly knowledge graph by adding new entities and relationships to produce new information in the scholarly knowledge graph. In this research, the data added to scholarly knowledge graph are only other paper of author 1 entity, research field of author 1 entity, and description of conference/journal entity. The results shows that scholarly knowledge graph was completed by adding 81% correct data for other paper of author 1, 80,3% correct data for research field of author 1, and 53,9% correct data for description of conference/journal.

Keywords: Knowledge Graph, Scholarly Knowledge Graph, Knowledge Graph Completion