

ChatGPT as An Intelligent Assistant for Classification System Development

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Abstract

Leveraging the immense capabilities of a large language model (LLM), chatGPT excels in text classification. This presentation will introduce our recent work on harnessing chatGPT's classification prowess for the creation and management of taxonomies and ontologies. Two cases will be discussed and demonstrated. One is **expanding an existing ontology**. In this scenario, we employ chatGPT to extend a published ontology. By collaborating with chatGPT, we enhance the ontology's structure and generate test pages for expert evaluation. This case demonstrates how chatGPT can efficiently augment established ontological frameworks. The second is **creating a new Data Analytics Taxonomy for Small Business**. Here, chatGPT plays a pivotal role in constructing the hierarchical structure and enhancing the taxonomy's functionality. Based on this experience, we are developing a chatGPT plugin for the creation and management of taxonomies and ontologies. Our findings suggest that chatGPT can evolve into a powerful intelligent AI assistant for the development of classification systems. However, it's important to underscore that human oversight and domain expertise remain indispensable in shaping, validating, and assessing the AI assistant's outputs.