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## Abstract

In this paper, we propose a new framework to annotating subtitled YouTube EDU media fragments using textual features such as extract all the basic portions extracted from the web-based natural language processors of in relation to subtitles and temporal features such as duration of the media fragments where proper entities are spotted. We've created the SY-E-MFSE (Subtitled YouTube EDU Media Fragment Search Engine) as a framework to cruising on the subtitled YouTube EDU videos resident in the Linked Open Data (LOD) cloud. For realizing this purpose, we propose Unifier Module of Outcomes of Web-Based Natural Language Processors (UM-OWNLP) for extracting the essential portions of the 10 NLP tools that are based on the web, from subtitles associated to YouTube videos in order to generate media fragments annotated with resources from the LOD cloud. Then, we propose Unifier Module of Outcomes of Web-Based Named Entity (NE) Booster Processors (UM-OWNEBP) containing the six web Application Programming Interfaces (API) to boost outcomes of NEs obtained from UM-OWNLP. We've presented 'UM-OWNLP ontology' to support all the 10 NLP web-based tools ontological features and representing them in a steadfast framework.

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## Index Terms

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## Keywords

Subtitled YouTube EDU video textual metadata semantic web video annotation  
web-based natural language processor.