



Institut für Angewandte Informatik und Formale Beschreibungsverfahren

Graduiertenkolloquium Angewandte Informatik

"Linked Data Entity Summarization"

Dipl.-Inform. Andreas Thalhammer

AIFB

Abstract:

In recent years, the availability of structured data on the Web has grown and the Web has become more and more entity-focused. An entity can be a person, a book, etc. As a matter of fact, all these entities are connected in a large knowledge graph. In consequence, a lot of data is often available for single entities. In its complete form, the data is not always useful for humans unless it is presented in a concise manner. The task of entity summarization is to identify facts about entities that are particularly notable and worth to be shown to the user.

A common usage scenario of entity summarization is given by knowledge graph panels that are presented on search engine result pages. For producing summaries, search engine providers have a large pool of data readily available in the form of query logs, click paths, user profiles etc.

However, that data is not openly available and emerging open approaches for producing summaries of entities can not rely on such background data. Also, the majority of current entity summarization

approaches rely only on one knowledge graph (that is often proprietary). Thus, when entity summaries are presented to the user, issues and discussions about data quality, objectivity, and trust have arisen in the recent years. In addition, at the point of presentation, summaries are usually strongly tied to the user interfaces of the specific summary providers. Last but not least, the following question becomes apparent: "What makes a good summary?"

In this talk we will address the above-mentioned challenges and introduce

- 1) a lightweight relevance-oriented entity summarization system that requires solely a link graph as input;
- 2) an entity-centric data fusion approach that enables us to align single facts about entities from multiple open Web sources in a schema-agnostic way;
- 3) a common API for publishing and consuming entity summaries; and
- 4) a quiz-game approach for establishing a gold standard for the evaluation of entity summarization systems.

Termin: Mittwoch, 09. März 2016, 15.45 Uhr

Ort: Englerstraße 11, 76131 Karlsruhe Kollegiengebäude am Ehrenhof (Geb. 11.40), 2. OG, Raum 231 (Hinweise für Besucher: <u>www.aifb.kit.edu/web/Kontakt</u>)

Veranstalter: Institut AIFB, Forschungsgruppe Wissensmanagement

Zu diesem Vortrag lädt das Institut für Angewandte Informatik und Formale Beschreibungsverfahren alle Interessierten herzlich ein.

A. Oberweis, H. Schmeck, R. Studer (Org.), Y. Sure-Vetter

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76133 Karlsruhe	76128 Karlsruhe