Call for Participation

GIScience 2023 - Workshop on geographic question-answering, 12/09/2023

https://ai.di.uoa.gr/#GIScience2023-workshop

Scope:
Question-answering (QA) is a form of verbal, dialogue-based interaction with information gaining ground in commercial services, such as smart assistants. It is enabling the most natural interaction with information thus far limited to human-to-human interaction - speech. Research on the different technical and conceptual challenges of QA has surged in information science, including phrase analysis, phrase mappings to entities in a database, entity disambiguation and the construction of formal queries from questions. Since Geography and spatial relationships are an important part of numerous human-asked questions, geographic question answering (geoQA) has recently become an area of intensive research interest, both from a document as well as a knowledge centric view. This includes foundational research on the form and concepts of spatial questions and answers, geographic question corpora, geoQA interfaces, dialogue and information relevance related to specific tasks (incl. wayfinding instructions), as well as research in enabling technology, including geographic query extensions over knowledge graphs and geo-analytical workflow composition, and the use of deep learning and large language models in systems such as ChatGPT and InstructGPT. This workshop focuses on geoQA from a practical hands-on perspective to learn about the state-of-the-art as well as knowledge and technology gaps. It brings together GIScientists interested in diverse aspects of the problem. In the workshop, we will demonstrate and compare early systems (introduction tutorials and hands on sessions), corpora and approaches, and identify suitable directions for future research, including the collection of gold-standard corpora, task and scale specific QA system design.

*Organizers***:**
Haiqi Xu, Ehsan Hamzei, Manolis Koubarakis, Martin Tomko, Gengchen Mai, Simon Scheider

Contributions:
We welcome contributions in the following two forms:

1. **Submission of corpus datasets or geoQA tools. Both should be described in a one-pager using the GIScience template and may be presented and tested in the hands-on/tutorial session.**
2. **Submission of position papers which are not reviewed but evaluated based on interest for the workshop. Papers should be in pdf format, using the GIScience article template. They should be no longer than 2 pages (including references), and will be presented at the workshop in the form of a 5 minute lightning talk in the first half of the day.**

Topics:
Submissions may be about (but are not limited to) the following topics:

- **geoQA tasks and spatial question types**
- **Comparison of geoQA approaches and systems**
- **geoQA question corpora and answer datasets**
- **geoQA metrics and validation approaches**
- **Knowledge systems and ontologies for geoQA**
- **Document datasets and retrieval systems for geoQA**
- **Machine learning for geoQA**
- **Phrase analysis, grammars and NLP for geoQA**
- **Entity disambiguation and georeferencing for geoQA**
- **Reasoners and algorithms for geoQA**