

Evolution of meaning and structure in language

The Media Technology and Creative Science research group at Leiden University is looking for a:

PhD candidate in Language, Cognition and Computation

This project aims to study cultural evolution and the emergence of meaning and structure in communication systems. The successful candidate will be supervised by Dr. Tessa Verhoef and will be part of the Media Technology and Creative Science research group at the Leiden Institute of Advanced Computer Science (LIACS). The PhD candidate will be designing, running and describing experiments and developing novel tools for analyzing structure in multi-modal data.

Examples of research activities include, but are not limited to: conducting experiments to simulate language emergence with human participants, using iterated learning, social coordination and artificial language learning methods, and implementing and testing software tools for quantitative analysis of 3D body tracking data and video of gestures and sign language. The precise focus of the project will be determined in collaboration with the candidate.

Selection Criteria

Candidates are required to have a Master's degree in one of the following fields (or equivalent): cognitive science, artificial intelligence, computer science, (computational) linguistics. Preferable qualifications include practical experience in running and analyzing experiments, strong programming skills, the ability to work independently, good writing and presentation skills and a passion for research.

Media Technology and Creative Science at Leiden University

Research in the context of our group crosses “computation” with “creativity”. A multidisciplinary approach is taken that includes artificial intelligence and constructive machine learning, as well as elements from cognitive science, philosophy, and creative arts. For more information about the Media Technology program, see <http://mediatechnology.leiden.edu>.

The Leiden Institute of Advanced Computer Science (LIACS) is the Computer

Science Institute in the Faculty of Science of Leiden University. LIACS strives for excellence in a caring Institute. We believe that doing good science is fun, and goes hand in hand with a driven yet friendly culture. For more information about LIACS, see <https://www.cs.leiden.edu/>.

Leiden is a lively and beautiful city with a central location in Europe, at only 20 minutes from Schiphol International Airport. It is a typical university city, hosting the oldest university in the Netherlands (1575), and also a very international city where almost everybody speaks English. The University permeates the local surroundings; University premises are scattered throughout the city, and the students who live and study in Leiden give the city its relaxed yet vibrant atmosphere.

Leiden University is one of Europe's foremost research universities, with 16 Nobel prizes, more than 100 nationalities and a budget of more than 550 million Euros. This prominent position gives our graduates a leading edge in applying for academic posts and for functions outside academia.

For more information, see <http://workingat.leiden.edu/>.

Terms and conditions

We offer a full-time one year term position with the possibility of three-year renewal after a positive evaluation. Salary range from € 2,222,- to € 2,840,- gross per month (pay scale P, in accordance with the Collective Labour Agreement for Dutch Universities).

Leiden University offers an attractive benefits package with additional holiday (8%) and end-of- year bonuses (8.3 %), training and career development and sabbatical leave. Our individual choices model gives you some freedom to assemble your own set of terms and conditions. Candidates from outside the Netherlands may be eligible for a substantial tax break.

All our PhD students are embedded in the Leiden University Graduate School of Science: <https://www.universiteitleiden.nl/en/science/graduate-school-of-science>. Our graduate school offers several PhD training courses at three levels: professional courses, skills training and personal effectiveness. In addition, advanced courses to deepen scientific knowledge are offered by the research school.

Diversity

Leiden University is strongly committed to diversity within its community and especially welcomes applications from members of underrepresented groups.

Information

Enquiries or any questions about the procedure can be made by sending an e-mail to t.verhoef@liacs.leidenuniv.nl. The envisioned start date for the project will be September 1st.

Applications

To apply for this vacancy, please ensure that you send the following documents to t.verhoef@liacs.leidenuniv.nl before the deadline, July 15, 2018:

- Your curriculum vitae;
- A motivation letter;
- A link to (a draft of) your Master's thesis, and other publications (if any);
- The name of two references (who agreed to support the application).