

The Ruhr area, one of Europe's largest metropolitan regions, offers attractive career opportunities for excellent scientists and scholars from around the world. In 2021, Ruhr-Universität Bochum, TU Dortmund University and the University of Duisburg-Essen established the Research Alliance Ruhr to bundle their cutting-edge international research on the most urgent challenges facing humankind. There will be four research centers and a college. This is just the latest chapter in our long-standing collaboration as the University Alliance Ruhr (UA Ruhr), a community of 14,000 researchers and 120,000 students in the heart of Germany.

As part of the Research Alliance Ruhr, the Research Center Trustworthy Data Science and Security (RC Trust) is seeking to fill the following position at the Faculty of Engineering, Department of Computer Science and Applied Cognitive Science, University of Duisburg-Essen as soon as possible:

## Professorship (W3) for Human Understanding of Machines and Algorithms

### Your Responsibilities

The successful candidate will conduct research in the area of "Human Understanding of Machines and Algorithms" from the perspective of psychology or related social sciences. Research should address the complex interaction of human users and technical systems (especially intelligent technology and algorithms that can rely on artificial intelligence and, for example, machine learning) from a user-centric perspective. The teaching load is reduced to four weekly hours per semester. The successful candidate is expected to contribute to English-taught courses in the Master's degree programs.

### Your Qualifications

We are seeking an outstanding scientist who holds an excellent PhD and has published excellent, internationally visible empirical work in the area of human-technology-interaction. This should be in at least one of the following areas:

- Human attributions to machines (e.g., Theory of Mind, Trust),
- Human understanding of algorithms in social media (e.g., microtargeting),
- Interaction with complex and intelligent systems (e.g., robots, speech assistants, chatbots),
- Interaction with algorithmic recommendation and decision support systems (e.g., medical decision support).

Regarding methodology, a broad expertise in empirical methods is desirable, for example with a view to experimental designs. Experience in interdisciplinary research and the willingness and ability to combine own psychological-empirical approaches with collaboration in the area of computer science, machine learning, data analysis, statistics or cyber security is expected.

We expect publications in high-ranked, peer-reviewed journals and broad experience in conducting research in self-acquired, competitive third-party funded projects (specifically DFG, NSF or similar). A strong connection to international research communities as well as research related experiences abroad is desirable. Strong social and leadership and management skills and willingness to participate in academic self-administration complete your profile and the corresponding experience needs to be documented in the application. In addition, the recruitment criteria of Sections 36 and 37 of the North Rhine-Westphalia Higher Education Act (Gesetz über die Hochschulen des Landes Nordrhein-Westfalen, HG NRW) apply.

### Attractive Environment

The professorship will be part of the newly established Research Center Trustworthy Data Science and Security. The Center will enable research that connects psychology, computer science, statistics and cyber security in order to empower humans to understand, control and verify artificial intelligence technology as well as modern machine learning in (semi-)automated decision making.

The Research Center is linked to all three member universities of the University Alliance Ruhr. We offer you an excellent scientific environment and attractive opportunities for collaboration with renowned international, national, and regional partners. The professorship advertised here will be closely associated with the department of computer science and applied cognitive science at the University of Duisburg-Essen. The department enjoys an excellent international reputation based on its interdisciplinary research profile on interactive systems. It has a strong track record of acquiring major extramural support for collaborative research funds (e.g., DFG-RTG 2167: User-Centred Social Media).

### Research Alliance Ruhr

The Research Alliance Ruhr is a joint undertaking of the three major universities in the Ruhr area and was initiated by the Ruhr Conference. The four research centers will focus on "One Health", "Chemical Sciences and Sustainability", "Trustworthy Data Science and Security", and "Future Energy Materials and Systems". In addition, the Research Alliance Ruhr is establishing a "College for Social Sciences and Humanities".

The Research Alliance Ruhr will appoint up to 50 research professors in the next few years and also offer numerous positions for research assistants. Join us now to create innovations for the world of tomorrow in Europe's densest university landscape, where you can find a wide range of scientific and industrial partners right on the doorstep.

### Your Application

If you are interested in the position, please send your application in a single PDF file by **August 9, 2022** to: [dekanat@iw.uni-due.de](mailto:dekanat@iw.uni-due.de)

Please provide the usual documents: (1) CV, (2) list of publications, (3) documents demonstrating your academic and professional career, including copies of certificates, (4) an exposé of your research profile with reference to its relevance for the Research Center, (5) a list of successful external grant applications, (6) an overview of your experience in academic self-administration, and (7) a teaching-learning concept including information on your previous teaching activities.

Please address any questions to Professor Dr. Nicole Krämer ([nicole.kraemer@uni-due.de](mailto:nicole.kraemer@uni-due.de)).

### Our Welcome Services

Our Welcome Services are happy to assist especially international applicants and their families with relocating to the Ruhr area, an up-and-coming metropolitan region. We can advise you on housing in urban or more rural areas and help you find childcare if needed. Our Dual Career Service can help your partner with their own professional development in the region if requested.

### Diversity

The UA Ruhr promotes diversity and equal opportunities. We strive to significantly increase the percentage of women in research and teaching and therefore welcome applications from female academics. We give preference to severely disabled applicants if their qualifications meet the requirements.

### Further Information

Further information about the Research Center Trustworthy Data Science can be found at: [www.rc-trust.ai](http://www.rc-trust.ai)

There you will also find the advertisements for other open professorships of the RC Trust.