



UA RUHR

CENTER FOR TRUSTWORTHY
DATA SCIENCE AND SECURITY

RESEARCH ALLIANCE

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 University 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 are four research centers and a college. This is just the latest chapter in our longstanding collaboration as the University Alliance Ruhr (UA Ruhr), a community of 14,000 researchers and 120,000 students in the heart of Germany.

The Research Center Trustworthy Data Science and Security is looking for a full-time postdoc (part-time possible) to pursue independent research projects for two years. Payment according to public service's agreement: TV-L E14. The open PostDoc position shall strengthen our interdisciplinary research team in any of the overarching research areas Psychology & Social Sciences, Artificial Intelligence & Machine Learning, Data Science & Statistical Learning, and Cybersecurity & Privacy and their interfaces.

PostDoc position in Machine Learning (2 Years) m/f/d

Your Research Interests

We expect a sound knowledge of the fundamentals of machine learning, with an emphasis on one or more of the following topics:

- Interpretable Machine Learning
- Fairness and Transparency of Machine Learning
- Game Theory for Interpretable ML
- Automatic Machine Learning
- Hyperparameter Optimization
- Representation Learning
- Anomaly Detection
- Uncertainty Quantification
- Counterfactual Explanations
- Robustness Guarantees for Machine Learning

In particular, we encourage applications in Machine Learning for Time Series, Data Streams, Graphs, or similar complex data sets. In case you stem more from a theoretical research area, your research in Machine Learning is linked with game theory, information theory, statistical tests, as well as multi-criteria optimization.

In addition, interest in chemistry is beneficial, as some applications in this area are envisioned.

YOUR QUALIFICATIONS

- PhD in computer science, statistics, math, or related fields
- High degree of creativity, commitment, analytical competence, and interdisciplinary teamwork
- High proficiency in English, both written and spoken for your scientific publications and presentations

WHAT WE OFFER

We work in a multidisciplinary team on collaborative research projects jointly envisioned by leading international experts from different domains. We aim at both theoretical research as well as practical applications in close collaboration with academic and industrial partners. The position is embedded in a creative, attractive, and internationally renowned research environment. With your research, you will play a primary role in the development of our new Research Center and outreach with trustworthy technology to the general public. Our international network of researchers and industry partners ensures a seamless transition into your next career step as university professor or international research institutions. A balanced and family-friendly work-life relationship is important to us; thus, we offer options for flexible working times or part-time remote home-office.

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 focus on "One Health Ruhr," "Chemical Sciences and Sustainability," "Trustworthy Data Science and Security," and "Future Energy Materials and Systems." In addition, the Research Alliance Ruhr has established 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 positions, please send your application (Ref-No. w105-23) until 26th February 2024 to:

**Research Center Trustworthy
Data Science and Security Technische
Universität Dortmund
Prof. Dr. Emmanuel Müller
Joseph-von-Fraunhofer-Str. 25
44227 Dortmund**

open-positions@rc-trust.ai

Please provide the usual documents: motivation letter, CV, and copies of your certificates.

CAREER OPPORTUNITIES

Our Research Center will hire 12 research professors in the next few years and offer numerous positions for research assistants and research group leaders. Join us now to create trustworthy innovations for the digital world of tomorrow in Europe's largest metropolitan region.

DIVERSITY

The TU Dortmund University promotes diversity and equal opportunities. Convince us with your personality and expertise.

Applications from women will be given preferential treatment in accordance with the legal regulations. It is pointed out that the application of suitable severely disabled persons is desired.

FURTHER INFORMATION

If you have any further questions, please contact:

Prof. Dr. Emmanuel Müller

<https://rc-trust.ai>