Two PhD positions in Statistics at the Ruhr-University Bochum and the Karlsruhe Institute of Technology, Scientific Computing Center (SCC).

The groups "Stochastics" at the Ruhr-University Bochum (Prof. Dette https://math.ruhr-uni-bochum.de/en/faculty/professorships/stochastics/group-dette/)

and

"Methods for Big Data" at the Karlsruhe Institute of Technology, SCC (Prof. Klein, KleinLab, https://kleinlab-statml.github.io/index.html)

invite applications for two PhD student (TV-L, E13) in high-dimensional spatio-temporal copula modelling, starting on

October 1, 2024.

The successful candidates will contribute to the development of novel statistical methods that leverage the potential of statistical testing and Bayesian learning to induce sparse yet flexibly varying dependence structures between multiple outcomes that are observed over space and time.

The positions will be associated with the newly founded Collaborative Research Center (CRC) TRR 391 "Spatio-temporal Statistics for the Transition of Energy and Transport", funded by the German Research Foundation (DFG). One position will be in Bochum, the other in Karlsruhe and jointly supervised by Prof. Dette and Prof. Klein.

The CRC/TRR 391 is highly interdisciplinary, integrating data-driven and knowledge-driven modeling approaches from statistics, data science, mathematics, computer science, electrical engineering, economics, and transportation/logistics, to create comprehensive solutions for tackling urgent problems arising in the transition to a low-carbon economy and renewable economies. The CRC/TRR 391 models, estimates and predicts spatio-temporal processes occurring in economic and technical applications.

You can look forward to:

* An excellent research environment and a vibrant interdisciplinary community

* Research that pushes the boundaries of what can be achieved in spatio-temporal data settings with statistical modeling techniques and artificial intelligence

* Structured supervision and courses that will prepare you for excelling within the respective disciplines, but also for crossing borders between them, including transferable skills and career development

 * A welcoming and international research campus with a long tradition of interdisciplinary work in the data sciences

The prerequisite for a PhD appointment is a diploma or master's degree in statistics or data science, or alternatively mathematics, computer science, economics, or related programs (with a focus on statistics or data science).

Please send complete applications with the usual documents (curriculum vitae, diplomas, list of publications if applicable) including a motivation as a single pdf until July 20, 2024, to

Prof. Holger Dette (holger.dette@rub.de) if you apply for the position in Bochum
Prof. Nadja Klein (nadja.klein@tu-dortmund.de), if you apply for the position in Karlsruhe