Technische Universität Dresden

TUD Dresden University of Technology, as a University of Excellence, is one of the leading and most dynamic research institutions in the country. Founded in 1828, today it is a globally oriented, regionally anchored top university as it focuses on the grand challenges of the 21st century. It develops innovative solutions for the world's most pressing issues. In research and academic programs, the university unites the natural and engineering sciences with the humanities, social sciences and medicine. This wide range of disciplines is a special feature, facilitating interdisciplinarity and transfer of science to society. As a modern employer, it offers attractive working conditions to all employees in teaching, research, technology and administration. The goal is to promote and develop their individual abilities while empowering everyone to reach their full potential. TUD embodies a university culture that is characterized by cosmopolitanism, mutual appreciation, thriving innovation and active participation. For TUD diversity is an essential feature and a quality criterion of an excellent university. Accordingly, we welcome all applicants who would like to commit themselves, their achievements and productivity to the success of the whole institution.

At the **Faculty of Computer Science, Institute of Theoretical Computer Science,** the **Chair of Algorithmic and Structural Graph Theory** offers a position as

Research Associate / PhD Student (m/f/x)

(subject to personal qualification, employees are remunerated according to salary group E 13 TV-L)

with a **flexible starting date in 2026**. The position is initially limited to three years, with the possibility of extension. The period of employment is governed by the Fixed Term Research Contracts Act (WissZeitVG). The position aims at obtaining further academic qualification (usually PhD).

We are looking for highly motivated candidates with a strong background in theoretical computer science (in particular, algorithm design). The successful applicants will take part in the research and teaching activities at the Chair of Algorithmic and Structural Graph Theory.

The main research area is the design and analysis of graph algorithms, with possible focus areas including parameterized algorithms, structural graph theory, graph symmetries and similarities, and algorithmic model theory.

Tasks:

- scientific research activities in the above research areas, with the goal of publishing and presenting results at top-tier TCS venues
- contribution to the teaching activities of the chair in algorithmic topics, including mentoring of M.Sc., B.Sc. or Diploma students

Requirements:

- a university degree (M.Sc. or equivalent) or imminent M.Sc. degree in Computer Science, Mathematics, or a closely related field
- research experience, evidenced by publication(s) or a relevant M.Sc. thesis, good knowledge of algorithms and discrete mathematics
- excellent written and spoken English skills
- knowledge of German, or willingness to learn, is desirable since the position involves undergraduate teaching, e.g., exercise sessions

TUD strives to employ more women in academia and research. We therefore expressly encourage women to apply. The university is a family-friendly university. We welcome applications from candidates with disabilities. If multiple candidates prove to be equally qualified, those with disabilities or with equivalent status pursuant to the German Social Code IX (SGB IX) will receive priority for employment.

Application: Please submit your detailed application with the usual documents (including CV, cover letter, transcript of records, link to Master thesis (if already completed), and the names, affiliation, and e-mail addresses of two references) by **May 22, 2026** (stamped arrival date of the university central mail service or the time stamp on the email server of TUD applies), preferably via the TUD SecureMail Portal

https://securemail.tu-dresden.de by sending it as a single pdf file to kerstin.achtruth@tu-dresden.de or to:

TU Dresden, Chair of Algorithmic and structural graph theory, Prof. Daniel Neuen, Helmholtzstr. 10, 01069 Dresden, Germany.

Please submit copies only, as your application will not be returned to you. Expenses incurred in attending interviews cannot be reimbursed.

TUD is a founding partner in the DRESDEN-concept alliance.

DRESDEN concept

Reference to data protection: Your data protection rights, the purpose for which your data will be processed, as well as further information about data protection is available to you on the website: https://tu-dresden.de/karriere/datenschutzhinweis.