



With more than 15,000 students and 3,800 employees, the **Technische Universität Braunschweig** is one of Germany's leading institutes of technology. It stands for strategic and performance-oriented thinking and acting, relevant research, committed teaching, and the successful transfer of knowledge and technologies to the economy and society. We consistently advocate for family friendliness and equal opportunities.

Our research focuses are mobility, engineering for health, metrology, and city of the future. Strong engineering and natural sciences are our core disciplines. These are closely interconnected with economics, social and educational sciences and humanities.

Our campus is located in the midst of one of the most research-intensive regions in Europe. We work successfully together with over 20 research institutions in our neighborhood as we do with our international partner universities.

Starting from 01.01.2027 or later the Division for Cryogenic Quantum Electronics of the Institute for Electrical Measurement Science and Fundamental Electrical Engineering is looking for a

Research Associate / Postdoc (m/f/d) in the field of Cryogenic Quantum Electronics (EG 13 TV-L, full-time)

The position is to be filled on a fixed-term basis for an initial period of 2 years. The successful applicant will be given the opportunity to pursue a further scientific qualification (habilitation).

The Division of [Cryogenic Quantum Electronics](#), led by Prof. Dr. Oleksandr Dobrovolskiy, investigates fascinating physical phenomena governing the dynamics of magnetic and superconducting systems and develops quantum electronic devices based on these principles. Its research bridges materials science, experimental physics, electrical measurement science, and metrology. To strengthen the research group and advance its cutting-edge research in cryogenic quantum electronics, we are seeking a Postdoctoral Researcher (m/f/d) with demonstrated expertise in experimental low-temperature physics.

Your tasks

- You will carry out research in the area of cryogenic and quantum electronics, with a focus on experiments at mK temperatures
- You will apply for and work on research projects
- You will perform measurements in a dilution refrigerator and other cryogenic setups, develop, build and optimize cryogenic measurement platforms
- You will publish research findings in leading international journals and participate in national and international conferences
- You will be involved in teaching at the University (preparation and implementation of courses as well as supervision of students' work).

Your Qualifications

- You hold a completed university degree at Master's level or equivalent, as well as a completed PhD in a field relevant to the position (e.g. physics, electrical engineering, materials science, or a related field), and ideally have postdoctoral research experience
- You have experience with low-temperature experiments, ideally involving dilution refrigerators in the fields of superconductivity and/or magnetism, as well as good programming skills (e.g., Python, LabVIEW).
- You have knowledge of superconducting and/or magnetic devices, high-frequency and microwave engineering, nanotechnology, and/or quantum measurement techniques, or you are willing and able to acquire this expertise quickly
- You have excellent English language skills; knowledge of German is desirable
- You are flexible, can perform under pressure and work well in a team.

We offer

- Work on exciting future-oriented research topics in an inspiring work environment as part of the university community
- A vibrant campus life in an international atmosphere with lots of intercultural offers and international cooperations
- Pay in accordance with the collective agreement TV-L (a special payment at the end of the year as well as a supplementary benefit in the form of a company pension, comparable to a company pension in the private sector) including 30 days' vacation per year
- Flexible working and part-time options and a family-friendly university culture, awarded the "Family-friendly university" audit since 2007
- Special continuing education programs for young scientists, a postdoc program, as well as other offerings from the Central Personnel Development Department and sports activities.

Further notes

We welcome applicants of all nationalities. At the same time, we encourage people with severe disabilities to apply. Applications from severely disabled persons will be given preference if they are equally qualified. Please attach a proof of disability to your application. We are also working on the fulfilment of the Central Equality Plan based on the Lower Saxony Equal Rights Act (*Niedersächsisches Gleichberechtigungsgesetz*—NGG) and strive to reduce under-representation in all areas and positions as defined by the NGG. Therefore, applications from women are particularly welcome in this case.

The personal data will be stored for the purpose of processing the application. By submitting your application, you agree that your data may be stored and processed electronically for application purposes in compliance with the provisions of data protection law. Further information on data protection can be found in our data protection regulations at <https://www.tu-braunschweig.de/datenschutzerklaerung-bewerbungen>. Application costs cannot be reimbursed.

Deadline for applications is 31.10.2026.

Please send your application via email to oleksandr.dobrovolskiy@tu-braunschweig.de with the following documents in the PDF-format:

- Cover letter
- Curriculum vitae (CV)
- List of publications
- Brief summary of previous research / third-party projects (2 pages)
- Doctoral degree certificate
- Names of two references

Kontakt

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Application period: September 1, 2026 – October 31, 2026