With more than 16,000 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 [the earliest possible date], the [Institute for Electrical Machines, Traction and Drives] is looking for a Research Associate / Doctoral Candidate (m/f/d) in the field of Innovative Electrical Machines and Drives

(EG 13 TV-L, full-time/part-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 doctorate].

[Scientists at the IMAB are working on topics relating to electromobility, electric flight and industrial applications involving electric machines. Here, motors are scientifically analysed, designed, built and tested in the overall system in an interdisciplinary team. Detailed Infos: https://www.tu-braunschweig.de/imab/]

Your tasks

- You will design and implement new innovative control methods
- You have experience in modelling electrical drive systems
- You have experience in electromagnetic design, in the design of insulation systems or in the manufacture of electrical machines
- You will work scientifically in a team on interdisciplinary research projects on the design and manufacture of electrical machines
- You will publish research findings 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

- Curiosity, creativity and the ability to work in a team are important prerequisites for successful collaboration on our research topics
- You have experience in modelling electrical drive systems
- You have experience in the design, manufacture or operation of electrical machines
- You should have a bachelor's or master's degree in electrical engineering or mechatronics / mechanical engineering from a university or university of applied sciences
- You are aiming for a doctorate.
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 Gleichberechtigungs- gesetz—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.

Questions and Answers

For more information, please call Prof. Markus Henke on +49 (0) 531 391-[3914].

Deadline for applications is 15th of June 2024

Are you interested? Please send your application preferably via email to markus.henke@tu-braunschweig.de

or via mail to

Technische Universität Braunschweig
Institut für Elektrische Maschinen, Antriebe und Bahnen / IMAB
Prof. M. Henke
Hans-Sommer-Str. 66
38106 Braunschweig