

Job advertisement: PhD student at TU Braunschweig, Institut für Halbleitertechnik

Braunschweig University of Technology, with its 20.000 students and about 3.700 employees, is the largest University of Technology in northern Germany. We stand for a strategic and performance-oriented thinking and acting, for relevant research, motivated teaching and a successful transfer of knowledge and technology into industry and society.

TU Braunschweig (Institute of Semiconductor Technology) offers a position as a scientific staff (PhD student) in “Processing of GaN optoelectronic devices and development of hybrid integration techniques” in the group of Prof. Andreas Waag. The activities will be part of an BMBF project, based on the advanced infrastructure of the Epitaxy Competence Center (ec²), the Laboratory for Emerging Nanometrology (LENA) at Braunschweig and the Quantum Valley Lower Saxony (QVLS) consortium (<https://www.tu-braunschweig.de/ih/epitaxy-competence-center-ec2>, <https://www.tu-braunschweig.de/mib/lena>, <https://qvls.de/>).

Presently we are looking for talents worldwide, who would like to join our team. Here, we refer to the following open position:

PhD student: “Processing of GaN optoelectronic devices and development of hybrid integration techniques” (TV-L E13, 75%)

Job description:

- (1) Processing and characterisation of GaN based optoelectronic devices
- (2) Development and optimization of hybrid integration techniques for joining GaN with ion-trap chips
- (3) Publication of research results in scientific journals and international conferences
- (4) Project controlling and research reports

Job qualifications:

The main criterion is excellence, dedication, good communication and a fast learning curve. A master degree in electrical engineering, physics, nanotechnology (or similar) is a prerequisite. In addition, expert background in one or more of the following fields would be advantageous:

- (1) Expertise in III-nitrides and/or hybrid integration and bonding techniques

- (2) Strong interest in multidisciplinary research
- (3) Very high proficiency in English as well as excellent scientific writing skills for collaborative research proposals and journal publications. Fluency in the German language is preferable.
- (4) Committed, self-motivated, self-driven, and proactive team player with good communication and interpersonal skills.

Depending on the assignment of duties and fulfillment of personal requirements, payment is up to EG 13 TV-L (part-time 75 %, a reduction to a 50% position is possible). Contract duration will be three years with the possibility to a further extension. Application costs cannot be reimbursed. Personal data will be stored for the purposes of the application process. TU Braunschweig is an equal opportunity employer committed to excellence through diversity. Disabled persons will be given preference in the case of equal suitability (proof must be enclosed). Applications from people of all nationalities are welcome. The TU Braunschweig strives to reduce underrepresentation in all areas and positions in the sense of the NGG. Therefore, applications from women are especially welcome.

How to apply and contact:

Please send a complete written application (in English) as a single PDF file consisting of a cover letter (statement of purpose), full CV, academic certificates and transcripts (bachelor, master, and if applicable PhD), and other supporting certificates to Dr.-Ing. Jana Hartmann (E-mail: Jana.Hartmann@tu-braunschweig.de). With sending the application via email the candidate agrees that personal data will be stored for the purpose of the application procedure and that the application can be forwarded internally to other job offers.

Postal applications can be send to Institut für Halbleitertechnik, Jana Hartmann, Hans-Sommer-Str. 66, 38106 Braunschweig.