IHP GmbH -
Leibniz Institute for High Performance Microelectronics/
Leibniz-Institut für innovative Mikroelektronik

Student Assistant (m/f/d) – Scanning Electron Microscopy and Sample Analysis

Job-ID: 70711/26 | Department: Technology | Working Time: 19h/week | Limitation: 3-6 months | Entry Date: as soon as possible | Salary: as per Guideline of the State of Brandenburg on the Working Conditions of Scientific and Student Assistants

The IHP – Leibniz Institute for High Performance Microelectronics is an internationally recognised research institute developing key electronic and photonic technologies for future applications. In interdisciplinary teams, we combine excellent research with industry-oriented development. IHP operates a pilot line close to industrial practice for micro- and nanoelectronics and offers a challenging research environment at the interface of technology, analytics, and application.

Why this position is interesting

You will support the preparation, execution, and evaluation of electron microscopy investigations on samples from micro- and nanoelectronics. For this purpose, we are looking for a committed **Student Assistant (m/f/d)** in the field of **Scanning Electron Microscopy (SEM)**.

The position offers practical insight into the preparation, analysis, and evaluation of samples from micro- and nanoelectronics. Depending on your interests and qualifications, there is also the possibility of developing this activity into a study project or thesis, for example in the field of ECCI (Electron Channeling Contrast Imaging).

Your responsibilities

- Preparation of samples for investigations using scanning electron microscopy
- Support in carrying out SEM analyses, with the aim of gradually developing towards independent execution
- Evaluation and documentation of acquired measurement and image data
- Performance of supplementary measurements in the context of sample characterisation
- Support in the structured preparation and interpretation of investigation results
- Assistance with general experimental and organisational tasks in the laboratory environment

Your qualifications

Required

- Ongoing university studies, for example in Physics, Electrical Engineering, Materials Science, Microsystems Engineering, Nanotechnology, or a comparable degree programme
- Interest in microscopy, material characterisation, and microelectronic topics
- Careful, structured, and reliable way of working
- Technical understanding and enthusiasm for practical laboratory work
- Good written and spoken German or English skills

Advantageous

- Initial knowledge in the field of scanning electron microscopy or material analysis
- Experience with experimental laboratory work
- Interest in the evaluation and interpretation of scientific measurement data
- Basic understanding of imaging principles, in particular with regard to depth of field, contrast, and visual image characteristics

What you can expect from us

At IHP, you will work in a challenging and research-oriented environment with modern technical infrastructure and close links between research and practical implementation. In particular, this position offers you:

- A practical entry into a highly relevant research field
- Insight into modern methods of material and failure analysis in microelectronics
- Collaboration in an interdisciplinary, collegial, and supportive team
- Flexible working hours in coordination with your studies
- The opportunity to develop a topic for a study project or thesis from this position, for example in the field of ECCI (Electron Channeling Contrast Imaging)

A structured induction process will support your introduction to the working environment and the analytical methods.

Equal opportunities and inclusion

IHP is TOTAL E-QUALITY certified and actively committed to equal opportunities and diversity. We welcome applications regardless of gender, nationality, ethnic or social origin, disability, age, or sexual orientation.
Applicants with severe disabilities will be given preference in the case of equal qualification.

Your application:

Have we sparked your interest? Then we look forward to receiving your application via our **online application form.**

For further information regarding the position please contact Dr. Herfurth: career@ihp-microelectronics.com.