universität freiburg

The LHCb groups at the Institute of Physics of the University of Freiburg are looking to appoint

Up to two Research Associates (f/m/d)

to work in the areas of flavour physics analyses, detector operation, or detector development.

The LHCb experiment has established itself over the past decade as the world's foremost flavour factory with its unique access to all types of heavy flavour hadrons and the ability to perform precision measurements on their decay products. The recently upgraded experiment pushes the boundary both in terms of detector technology and analysis capability with the first major collider experiment exploiting a full software trigger and real-time analysis system. The ultimate flavour frontier is targeted with LHCb Upgrade II, which is being developed to accumulate a total dataset corresponding to an integrated luminosity of 300 fb^{-1}, thus ensuring the full exploitation of the HL-LHC also in the flavour sector.

Prof. Dr. Gersabeck is a leading member of the LHCb collaboration and has established a new group at the University of Freiburg in 2024. You will find well equipped office and lab space dedicated to the group and be supported by experienced engineers and technicians with access to a large workshop that is part of the Institute of Physics. The group covers a broad range of activities, which are to a large extent based on Prof. Gersabeck's previous activities. These include:

- Flavour physics analyses, including CP violation studies in charm and beauty hadrons and studies of semileptonic decays
- Operational aspects of the upgraded LHCb detector, with a focus on the SciFi and RTA projects
- Development and construction of detector components for the LHCb Upgrade II, in particular for both Mighty Tracker components, the cryogenic scintillating fibre detector and the HV-MAPS based pixel detector.

The post holders are expected to contribute ideally to two of these research areas. Prior experience in these specific areas, while advantageous, is not essential. The posts are suitable for recent graduates, those firmly on course to graduating within 2026, or for more experienced postdocs. We aim to give an initial two-year contract and extensions are possible subject to funding. The salary will be determined in accordance with TV-L E13.

You are expected:

- To have or be about to obtain a PhD in particle physics or equivalent qualification,
- To have experience in analyses, detector operation, or detector development and/or construction for particle physics experiments,
- To be able to publish your findings,
- To be able to communicate to a range of audiences and have experience in presentations outside your experiment,
- To be able to contribute to the supervision of undergraduate and postgraduate students,
- To be able to conduct multiple projects in parallel and to document their progress,
- To be willing to travel as required, and
- To be willing to engage in professional development as required.

You can expect:

- Flexible work time models,
- Attractive sports opportunities and after-work activities,
- A group that values equity of access and diversity,
- Reduced-price public transport passes (Jobticket BW or Deutschlandticket), and
- Free professional development opportunities within the University.

Knowledge of the German language is not required, though a willingness to learn German, if applicable, is advantageous. The University offers a range of language classes for all levels.

The University of Freiburg is dedicated to the principles of equal opportunity and diversity and welcomes applications from all qualified candidates regardless of gender, nationality, ethnic and social background, religion/belief, disability, age, or sexual orientation.
Applicants with disabilities will be given preferential consideration in case of equal qualification.

Application

Your application should include

- A cover letter outlining your suitability to the post
- CV including list of recent talks and your most relevant publications (with contribution statements for multi-author papers)
- Names and contact details of two referees, one of which must not be from your current institute (references will be requested for shortlisted candidates)

Please send your application in English including supporting documents mentioned above by email to Aurélie Mathar (aurelie.mathar@physik.uni-freiburg.de). Applications received by 20.01.2026 will receive full consideration.

Contact

For further information or informal discussions, please contact
Prof. Dr. Marco Gersabeck (marco.gersabeck@physik.uni-freiburg.de) or
Dr. Evelina Gersabeck (evelina.gersabeck@physik.nui-freiburg.de), or visit
https://uni-freiburg.de/flavour-physics/