



PhD position (f/m/x) on Experimental Physics – CRC 1238 ‘Control and dynamics of quantum materials’

Institute of Physics II | AG Lindfors–Vrejoiu

We are one of the largest and oldest universities in Europe and one of the most important employers in our region. Our broad range of subjects, the dynamic development of our main research areas and our central location in Cologne make us attractive for students and researchers from around the world. We offer a wide range of career opportunities in science, technology, and administration.

A PhD position (f/m/x) is available at Institute of Physics II of University of Cologne starting from 1st February 2025. The research project is part of the Collaborative Research Centre 1238 (project A01), under the supervision of Dr Ionela Lindfors–Vrejoiu (<https://ph2.uni-koeln.de/arbeitsgruppen/loosdrecht/subgroup-lindfors-vrejoiu>)

YOUR TASKS

- » The project is about the design of oxide heterostructures for the generation of topologically non-trivial ferromagnetic and ferroelectric textures
- » The candidate has to hold a Master of Science degree in Physics or Materials Science and should demonstrate knowledge and practical experience in thin film growth techniques, magnetometry and Magnetotransport
- » Measurements of thin films
- » Hands-on experience with scanning probe microscopy techniques such as piezoresponse force Microscopy or magnetic force microscopy is advantageous

YOUR PROFILE

- » Excellent academic record
- » M.Sc. degree in Physics or a related discipline
- » Knowledge of relevant experimental methods
- » Research experience relevant for the thesis project
- » Excellent English skills
- » High motivation, commitment, good communication skills and team spirit are an asset

WE OFFER

- » An exciting research project at the forefront of research on quantum matter
- » Working in an international collaborative team
- » A diverse working environment with equal opportunities
- » Support in balancing work and family life

- » Extensive advanced training opportunities
- » Occupational health management offers
- » Flexible working time models

The University of Cologne promotes equal opportunities and diversity. Women will be considered preferentially in accordance with the Equal Opportunities Act of North Rhine–Westphalia (Landesgleichstellungsgesetz – LGG NRW). We also expressly welcome applications from all suitable candidates regardless of their gender, nationality, ethnic and social origin, religion, disability, age, sexual orientation and identity.

The position is available from 15.02.2025 on a part-time basis (19,92 hours per week for the first year and 29,87 hours afterwards). The contract is initially limited to three years. If the applicant meets the relevant wage requirements and personal qualifications, the salary will be based on remuneration group 13 TV-L of the pay scale for the German public sector.

Please apply online with proof of the required qualifications without a photo under: <https://jobportal.uni-koeln.de>. The reference number is Wiss2410-20. The application deadline is 08.12.2024.

For further inquiries concerning the task/project, please contact Dr Ionela Lindfors–Vrejoiu (vrejoiu@ph2.uni-koeln.de). For further inquiries concerning questions on the application Dr Matteo Cacco (sfb1238.buero@ph2.uni-koeln.de).