

External Job Announcement Reg.-Nr. 5-12191/24-D

At the Martin Luther University Halle-Wittenberg, Faculty of Natural Sciences III, Institute of Agricultural and Nutritional Sciences, Chair of Plant Nutrition, the Graduate School AGRIPOLY II (sub-area Agri-EXPLORE) is seeking, to fill the temporary, initially for three years, position of a

PhD position (m-f-d)

in filled part-time (65%) at the earliest possible date.

Salaries will be according to Entgeltgruppe 13 TV-L, depending on the assigned tasks and individual qualifications.

Tasks:

- Work on the *EURECA* research project: *Enhancing Universal Crop Resilience by Harnessing Organellar Calcium Signalling*. Calcium functions as a second messenger in plants and therefore plays a central role in their response to environmental stress. This project aims to elucidate specific mechanisms of calcium-dependent signalling and to employ them to improve crop resilience
- Project-specific tasks: Elucidation of the role of organellar Ca^{2+} transport proteins in the resistance of crops (*Brassica rapa* and barley) to stress factors. Analysis of the regulation of free Ca^{2+} in response to environmental stresses. Elucidation of downstream mechanisms involved in Ca^{2+} -mediated crop resilience
- Project-specific methods: Transformation and genome editing of barley, *B. rapa* and Arabidopsis, phenotypic analyses, photosynthesis and gas exchange measurements, ionomics, Ca^{2+} imaging at different scales (subcellular to whole plant), transcriptome analyses, live cell imaging (CLSM)
- Preparation and presentation of research results at seminars and conferences
- Preparation of research reports and publications

The opportunity to obtain your own academic qualification as part of a doctorate is given.

Requirements:

- MSc degree (or equivalent) in biology, biochemistry or a similar area
- A strong interest in functional plant biology and mechanisms of crop resilience
- Excellent knowledge of molecular and cell biology
- Practical experience in molecular biological, biochemical, and microscopic techniques
- Practical experience in project-specific methods desirable
- Excellent English language skills (written and spoken)
- High level of intrinsic motivation and ability to work in a team

Applications from severely disabled persons with equal aptitude and qualifications will be given preferential consideration. Women are strongly encouraged to apply. Applicants with a degree that was not obtained at a German university must submit a Statement of Comparability for Foreign Higher Education Qualifications from the Central Office for Foreign Education (<https://www.kmk.org/zab/central-office-for-foreign-education>) as proof of equivalence.

Information about us and our work can be found at www.landw.uni-halle.de/pe. If you have any questions, please contact Prof Dr. Edgar Peiter, Tel.: +49 345 55 22 420, e-mail: edgar.peiter@landw.uni-halle.de.



Please send your application to Martin Luther University Halle-Wittenberg, Faculty of Natural Sciences III, Institute of Agricultural and Nutritional Sciences, Prof. Dr. Edgar Peiter, 06099 Halle (Saale), by 16. December 2024, quoting reg. no.: 5-12191/24-D, together with the usual documents, including CV, transcripts of record and two references. Please send your application documents preferably by e-mail (one single pdf document) to edgar.peiter@landw.uni-halle.de.

The job vacancy may be subject to budgetary restrictions.

Application costs will not be reimbursed by Martin Luther University. Application documents will only be returned if a prepaid return envelope is enclosed. An electronic application is welcome.