



The Leibniz-Institute of Vegetable and Ornamental Crops (IGZ) conducts research in horticulture and related sciences, to promote a sustainable production of vegetable and ornamental crops. We are a plant science institute, with a view on the use of plants as food and in our living environment.

Our group is interested to unravel the molecular mechanisms of plant-pathogen interactions. This knowledge will help us to devise strategies for the development of horticultural production systems with less environmental impact.

In a project funded by the Deutsche Forschungsgemeinschaft (DFG) on the subject "Functional analysis of bacterial type-III effectors in plants" we are looking for an enthusiastic and ambitious

PhD student in Plant-Pathogen Interactions (Reference number: 17/2018/1)

Employment will be initially for three years.

The salary will be based on qualification and research experience according to the wage agreement TV-L, salary domain east, up to EG 13 (65% of the regular working time).

The current PhD project aims at the characterization of novel effector targets in plants and the elucidation of their roles in plant defence responses.

Tasks include

- Generation of DNA constructs for protein expression in plants, yeast and bacteria
- Infection of plants with bacteria
- Identification and characterization of protein-protein interactions using the yeast two-hybrid system and bi-molecular fluorescence complementation
- Characterization of induced defense responses in plants using molecular, cellbiology and modern genomics approaches

We are looking for candidates with

- a MSc degree or diploma in biology or related field with a strong emphasis on molecular and cellular biology
- a firm background in the field of plant-pathogen interactions
- good proficiency in English (both oral and written) and a good working knowledge of German

We offer

- an inspiring and dynamic research environment, including state-of-the art research facilities
- extensive supervision and an exciting project of considerable fundamental and applied relevance
- a place of employment located close to the city of Berlin

Please send a strong motivation letter stating why this is an interesting topic for you and why you have the right attitude and expertise to make progress in this field. Also send your CV, names of two references and indicate your earliest possible starting date.

Contact: Prof. Frederik Börnke (+49(0)33701 78 219; boernke@igzev.de). Further information can also be found in recent publications from our lab (e.g. Albers et al. (2018) BioRxiv doi: <https://doi.org/10.1101/409235>; Üstün and Börnke (2015) Plant Physiol. 168: 107; Üstün et al., (2014) Mol Plant Microbe Interact doi: 10.1094/MPMI-12-13-0363-R; Üstün et al., (2013) Plos Pathogens 9(6): e1003427).

IGZ is an equal opportunity employer. Handicapped people with equal qualifications will be employed preferentially. Please send your application citing the reference number by November 7th 2018 to: Personalbüro, Institute for Vegetable and Ornamental Crops, Theodor-Echtermeyer-Weg 1, D-14979 Großbeeren or online in pdf-format to personal@igzev.de.