

PhD Student



The German Center for Neurodegenerative Diseases (DZNE) is a unique non-university research center dedicated to the subject dementia and all its areas, as well as other neurodegenerative diseases. The DZNE stands for excellence in research and science management, translation of scientific results into practice, interdisciplinarity and internationalization. With over 1000 employees from 55 nations, spread over 10 sites in Germany, the DZNE is one of the leading research centers in the field.

This position will be based in the Aging & Cognition Research group (www.wolberslab.net), which seeks (i) to understand fundamental mechanisms of cognitive aging under naturalistic conditions, (ii) to establish novel clinical assessment tools, and (iii) to develop interventions that help maintain people's independence. With a strong focus on spatial cognition and navigation, we employ a unique combination of advanced virtual reality and cutting-edge neuroscience tools.

What we are looking for:

Function: PhD student (f/m)

Start date: ASAP

Location: [DZNE Magdeburg](#)

Who we are and what we do:

Research focus: Cognitive Neuroscience research on spatial navigation, aging and dementia

Team: International and interdisciplinary research team, including cognitive scientists, psychologists, biologists and physicists

Environment: Research dedicated 3T and 7T MRI scanners

Cutting-edge virtual reality facilities

Mobile EEG, MEG, TMS and eyetracking systems

Active local network of neuroscience PhD students (<http://gp.cbbs.eu>)

What your role would look like:

Supervisors: Prof. Dr. Thomas Wolbers and Dr. Jonathan Shine

Project: With a combination of interactive VR technology and ultra-high field (7T) neuroimaging, you will characterize key mechanisms of spatial navigation in humans and examine how aging affects this fundamental cognitive ability

Tasks: Conduct neuroimaging experiments and use computational models to test novel predictions for spatial coding in humans

If desired, be involved in teaching activities

Profile: BSc/MSc in psychology, cognitive neuroscience, neuroimaging methods or applied statistics

Strong interest in cognitive aging and virtual reality

Experience with Matlab and Python will be a plus

Fluent in English

Reliability, flexibility, passion