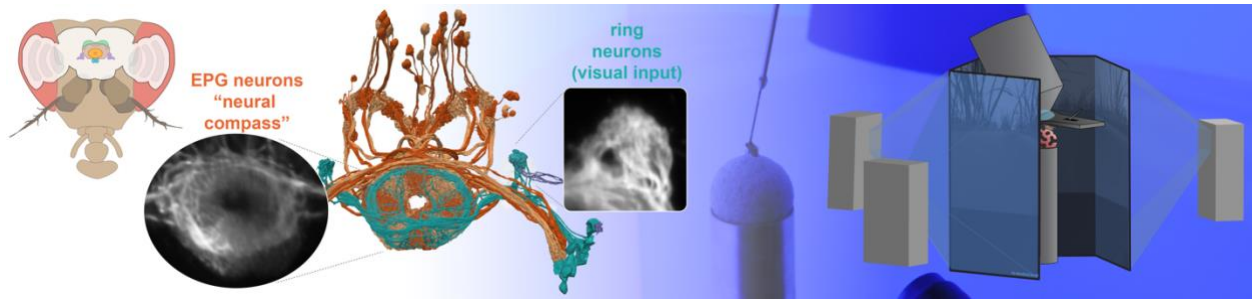


## Postdoctoral position – Neural circuit mechanisms of navigation



**Haberkern Lab**, Chair of Behavioral Physiology & Sociobiology (Zoology II), University of Würzburg

**Start:** June 1<sup>st</sup>, 2026

**Duration:** Up to 3 years

**Compensation:** TV-L scale, 100%

We are looking for a postdoc (f/m/d) with a **strong interest in studying how insects navigate** through diverse and dynamic environments. Your studies will be part of an Emmy Noether project investigating fundamental principles of robust navigation through comparative studies in fruit flies and ants.

We know that robust navigation requires abstract neural representations—such as a head-direction estimate or neural compass—that allow animals to stay oriented in a dynamic and complex world. **We study how the brain extracts relevant sensory cues and updates the neural compass.** In addition, we examine how environmental structure influences the choice of navigational strategies and how neural circuits adapt through structural plasticity. Check out our website ([www.haberkernlab.de](http://www.haberkernlab.de)) for a more information on our research and the team!

In our lab, **you will be trained in cutting-edge techniques** such as in-vivo two-photon calcium imaging combined with immersive virtual reality, connectomics, and quantitative analysis of behavior and circuit function. While your project will be focused on working with *Drosophila*, you will be introduced to other established and emergent insect models.

The ideal candidate has prior experience in **neurophysiology and *Drosophila* neural circuit studies**, but we are open to candidates with a PhD in a related topic who have a strong interest in neural circuits, navigation, and sensory processing. Programming skills, especially in python, are welcome.

Our research is interdisciplinary, creative and relies on a wide range of techniques. Thus, we strive to bring together a diverse group of people with different backgrounds and skill sets. Diverse teams produce more creative work, and we aim to generate an inclusive environment where everyone can thrive. The University of Würzburg is an equal opportunity employer. As such, we explicitly encourage applications from qualified women. Severely handicapped applicants will be given preferential consideration when equally qualified. Furthermore, this is a full-time position, but in certain cases a part-time employment can be considered.

### How to Apply

If you are interested, please submit your application via email (preferred, [hannah.haberkern@uni-wuerzburg.de](mailto:hannah.haberkern@uni-wuerzburg.de)) or by mail to Hannah Haberkern, Zoology 2, Biocenter, Am Hubland, 97074 Würzburg, Germany. Include a brief description of why you are interested in the position, what your goals and expectations for a postdoc are, your CV as well as contact information for potential references. If you have any questions, do not hesitate to reach out to Hannah.

The application period begins upon publication and ends no later than February 28<sup>th</sup>, 2026. Applications will be reviewed on a rolling basis until the position is filled. We look forward to hearing from you!