

HiWi Position

Communications Backbone of a Research Tractor

The **Chair of Agrimechatronics** at the **Technical University of Munich (TUM)** invites for applications for a HiWi Position. M/F/D. Applications from disabled persons with essentially the same qualifications will be given preference. TUM strives to raise the proportion of women in its workforce and explicitly encourages application from qualified women.



About the Position

For our research tractor we are developing a new communication backbone based on Zenoh for high-throughput applications. You will start out with setting up developing a tractor position provider and the in-vehicle network. In subsequent steps you will have the possibility to develop an UI for status monitoring and as an interface for future applications, and an interface to control the tractors movement via Zenoh.

The number of working hours can be from 8 to 20 hours per week, arranged on workdays that fit the student's schedule. The Chair of Agrimechatronics operates in Garching and Freising/Weihenstephan (Dürnast). Partially remote work is possible.

About us

The Chair of Agrimechatronics (Prof. Oksanen) studies especially Intelligent Machines for Agriculture. The research themes include topics like tractors and other agricultural vehicles and robots, tractor-implement automation, communication technologies for vehicles, navigation, guidance and planning, positioning systems, model-based control of mechatronic systems, drives and power systems, and robotic implements.

Your Qualifications

- Coding experience, preferably in Rust
- Linux experience, preferably also in embedded systems & networking
- Independent work style
- Previous experience in middlewares such as Zenoh or DDS is beneficial

Application Process

Start: as soon as possible. Send your application in English by email to henri.hornburg@tum.de with the title "HiWi Position Application" including

- A short email elaborating your background and motivation
- Curriculum vitae (CV) in English and current transcript of records of your studies