

The **Service Robotics Group** of University of Applied Sciences Ulm (HSU) is looking for a candidate joining our team at the earliest possible date. We invite applications for a full-time position as

## akademische Mitarbeiterin / akademischer Mitarbeiter Model-Driven Software Engineering and Tooling for Robotics

The service robotics group is one of the largest research groups at HSU. Our research projects link service robotics, industry 4.0 and intra-logistics.

We seek for a candidate that will assist us as software engineer in research for model-driven software engineering in robotics and will assist in design, development, implementation, delivering and extending model-driven development tools. These assist suppliers and users of software components for service robots in all stages of development and operation. The individual will work in close collaboration with partners from industry and academia.

## **Key responsibilities:**

- advancement of model-driven software development for service-robotics and of the according Eclipse-based tooling
- contributions to foundations (semantics, technical) of information models for software components (selection, configuration of functional and extra-functional properties) and linking them with Industry 4.0 concepts (OPC-UA)
- implement them in (cloud-based) tools spanning SmartSoft and ROS and integration of OPC-UA information models into our Eclipse-based toolchain
- realization of graphical / textual presentations (DSLs) and design and implementation of code generators for C++ (M2M, M2T)
- realization of software components for service robots and realization of industrial servicerobotics scenarios
- publishing and presentation of research results, preparation of documentation and tutorials

## **Requirements:**

- Master's degree in computer science or alternatively in engineering sciences with a very substantial profile in computer science
- proficiency in software engineering and very good knowledge in C++ and Java
- German and English language skills to communicate with project partners and to draft scientific publications and reports according to the demands of the projects
- knowledge of OPC-UA and experience in developing robotics software (e.g. SmartSoft, ROS or others) is a plus

The topics can open the opportunity for a PhD thesis.

Further details on the service robotics research group headed by Prof. Dr. Schlegel can be found at <a href="www.servicerobotik-ulm.de">www.servicerobotik-ulm.de</a> (projects BMWi PAiCE SeRoNet and H2020 EU RobMoSys).

Employment is contracted for a limited period until 31.01.2020. Payment will be according to TV-L EG13. Hochschule Ulm actively promotes equal treatment of all employees. Preference will be given to disabled candidates with essentially the same qualifications.

Please send your CV and motivation letter (reference number 48-2017) via email (all documents as single pdf) to <a href="mailto:Bewerbungen@hs-ulm.de">Bewerbungen@hs-ulm.de</a>. Alternatively, you can use postal mail to <a href="mailto:Personalabteilung">Personalabteilung</a> der Hochschule Ulm, <a href="mailto:Prittwitzstraße">Prittwitzstraße</a> 10, 89075 Ulm (please send only copies as we cannot return any documents).

Applications received by the 03.02.2018 will receive full consideration.