

Bachelor/Master Thesis or Research Assistant (m/f/d)

Development of a Virtual Research Environment for Materials Science

Background

At the Institute for Applied Materials (IAM) of the KIT, the open-source software Kadi4Mat (<https://kadi.iam-cms.kit.edu>) is being developed in the context of several research projects. Kadi4Mat is a virtual research environment whose goal is to support researchers in efficiently managing, analysing and reusing research data. The focus of the development is on material science applications, but the software is intended to be used in as many research disciplines and areas as possible through generic and modular development. Kadi4Mat is being continuously developed and supplemented by various tools and libraries developed at the IAM.

Your tasks

Within the scope of the work, concepts and corresponding implementations are to be developed in order to advance the development of Kadi4Mat and associated tools in various areas. This can include, for example, the development of various interfaces, automated workflows or graphical user interfaces.

The choice of topic is flexible and can be individually adapted to the interests and competences of the student. Knowledge of Linux and git is advantageous for working on the topic, as well as Python, C/C++ and/or common web technologies (JavaScript, CSS and HTML), depending on the area of application.

What we offer

In addition to intensive supervision, we offer a productive and dynamic atmosphere in a team, cooperation with international research groups, as well as career prospects as a junior researcher.

Organisational

Depending on the current situation, work can be carried out flexibly from home or from a workstation at KIT Campus South, meetings are held on site or online. Communication can take place either in German or English.

If you are interested or have any questions, please contact Nico Brandt (nico.brandt@kit.edu).

Interested?

We look forward to receiving your application.