

Student Assistant Positions in a research project on **the use of machine learning for training load management in top-level sports.**

About the project:

This project brings together methodological competence in statistics, machine learning and computer science with current developments in sport sciences as well as technological progress in wearables and medical diagnostics in order to optimize training load of top athletes in endurance sports. The project started as a pilot project in cooperation with the Austrian Rowing Federation (termed “AIROW – Artificial Intelligence in Rowing”) and will later be extended to other sports, such as swimming, triathlon, cycling and mid-/long distance running. The project is funded by the “Bundesministerium für Kunst, Kultur, öffentlicher Dienst und Sport“.

Responsibilities:

- Integrate APIs and other backend services with the AIROW app
- Ensure the technical feasibility of UI/UX designs
- Write tests to ensure the quality of the web applications and components you develop
- Develop and maintain component libraries used in the app
- Contribute to planning and organizing the sprint and tasks

Requirements:

- Basics of Azure cloud platform
- Good knowledge of one of the General Purpose programming languages (Java, C++, C#, Python, Kotlin, JS/TS) (Preferable JavaScript/TypeScript)

Nice to have:

- Knowledge of SQL (preferably T-SQL)
- Basics of data modeling
- Understanding of REST API concept
- Basics of client - server architecture
- Some experience with writing unit tests
- Knowledge of clean code rules
- Basics of Linux administration

Contract details:

Working contracts can be for 10h/week up to 20h/week. The project work may also result in a seminar project or thesis paper – depending on the tasks and topics. Interested students may contact Karol Kulma, kulmakarol@gmail.com