



## informatik-Kolloquium

The Department of Computer Science of Johannes Kepler University Linz<sup>1</sup> together with the Austrian Society of Computer Science (ÖGI) invites to the following talk:

Topic: Secure Coding with Rust

Presenter: Florian Gilcher

Date: May 7th, 2018, 15:30-17:00

Location: JKU, Science Park 1 room MT226

## **Abstract**:

Memory safety violations, such as an array out-of-bound or dangling pointer access, lead to a number of well-known software bugs and malicious security attacks. Many of these vulnerabilities originate from systems programming languages which do not provide memory- and type-safety. "Rust" provides an alternative to such systems programming languages as well as other high-level programming languages with a set of characteristics that can help to improve security. In this talk, we will discuss the core features of Rust as well as its benefits for programmers. In particular, we investigate different aspects of Rust that help to improve the security of a system. By looking at examples of common security vulnerabilities, we will explore concepts such as "explicit mutability" or "static automatic memory management" that assist developers to avoid these frequent pitfalls.

## **Short Bio:**

Florian Gilcher is CEO of asquera GmbH and a contributor to the Rust project. His work is mainly focused on data handling problems and long-running, reliable software, where security is always a concern. He's also involved in running multiple conferences.

**Organizer:** Univ.-Ass. Michael Hölzl

Institute of Networks and Security

