



informatik-Kolloquium

The Department of Computer Science of Johannes Kepler University Linz¹ together with the Austrian Society of Computer Science (ÖGI) invites to the following talk:

Alan Mishchenko

Electrical Engineering and Computer Sciences
University of California, Berkeley

**Integrating an AIG Package, Simulator
and SAT Solver**

Oktober 15th, 2018, 12:00 – 12:45

Johannes Kepler University Linz, Science Park 3 218

Abstract:

This talk focuses on SAT sweeping for large problem instances where the interdependence of simulation and Boolean satisfiability (SAT) is critical. A modified AIG data-structure is proposed to optimize the speed of logic manipulation for the problems of this type. Experimental results confirm that the new implementation is faster, compared to the old one, in which runtime and scalability has been a known issue.

About the Speaker:

Alan Mishchenko graduated from Moscow Institute of Physics and Technology (Moscow, Russia) in 1993 with MS and received his PhD from the Glushkov Institute of Cybernetics (Kiev, Ukraine) in 1997. In 2002, he joined the EECS Department at UC Berkeley, where he is currently a full researcher. Alan's research interests are in developing computationally efficient methods for synthesis and verification.

Host: *Prof. Dr. Armin Biere*

¹The department consists of the following institutes:

Anwendungsorientierte Wissensverarbeitung (FAW), Bioinformatik, Computational Perception, Computer-Architektur, Computergrafik, Formale Modelle und Verifikation, Informationsverarbeitung und Mikroprozessortechnik (FIM), Integrierte Schaltungen, Pervasive Computing, Systems Engineering and Automation, Systemsoftware, Telekooperation