ALPEN-ADRIA UNIVERSITÄT KLAGENFURT

INVITATION TO THE DOCTORAL SEMINAR

Numerical Methods for Stochastic Differential Equations with Irregular Coefficients

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Chaired by Michaela Hitz | Department of Statistics

Wednesday, 26 May 2021 | 10:00–10:30

https://classroom.aau.at/math-stat

ABSTRACT

In this talk we will introduce stochastic differential equations with irregular coefficients. We will discuss about the convergence rate of the tamed Euler-Maruyama scheme for stochastic differential equations with discontinuous and polynomially growing drifts. Our approach relies on a transformation-based approach with the advantage to overcome the discontinuities in the drift, so that the transformed equation will have Lipschitz continuous coefficients. In the end, we will give a short outlook on a second ongoing research topic in the field of computational stochastics.

We hope to see you there!