Universität
Konstanz

Cross-Diffusion Systems: Analysis and Stochastics

KWIM Conference 2023
27 February – 3 March 2023

Department of Mathematics and Statistics at the University of Konstanz, Germany
Target Group: Postdoctoral and doctoral students working in the field of analysis and stochastics

The main objective of this conference is to bring together researchers working on quasilinear (S)PDEs with a main focus on cross-diffusion systems and their applications. Various aspects from the theory of cross-diffusion (S)PDEs such as mathematical modelling, dynamical systems and numerical analysis will be discussed.

The conference contains two parts. In the first half, experts working on these topics will provide lectures in order to give young researchers an insight into the theory of such (S)PDEs. A follow-up workshop with invited and contributed talks will take place in the second half (of the week).

Registration for the conference is free, but mandatory
– *uni.kn/mathematics/cross-diffusion-2023*

We can support a limited number of PhD students (travel and accommodation costs).

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EMS EUROPEAN MATHEMATICAL SOCIETY

Invited lecturers:

– Laurent Desvillettes, Université Paris Cité, IMJ-PRG (France) New estimates for cross diffusion systems coming out of biology and medicine.

– Benjamin Fehrman, Oxford University (UK) Quasilinear SPDEs and interacting particle systems: well-posedness and fluctuations.

– Benjamin Gess, MPI MiS, Leipzig, Bielefeld University (Germany) Random dynamical systems and conservative SPDEs.

– Erika Hausenblas, Montanuniversität Leoben (Austria) The stochastic Keller-Segel model.

– Ansgar Jüngel, TU Wien (Austria) Cross-diffusion systems with entropy structure.

– Christian Kuehn, TU München (Germany) Bifurcations in cross-diffusion systems.

Department of Mathematics and Statistics

Organizers

Jun.-Prof. Alexandra Neamtu
Jun.-Prof. Lara Trussardi
Dr. Gabriela Michalek (KWIM)

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