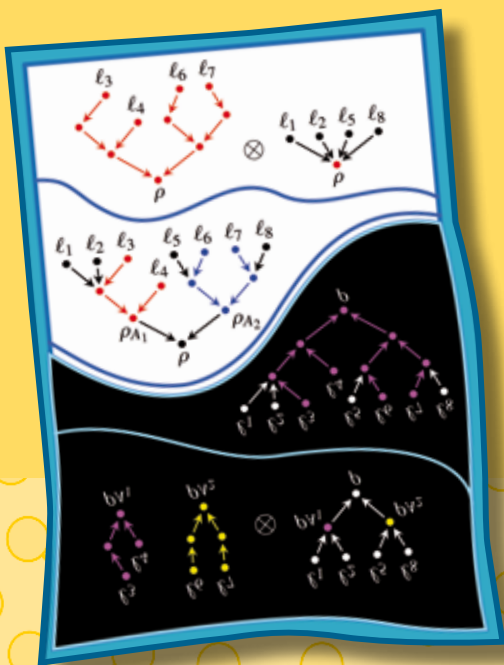


Hausdorff School



Recent development in singular stochastic PDEs

Dates: February 20-24, 2017

Organizers: Massimiliano Gubinelli (*Bonn*), Hendrik Weber (*Warwick*)

Location: Lipschitz Hall, Endenicher Allee 60

Stochastic partial differential equations (SPDEs) arise naturally in many models in Statistical Physics and Quantum Field Theory. In many cases these equations are driven by a very irregular noise term which renders their rigorous mathematical treatment challenging and forces to perform a renormalisation procedure which amounts to removing formally infinite terms from the equation.

This Hausdorff school is intended for motivated graduate and postdoctoral students who want to get acquainted with the recent developments in this field with a particular emphasis on Hairer's groundbreaking work on regularity structures. The specific aims of the school are on the one hand to expose the algebraic structure and the multi-scale analysis which allow to automatise certain perturbative calculations, and on the other hand to discuss a PDE and regularity theory point of view on these equations. A particular focus will be on the interactive exercise sessions in which students will acquire hands-on experience in working with regularity structures.

Lectures by:

Ajay Chandra (*Warwick*)

Nicolas Perkowski (*Berlin*)

Hendrik Weber (*Warwick*)

Lorenzo Zambotti (*Paris*)



Limited funding may be available to help with local expenses. Applications submitted by **January 15, 2017** will receive preference. For detailed information please contact gunder-lily.sievert@hcm.uni-bonn.de or visit the website

www.hcm.uni-bonn.de/stochastic-pde-2017/