

6th Workshop  
THEORY AND NUMERICS OF KINETIC EQUATIONS

June 1 – 3, 2015

Saarland University  
Saarbrücken, Germany

**Monday, June 1**

Time	Speaker	Title
8.00 – 9.00		– <i>Registration</i> –
9.00	Organisers	<i>Opening</i>
9.00 – 9.45	ALEXANDER BOBYLEV	<i>On some properties of the Landau kinetic equation</i>
9.45 – 10.15	Niclas Bernhoff	<i>Discrete kinetic models and boundary layers</i>
10.15 – 10.45	Martin Geier	<i>The cumulant lattice Boltzmann approach</i>
10.45 – 11.15		– <i>Coffee break</i> –
11.15 – 12.00	PIERRE DEGOND	<i>Topological interactions: a Boltzmann approach</i>
12.00 – 12.30	Hans Babovsky	<i>On rotational invariance of collision models on integer grids</i>
<hr/> <i>Lunch break</i> <hr/>		
15.15 – 16.00	KAZUO AOKI	<i>On the steady Boltzmann and Navier-Stokes equations in the presence of an external force</i>
16.00 – 16.30		– <i>Coffee break</i> –
16.30 – 17.00	Anne Nouri	<i>Well-posedness of the Cauchy problem for a space-dependent anyon Boltzmann equation</i>
17.00 – 17.30	Przemyslaw Zielinski	<i>The micro-macro acceleration method for the Monte Carlo simulation of stochastic differential equations</i>
<hr/>		
18.15		<i>Get-together with wine &amp; snacks</i>

## Tuesday, June 2

Time	Speaker	Title
9.00 – 9.45	WOLFGANG WAGNER	<i>Probabilistic models for the Schrödinger equation</i>
9.45 – 10.15	Anton Arnold	<i>Entropy method for hypocoercive Fokker-Planck equations with linear drift</i>
10.15 – 10.45	Franz Achleitner	<i>Modified entropy method for kinetic Fokker-Planck equations with non-quadratic potentials</i>
10.45 – 11.15		– Coffee break –
11.15 – 12.00	IRENE M. GAMBA	<i>Conservative schemes for kinetic interactive particle models</i>
12.00 – 12.30	Maja Taskovic	<i>Exponential tails for solutions to the homogeneous Boltzmann equation</i>
12.30 – 13.00	Robert Patterson	<i>Uniqueness and differentiability for the Smoluchowski equation with advection on a finite domain</i>
<hr/>		
<i>Lunch break</i>		
<hr/>		
15.00 – 17.00		<i>Excursion</i>
<hr/>		
18.00		<i>Conference dinner</i>

### Wednesday, June 3

Time	Speaker	Title
9.00 – 9.45	ERIC SONNENDRÜCKER	<i>Energy conservation and noise reduction in PIC simulations of plasmas</i>
9.45 – 10.15	Jakob Ameres	<i>Error Estimation for Particle Methods in Plasma Physics</i>
10.15 – 10.45	Katharina Kormann	<i>Solving the Vlasov equation with constant magnetic field in low-rank tensor format</i>
10.45 – 11.15		– Coffee break –
11.15 – 11.45	Dejan Petkow	<i>Generalized Collision Model for DSMC</i>
11.45 – 12.15	Stefan Brechtken	<i>Deterministic Discretizations of Boltzmann's Collision Operator</i>
12.15	Organisers	– Closing –