

International Symposium

Dynamics of Bose-Einstein Condensates in Engineered Potentials

27 - 28 May 2009

We invite all faculty members and particularly the students of the **Heidelberg Graduate School of Fundamental Physics** to join our discussions and seminar talks on the transport of ultracold atoms. This event is at the same time the kick off meeting for our collaboration grant in the framework of the **Global Networks Mobility Measures** (Dynamik von Bose-Einstein Kondensaten, 2009-2010).

Programm

27 May

morning: private meetings, group discussions, and group visits

14 SR, Philosophenweg 19 – Introduction by the Organizer

14:15 **Oliver Morsch** (Università degli Studi di Pisa)
'BEC in driven lattices'

15 **Patrick Plötz** (ITP, Heidelberg)
'Many-body Landau-Zener coupling'

AMQ Kolloquium at the Kirchhoff Institute for Physics, INF 227, seminar room 1.403:

17:30 **Ennio Arimondo** (Università degli Studi di Pisa)
'Control of quantum tunneling for atomic condensates in optical lattices'

28 May

Albert-Ueberle-Str. 3-5, 3rd floor, "Alte Bibliothek"

Chair: Tobias Paul

9:15 **Riccardo Mannella** (Università degli Studi di Pisa)
'Stochastic processes revisited'

10 **Ghazal Tayebirad** (ITP, Heidelberg)
'Landau-Zener tunnelling in the presence of a noisy lattice'

10:30 **Ennio Arimondo** (Università degli Studi di Pisa)
'New directions for the Bose-Einstein experiments in Pisa'

11:15 - 11:30 Coffee break

Chair: Oliver Morsch

11:30 **Christoph Hofmann** (PI, Heidelberg)
'Rydberg aggregates – Energy transport in tailored Rydberg gases'

12 - 12:30 **Stephan Middelkamp** (Institut für Physikalische Chemie, Heidelberg)
'Dynamics and stability of dark-bright solitons in cigar-shaped Bose-Einstein condensates'

12:45 - 14 Lunch break

Chair: Riccardo Mannella

14:15 **Mathias Albert** (Université Paris-Sud, Orsay)
'Localization in quasi 1D Bose-Einstein condensates'

15 **Tobias Paul** (ITP, Heidelberg)
'Nonstationary vs. superfluid flows of BECs'