

International Workshop on

Anderson Localization in Nonlinear and Many-Body Systems

March 16 - 20, 2009

Scientific coordination:

Boris Altshuler
Columbia University
USA

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Organisation:

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The workshop aims at an active and lively discussion of experimental and theoretical results in the field of disorder and interactions and related topics. In particular, we address the question, whether excitations will localize or delocalize, if all single particle eigenstates are localized, but interactions/nonlinearities are present. It is aiming at a deep understanding of the robustness of Anderson localization.

Topics include:

- many body interactions and disorder for fermions and bosons
 - nonlinear systems with disorder
 - conductivity
 - statistical properties of eigenstates
- weakly nonintegrable systems and Arnold diffusion
 - equipartition in finite systems
 - BEC in optical speckle and random potentials
- light propagation in nonlinear disordered optical media
- multidimensionality, glasses, satisfiability, and adiabatic quantum computation

*Invited speakers (*to be confirmed)*

I. Aleiner (New York)
S. Aubry (Gif-sur-Yvette)
D. Bambusi (Milano)
G. Benettin (Padova)
K. Efetov (Bochum)
S. Fishman (Haifa)
T. Giamarchi (Geneva)
M. Inguscio (Firenze)

M. Johansson (Linkoping)
G. Kopidakis (Heraklion)
V. Kravtsov (Trieste)
H. Kroha (Bonn)
J. Kurchan (Paris)
S. Lepri (Firenze)
M. Levi (University Park)
M. Modugno (Firenze)

T. Nattermann (Köln)
V. Oganesyan (New Haven)
A. Ponno (Padova)
P. Prelovsek (Ljubljana)
B. Rink (Amsterdam)
S. Ruffo (Firenze)
L. Sanchez-Palencia (Paris)
R. Schilling (Mainz)

P. Schlagheck (Regensburg)
M. Segev (Haifa)
D. Shepelyansky (Toulouse)
G. Shlyapnikov (Paris)
Y. Silberberg (Rehovot)
A. Soffer (Piscataway)
X. Waintal* (Gif-sur-Yvette)
W.-M. Wang (Paris)

Applications for participation and poster contributions are welcome and should be made by using the application form on the workshop web page (please see URL below). The number of attendees is limited. The **registration fee** for the workshop is **100 €** and should be paid by all participants. Costs for accommodation and meals will be covered by the Max Planck Institute. Limited funding is available to partially cover travel expenses. Please note that a parent-child apartment and childcare are available upon request.

Deadline for applications is January 16, 2009.



For further information please contact:
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