

Nano-Electronics - Summer School 2011 - 11.9.-14.9.2011

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Date: 09.09.2011

Agenda

Saturday, 10.9.2011

all day

Arrival and check-in
18:00 Informal get-together and light snack

Sunday, 11.9.2011

8:00 Breakfast and check-in
9:00 Registration and check-in
9:45 Welcome and general information
10:00 **"Superconducting Qubits I: Introduction, coherence, and readout (I)"**
Robert McDermott
11:30 **"Optimal control of quantum systems (I)"**
Rosario Fazio
13:00 Lunch
14:30 **"Spin qubits in quantum dots (I)"**
Hendrik Bluhm
16:00 Break
16:30 **"Spin and valley control in semiconductor and carbon quantum dots"**
Guido Burkard (I)
18:00 End of class
18:30 Dinner

Monday, 12.9.2011

8:00 Breakfast
9:00 **"Optimal control of quantum systems (II)"**
Rosario Fazio
10:30 Break
11:00 **"Superconducting Qubits II: Tomography, coupling, and multi-qubit operations"**
Robert McDermott (II)
12:30 Lunch
14:00 **"Spin and valley control in semiconductor and carbon quantum dots Guido Burkard (II)"**
15:30 Hike (moderate, but bring sturdy footwear and - just in case - rain gear)
18:30 Barbecue

**Tuesday,
13.9.2011**

- 8:00 Breakfast
- 9:00 **"Topological phases and Majorana fermions in quantum wires "**
Felix von Oppen
- 10:30 Break
- 11:00 **"Classical and quantum dynamics of the Josephson junction chain"**
David Haviland
- 12:30 Lunch
- 14:00 **"Quantum optics with superconducting circuits (I)"**
Andreas Wallraff
- 15:30 Poster session (and coffee)
- 17:00 **"Topological aspects of localization: From graphene to topological insulators"**
Pavel Ostrovsky (I)
- 18:30 End of class and dinner

**Wednesday,
14.9.2011**

- 8:00 Breakfast
- 9:00 **"Quantum optics with superconducting circuits (II)"**
Andreas Wallraff
- 10:30 Break
- 11:00 **"Spin qubits in quantum dots (II)"**
Hendrik Bluhm
- 12:30 Lunch
- 14:00 **"Gapped bilayer graphene and marginal topological insulators"**
Jian Li
- 15:30 Break
- 16:00 **"Topological aspects of localization: From graphene to topological insulators"**
Pavel Ostrovsky (II)
- 17:30 Farwell address and end of course