Program

4th SINANO Summer School: timetable

19 July 2010

19:00	Reception

20 July 2010

8:45	Opening of the summer school
Advanced device modelling	
9:00 – 10:30	**Prof. Umberto Ravaioli**, University of Illinois, Urbana-Champaign, IL USA, "Hierarchy of Simulation Approaches for Charge Transport Simulation"
10:30 – 11:00	Break
11:00 – 12:30	**Prof. Giorgio Baccarani**, University of Bologna and IUNET, Italy, "Numerical simulation of graphene-based and tunneling devices"
12:30 – 14:00	Lunch Break
Variability and atomistic effects in Nanoelectronics	
14:00 – 15:30	**Prof. Asen Asenov**, University of Glasgow, Scotland UK "Introduction to variability issues and atomistic modeling"
15:30 – 16:45	**Prof. Alexander L. Shluger**, University College London, UK, "Atomistic effects in ultra-thin body devices and at the Si-SiO2 interface"
16:45 – 17:00	Break
17:00 – 18:15	**Dr. Hans Tuinhout** NXP Semiconductors, The Netherlands, "Variability and matching characterization techniques"
20:00	Dinner

21 July 2010

Advanced device modelling and variability effects	
9:00 – 10:30	**Dr. Denis Rideau,** ST Microelectronics Crolles, France "Dispersion relationships in ultra-thin semiconductor layers: from atomistic methods to envelop function approximations"
10:30 – 11:00	Break
11:00 - 12:30	**Dr. Davide Pandini**, ST Microelectronics Agrate Brianza, Italy "Variability issues in CMOS circuits"
12:30 – 14:00	Lunch break
14:00 – 15:15	**Dr. Peter Baumgartner**, Infineon Technologies, Germany, "RF and noise characterization of transistors and circuits"
15:15 – 16:30	**Dr. Gert-Jan Smit** NXP Semiconductors, The Netherlands "Compact models for advanced MOS transistors"
16:30 – 17:00	Break

	Advanced device modelling and variability effects
17-00 - 18:15	**Dr. Marco Pala**, IMEP, Institute Politechnique Grenoble, France "Quantum-mechanical modeling of advanced semiconductor devices"
20:00	Social Dinner

22 July 2010

	Energy harvesting
9:00-10:30	**Prof. Marco Tartagni**, University of Bologna, Italy, "Devices for energy harvesting"
10:30 – 11:00	Break
11:00 – 12:30	**Dr. Aldo Romani**, University of Bologna, Italy, "Multi-Physics simulation of electro-mechanical harvesting systems"
12:30 – 14:30	Lunch break
14:30 - 16:00	**Dr. Robert Hahn**, Fraunhofer IZM, Germany, "Microbatteries for energy storage"
16:00 – 16:30	Break
16:30 – 18:00	**Dr. Giorgio Cellere,** Baccini - Applied Materials Italy, "Silicon-based photovoltaic cells"
20:00	Dinner

23 July 2010

	Non volatile memories - organized in collaboration with the Gossamer Project
8:00-9:15	**Dr. Paolo Tessariol**, Numonyx, Agrate Brianza, Italy, "Giga scale NAND Flash monolithic memories: scenarios and perspectives"
9:15 – 10:30	**Dr. Volkhard Beyer**, NaMLab gGmbH, Dresden, Germany
10:30 – 11:00	Break
11:00 – 12:15	**Dr. Francesco Driussi**, "Modeling and simulation of charge trap non volatile memory cells", University of Udine, Italy
12:15 – 12:30	Closing of the summer school
12:30	Lunch