

1 CURRICULUM VITAE

1.1 ACADEMICE DEGREES

- 1980 Diplomingenieur (= M. Sc.) in Applied Mathematics, Technical University of Vienna, Austria.
- 1981 Ph.D., Technical University of Vienna, dissertation topic: 'Numerical Solution of Singularly Perturbed Two Point Boundary Value Problems', Advisor: R. Weiss .
- 1988 Habilitation, Technical University of Vienna, Austria

1.2 PROFESSIONAL EXPERIENCE

- 1990-present Professor, Department of Mathematics, Arizona State University, Tempe, Arizona.
- 1992-1995 Chair, Department of Mathematics, Arizona State University, Tempe, Arizona.
- 1986-1990 Associate Professor, Department of Mathematics, Arizona State University.
- 1983-1986 Assistant Professor, Department of Mathematics, Arizona State University.
- 1982-1984 Research Associate, Mathematics Research Center, University of Wisconsin, Madison.
- 1980-1982 Research Associate, Institute for Applied Mathematics, Technical University of Vienna, Austria.

Visiting Positions:

- 2005-2006 Wolfgang Pauli Institute, University of Vienna, Austria.
- 2005 Morningside Centre, Academia Sinica, Beijing, China.
- 2000 Institute for Mathematics and its Applications, University of Minnesota, Minneapolis.
- 1999 Centre de Mathematique et Physique, Universite Paul Sabtier, Toulouse, France.
- 1999 Texas Institute for Computational and Applied Mathematics, University of Texas, Austin.
- 1998 Institute for Microelectronics, Technical University of Vienna, Austria.

1998 Erwin Schrödinger Institute for Mathematical Physics, Vienna, Austria.

1995 Department of Mathematics, Université de Nice, France.

1991-1992 Centro de Calculo Científico, Universidad de Buenos Aires, Argentina.

1991-1992 Department of Mathematics, Technical University of Berlin, Germany.

1988-1989 Department of Electrical Engineering, Technical University of Hamburg, Germany.

1988-1989 Department of Mathematics, Technical University of Vienna, Austria.

2 INVITED CONFERENCE PRESENTATIONS 2003-2007

- "Semi-classical Transport Models in Thin Slabs" (invited) SIAM Meeting on PDEs, Phoenix, December 2007.
- "Modeling of Quantum Transport in Open Nanostructures" (invited) EQUADIFF 07, Vienna, August 07.
- "Sub-Band Drift Diffusion Models for Quantum Transport in a Strong Force Regime", (invited) ICIAM 07, Zürich, July 07.
- "STOCHASTIC DYNAMICS OF LONG SUPPLY CHAINS WITH RANDOM BREAK-DOWNS", (invited) ICIAM 07, Zürich, July 07.
- "AGGREGATE MODELS FOR THE SIMULATION OF PRODUCTION NETWORKS" (invited) Symposium Armbruster, Eindhoven, June 07.
- "Applications of Maximum Entropy Closures to Device Simulation" SEMIC 06, Vienna, Austria, February 06.
- "Quantum Monte Carlo methods based on a multi - scale approach" International Workshop on nonlinear PDE's, Vienna, Austria, June 06.
- "KINETIC AND FLUID MODELS FOR SUPPLY CHAIN SIMULATION" Thematic Institute on 'Complex Flows in Biological and Production Networks' Goldrain, Italy, June 2005.
- "ENTROPY BASED NUMERICAL KINETICS AND QUANTUM MECHANICAL CORRECTIONS", IPAM Workshop on Numerical Methods in Astrophysics, UCLA, May 2005.
- "CHARGED PARTICLE MODELS FOR THE SIMULATION OF PRODUCTION NETWORKS", HYKE meeting on 'Hyperbolic and Kinetic Equations' Rome, May 2005.

- "Kinetic equations in drift dominated regimes" Colloque au memoire de Frederic Poupaud, Nice, March 2005.
- "Charged particle models for the simulation of production networks", "Nonlinear PDEs and Applications", Capital Normal University, Beijing, July 2005.
- "DISSIPATIVE EFFECTS IN QUANTUM SYSTEMS AND THE ENTROPY PRINCIPLE" Technological Applications of PDE's, Florianopolis (Brazil), 2004.
- FLUX LIMITED FLUID AND KINETIC MODELS FOR LARGE QUEUEING NETWORKS First SIAM Conference on Partial Differential Equations, Houston, 2004.
- KINETIC MODELS FOR RE-ENTRANT SUPPLY CHAINS 6th International Workshop on Mathematical Aspects of Fluid and Plasma Dynamics (MAFPD) Kyoto, Japan, September , 2004.
- 'Quantum collisions in the Boltzmann equation via local extensions to Fermi's Golden Rule' Minisymposium: 'Mathematical Aspects of Semiconductor Modeling and Nanotechnology', Joint Meeting Real Sociedad Matematica Espaola - American Mathematical Society, Sevilla, Spain, 2003.
- 'MODEL HIERARCHIES FOR PRODUCT FLOW IN SUPPLY CHAINS' Minisymposium on 'Simulation and Control of Supply Chains ' SIAM Mathematics for Industry Toronto, 2003.
- 'MODELLING PARTS AS PARTICLES', 'Interacting Machines: Industrial Production Systems and Biological Cells' , 2003, Berlin, Germany