# **Curriculum Vitae**

(June 5, 2018)

#### Prof. Dr. Jan von Delft

Eversbuschstr. 29f D-80999 München

Born in Bloemfontein, South Africa, 25.10.1967, as oldest of 7 children

Parents: Prof. K. U. T. von Delft und E. R. von Delft née Uys

Nationality: German and South-African

Married to Dr. med. Nina von Delft née Weisser (1998)

Children: Lea (1999), Maya (2000), Max (2002), Amelie (2005), Felix (2008)

#### ACADEMIC EDUCATION

High School Grey-College, Bloemfontein, South Africa, 1984

B.Sc. University of the Orange Free State, South Africa, 1985-1987

Physics and Mathematics (cum laude)

B.Sc. Honours University of Stellenbosch, South Africa, 1988

Theoretical Physics (cum laude)

M.Sc. University of Stellenbosch, South Africa, 1989 - Aug. 1990

Theoretical Nuclear Physics (cum laude)

Thesis: Delta-Resonances in the Walecka Model and the High Spin Problem

Advisor: Prof. F. J. W. Hahne.

M.Sc., Ph.D. Cornell University, USA, Aug. 1990 - Aug. 1995: Physics

Thesis: 2-channel Kondo Scaling in Metal Nanoconstrictions – A Conformal Field Theory Calculation of Scaling Function

Advisor: Prof. V. Ambegaokar.

Habilitation Universität Karlsruhe, Germany, Juli 19, 2000

Habilitation Thesis: Spectroscopy of Discrete Electron Energy Levels in

Ultrasmall Metallic Grains.

# PROFESSIONAL EMPLOYMENT

Post-doctoral Position: May 1, 1995 - September 30, 2000

C-1 position since April 1, 1998

Institut für Theoretische Festkörperphysik (Head: Prof. G. Schön)

Universität Karlsruhe, Germany

**Professor** (C3): October 1, 2000 - April 17, 2001 Physikalisches Institut, Universität Bonn, Germany

Professor (C4): since April 18, 2001

Chair for Theoretical Condensed Matter Physics Ludwig-Maximilians-Universität München

Theresienstr. 37 - D-80333 München

Germany

#### ACADEMIC HONORS

Heinrich-Hertz-Preis of the Badenwerkstiftung, together with G. Schön and H. Schoeller, for "Contributions to the Theoretical Description and Modelling of the Electronic Properties of Metallic Nanostructures", 2000.

#### **TEACHING**

SoSe 01: T6: Open Quantum Systems

WiSe 01/02: P1: Experimental Physiks (Mechanics, Relativity Th.) (with H. Gaub)

SoSe 02: T1: Theoretical Mechanics

WiSe 02/03: T6: Theoretical Solid State Physics I SoSe 03: T6: Theoretical Solid State Physics II

WiSe 03/04: P1: Experimental Physics (Mechanics, Relativity Th.) (with J. Feldmann) SoSe 04: P4: Atomic- und Molecular Physics, Introduction to Quantum Mechanics

(with W. Zinth)

WiSe 04/05: T3: Quantum Mechanics

SoSe 05: TL1: Theoretical Mechanics (Lehramt)

WiSe 05/06: P1: Experimental Physics (Mechanics, Relativity Th.) (with D. Habs)

SoSe 06: Sabbatical

WiSe 06/07: T6: Condensed Matter Field Theory

SoSe 07: T1: Theoretical Mechanics

WiSe 07/08: TMP-K1: Mathematical Quantum Mechanics (with H. Siedentop)

SoSe 08: T1: Theoretical Mechanics

WiSe 08/09: T6: Condensed Matter Field Theory

SoSe 09: Sabbatical

WiSe 09/10: Quantum Matter
SoSe 10: Mesoscopic Physics
WiSe 10/11: Quantum Matter
SoSe 11: Many-Body Physics

WiSe 11/12: Mathematical Methods for Physicists

SoSe 12: Mesoscopic Physics

WiSe 12/13: Mathematical Methods for Physicists

SoSe 13: Mesoscopic Physics

WiSe 13/14: Mathematical Methods for Physicists

SoSe 14: Sabattical

WiSe 14/15: Mathematical Methods for Physicists

SoSe 15: Theoretical Mechanics

WiSe 15/16: Mathematical Methods for Physicists

SoSe 16: Theoretical Mechanics

WiSe 16/17: Mathematical Methods for Physicists

SoSe 17: Tensor Networks

WiSe 17/18: Mathematical Methods for Physicists

SoSe 18: Sabattical

For teaching purposes, I have for several years been using "electronic chalk", exploiting the possibility of freehand writing on my tablet PC to prepare handwritten lecture notes. For advanced courses, I post my notes on the course homepage ahead of the lecture,

allowing students to read ahead if they want to. For undergraduate courses with large numbers of students, I prepare two versions: a completed version (A) for my own use, and a "gap-filled" version (B), in which some formulas or phrases have been deleted to focus attention on the key steps of an argument or derivation. When lecturing I hook up my tablet PC to a beamer to project an image of the laptop screen to the wall, and fill in the gaps by handheld pen on laptop screen. In this way the presentation is similar in speed to a blackboard lecture, but with the advantage that I can focus only on the essentials. A day before lecture I post on the course homepage both versions A and B; students print out and bring to class one of them, depending on whether they prefer to take notes actively (version B) or write very little (version A) during lecture. Afterwards, I post the version completed during lecture (C) on the homepage too, as final record of the lecture. --- This innovative approach has turned out to be very popular with students: it combines the advantages of an electronic format (internet compatibility, ease of recycling, colors, neat layout, easy integration of figures from textbooks/papers) with the virtues of blackboard teaching (flexibility, symbol-for-symbol explanation of key points, active audience participation through taking notes). A description of this concept may be found at http://homepages.physik.uni-muenchen.de/~vondelft/echalk/echalkteaching.pdf

Based on my experiences in teaching the freshman course on "Mathematical Methods for Physicists" for many years, I have joined forces with Alexander Altland (University of Cologne) to write a textbook, "Mathematics for Physicists – Introductory Concepts and Methods". It is currently in production with Cambridge University Press and should appear in print early in 2019.

#### ADMINISTRATIVE ACTIVITIES

Since 2001: Member of the Center for NanoScience, LMU Munich

2001-2005: Member of the committee in charge of proposing questions for the Staatsexamen in Physics in Bavaria

2001-2006: Coordinator of the "Spintronics" Research Training Network, funded by the European Union

Since 2003: Vice coordinator of the Cooperative Research Center (SFB631), "Quantum Information Processing with Solid State Systems"

2004: Founding Member of the Arnold Sommerfeld Center for Theoretical Physics, LMU Munich

2004-2011: Member of the Steering Committee of the Arnold Sommerfeld Center

1.10.2004 to 30.9.2005: Director, Department of Physics

2006-2010, 2015-present: Member of the steering committee of the Bavarian Elite Master Course in "Theoretical and Mathematical Physics", offered jointly by the LMU and the TU Munich

2006-2010: Coordinator of "Area C: Quantum Information Processing", of the Cluster of Excellence *Nanosystems Initiative Munich* 

2014: Founding Member of the Munich Quantum Center

#### **GRANTS**

# GIF German-Israeli-Foundation (No. I-1259-303.10/2014)

1.1.2015-31.12.2017 (total amount for von Delft: 113.437 €)

Theory of Strongly-Correlated Optically-Driven Nanoelectronic Systems

Jan von Delft: 1 PhD position (107.437 €), consumables (6.000 €)

Moshe Goldstein: 1 PhD position (77.100 €), consumables (10.950 €)

## **NIM (Nanosystems Initiative Munich)**

1.11.20011-30.10.2016 (total amount for von Delft: 232.000 €)

**Area A:** Quantum Nanophysics

J. von Delft: 1 PhD position (207.000 €), consumables (25.000 €)

#### **DFG-SFB-Transregio 12**: Universality and Symmetries in Mesoscopic Systems

01.07.2011 - 30.06.2015 (total amount for von Delft: 357.640 €)

**Project A1:** *Effective theories of correlated fermions* 

J. von Delft: 1/2 postdoc position (132.300 €), overhead (26.460 €)

**Project A8:** Non-Abelian symmetries in tensor networks

J. von Delft: 1 PhD position (144.900 €), equipment (25.000 €), overhead (28.980 €)

U. Schollwöck: 1 PhD position (144.900 €), equipment (25.000 €)

# **DFG-SFB 631**: Solid-State Quantum Information Processing: Physical Concepts and Material Aspects

01.07.2011 - 30.06.2015 (total amount for von Delft: 301.240 €)

**Project B7:** Real Time Dynamics of Driven, Dissipative Quantum Systems

J. von Delft: 1.4 PhD position (227.000 €), equipment (28.000 €), overhead (45.540 €)

S. Kehrein: 1 PhD position (165.600  $\in$ ), equipment (28.000  $\in$ ), overhead (45.540  $\in$ )

# DFG Focused Research Area SPP 1285: Semiconductor Spintronics (DE 730/4-3)

01.10.2011 - 30.09.2013 (total amount for von Delft: 106.600 €)

Crossover between 0.7-anomaly and Kondo effect — theory, transport measurements and all-optical spin detection

Jan von Delft: 1 PhD position (84.300 €), consumables (4.500 €), overhead (17.800 €)

A. Högele, S. Ludwig: 1 PhD position (84.300 €), equipment (100.000 €)

# **DFG Bilateral Project Cooperation** (DE 730/9-1)

Travel support (8.000 €) for the International Workshop on "Quantum Physics of Low-Dimensional Systems and Materials", Wallenberg Research Center, Stellenbosch, South Africa. January 3-7, 2011. Organizers: B. Altshuler, J. von Delft, V. Falko, Y. Gefen, F. Marquardt, U. Schollwöck, F. Scholtz, I. Snyman, P. Zoller

#### **DFG** (DE 730/8-1)

1.11.2010 - 31.10.2012 (total: 107.600 €)

Effects of quantum noise on dephasing in mesoscopic systems

J. von Delft: 1 PhD position (82.800  $\in$ ), consumables (6.000  $\in$ ), overhead (18.800  $\in$ )

# **DFG Bilateral Project Preparation** (DE 730/7-1)

Travel support (7.000 €) for the International Workshop on "New Renormalization Techniques in Condensed Matter Systems", Wallenberg Research Center, Stellenbosch, South Africa. August 31-September 11, 2009. Organizers: I. Snyman, F. Scholtz, S. Kehrein, J. von Delft

#### DFG Focused Research Area SPP 1285: Semiconductor Spintronics (DE 730/4-2)

01.05.2009 - 30.04.2011 (total amount for von Delft: 102.800 €)

Spin-dependent transport through quantum dots and quantum point contacts

Jan von Delft: 1 PhD position (82.800 €), consumables (2.000 €), overhead (18.000)

Yuval Gefen: 1 postdoc position (44.000 €).

#### LMU Exzellent

2009

Computational Physics of Complex Systems

Erwin Frey, Jan von Delft: high-performance computer cluster (465.000 €)

## GIF German-Israeli-Foundation (No. 981-185.14/2007)

1.1.2009 - 31.12.2011

Mesoscopic Electromechanical Effects in Suspended Nanostructures

Eyal Buks, Ron Lifshitz, Jan von Delft, Eva Maria Weig

Lifshitz: 1 PhD position, Weig: 1 PhD position, operating expenses (total: 220.490 €)

# **NIM (Nanosystems Initiative Munich)**

Duration: 1.11.2006-30.10.2011

**Area A:** Single Electron and Spin Nanosystems

**Area B:** Nanophotonic Systems

**Area C:** Quantum Information Nanosystems

**Area D:** Nanotransducers

(F. Marquardt, S. Kehrein, J. von Delft), three 3/4 E13 positions

# **DFG-SFB-Transregio 12**: Universality and Symmetries in Mesoscopic Systems

Duration: 01.07.2007 - 30.06.2011

**Project A1:** Field theories for disordered interacting fermions

**Project A3:** Nonlinear dynamics of strongly interacting quantum fields in Bose-Einstein condensates

**Project A4:** Nonequilibrium phenomena

Project B1: Hyperbolic dynamical systems, periodic orbits and quantum spectra

(F. Marquardt, S. Kehrein, J. von Delft), four shared 3/4 E13 positions

# **DFG-SFB 631**: Solid-State Quantum Information Processing: Physical Concepts and Material Aspects

Duration: 01.07.2007 - 30.06.2011

**Project A2:** Theory of Superconducting Qubits

(F. Marquardt, J. von Delft): one E13 position, one 3/4 E13 position

**Project B7:** Real Time Dynamics of Driven, Dissipative Quantum Systems

(S. Kehrein, J. von Delft), two 3/4 E13 positions

# **DFG Focussed Research Area SPP 1285: Semiconductor Spintronics (DE 730/4-1)**

Spindependent transport through multi-level quantum dots in phase-coherent and/or nonequilibrium conditions (Jan von Delft, Yuval Gefen)

one 3/4 E13 position, one PhD position: 01.05.2007 - 30.04.2009

**DFG** (DE 730/3-2)

DMRG- und Matrixproduktmethoden für zeitabhängige Quantenstörstellenmodelle

(J. von Delft)

One BAT IIa position: 14.4.2006 - 15.4.2008

# **DIP Deutsch-Israelische Projektkooperation** (DIP-H.2.1)

Dynamics of Electrons and Collective Modes in Nanostructures

German Coordinator: J. von Delft; with F. Marquardt, J. Kotthaus, S. Ludwig, F. von Oppen. Israeli Coordinator: D. Cohen; with J. Imry, M. Heiblum, Y. Oreg, A. Aharony,

O. Entin-Wohlman, H. Shtrikman

1.1.2006 - 31.12.2010

**DFG-SFB 631**: Solid-State Quantum Information Processing: Physical Concepts and Material Aspects

01.07.2003 - 20.06.2007

**Project A2:** Theory of Superconducting Qubits,

(K. Richter, J, von Delft, J. Siewert, F.K. Wilhelm): two BAT IIa 3/4 positions

**Project C2:** Quantum spins strongly coupled to an environment: RG approaches for treating strong correlations

(J. von Delft): two BAT IIa 3/4 positions

# **RTN**: Spin-dependent transport through nanostructures

Funded by the European Union, "Spintronics" Research Training Network Contract-Nr. HPRN-CT-2002-00302 (Coordinator: Jan von Delft)

One postdoc position, 1.6.2002 - 31.5.2006

**DFG** (SCHO 621/4-1 and DE 730/3-1)

Density Matrix Renormalization of time-dependent, strongly correlated quantum systems (U. Schollwöck, J. von Delft,)

One BAT IIa 3/4 position each, March 2003 - February 2005

# DFG Focussed Research Area 'Semiconductor and Metallic Clusters'

(II C 10 - 322 1072)

Spin-dependent transport through magnetic metallic nanoclusters

(J. von Delft, G. Schön)

One PhD position: 2.1999 - 2.2001 One postdoc position: 4.2001 - 3.2003

#### **DIP:** German-Israeli-Project cooperation (DIP-C 7.1)

Coherence, Disorder and Interactions in Coupled Mesoscopic Systems

Partners: Shimon Levitt, Joe Imry, Moty Heiblum, Yuval Oreg (Weizmann Institut); Jörg Kotthaus, Jan von Delft (LMU); Konstantin Efetov (Bochum); H. Weidenmüller (Heidelberg)

2001-2005

#### **DAAD-NSF**

Electron Energy Levels in Magnetic Nanoparticles (J. von Delft)

Partner: Prof. D. Ralph, Cornell University

Travel grant: 1999-2000

#### **MENTORING**

#### **HABILITATIONS**

F. Wilhelm, *Quantum coherence and -control in mesoscopic systems*, completed 2003 A. Weichselbaum, *Matrix product state treatment of quantum impurity models*, completed 2012

#### POSTDOCS/SENIOR COWORKERS

S.-S. Lee, 02/2015-present

H.-H. Tu, 10/2016-09/2017

W. Li, 02/2012-05/2015

O. Goulko, 10/2011-09/2013

J. Qian, 10/2008-11/2011

F. Marquardt, 2005-2010

O. Yevtushenko, 07/2007-present

I. Weymann, 03/2009-02/2011

A. Faribault, 10/2008-09/2011

V. Golovach, 2007-2009

A. Siddiki, 01/2007-08/2008

E. Solano, 06/2006-04/2008

A. Weichselbaum, 09/2004-12/2018

L. Borda, 2003-2005

F. Wilhelm, 2001-2006

#### PHD STUDENTS

#### **Current projects:**

- 22. Elias Walter, Multi-orbital quantum impurity model
- 21. Fabian Kugler, DMFT extensions using real-frequency methods
- 20. Lukas Weidinger, Functional Renormalization group for 1-dimensional models with long-ranged interactions
- 19. Katharina Stadler, Dynamical Mean Field Theory with NRG as impurity solver

#### **Completed Theses:**

- 18. Dennis Schimmel, Thermoconductance of a quantum point contact in the regime of the 0.7-anomaly, 2018
- 17. Frauke Schwarz, Nonequilibrium transport through quantum dots: Lindblatt-NRG treatment, 2017
- 16. Benedikt Bruognolo, Tensor network methods for calculating spectral properties of 1- and 2-dimensional quantum lattice models, 2017
- 15. Jan Heyder, The 0.7 anomaly in quantum point contacts; a microscopic model for the first conductance step, 2014
- 14. Florian Bauer, Microscopic Origin of the 0.7-Anomaly in Quantum Point Contacts, 2014
- 13. Markus Hanl, *Optical and transport properties of quantum impurity models -- an NRG study of generic models and real physical systems*, 2014
- 12. B. Oliver Viehmann, Multi-qubit circuit quantum electrodynamics, 2013

(supervised jointly with Florian Marquardt)

- 11. Maximilian Treiber, Decoherence in disordered metallic networks, 2013
- 10. Cheng Guo, DMRG treatment of time-dependent impurity models, 2012
- 9. Wolfgang Münder, NRG treatment of nonequilibrium quantum impurity models, 2011
- 8. Andreas Holzner, DMRG studies of Chebychev-expanded spectral functions and quantum impurity models, 2012
- 7. Hamed Saberi, Matrix product state approach to quantum impurity problems, 2009
- 6. Theresa Hecht, Numerical renormalization group studies of correlation effects in phase coherent transport through quantum dots, 2008
- 5. Corinna Kollath, *The adaptive time-dependent density-matrix renormalization-group method: development and applications*, 2005 (Coadvisor: U. Schollwöck)
- 4. Michael Sindel, Numerical renormalization group studies of quantum impurity models in the strong coupling limit, 2004
- 3. Dominique Gobert, Applications of the density-matrix renormalization group to mesoscopic Phenomena, 2004 (Coadvisor: U. Schollwöck)
- 2. Silvia Kleff, Transport theory of ferromagnetic nanograins and dephasing in qubits with environmental resonances, 2003
- 1. Fabian Braun, Fixed-N superconductivity in ultrasmall metallic grains, 1999

#### **DIPLOMA/MASTERS THESIS**

#### **Current projects:**

20. Andreas Gleis, Two-site cluster DMFT+NRG treatment of Anderson lattice model

## **Completed projects:**

- 19. Fabian Kugler, Fermi-Edge Singularity and the Functional Renormalization Group, 2016
- 18. Dimitri Pimenov, Fermi-edge polaritons with finite hole mass, 2015
- 17. Kevin Jägering, Majorana Fermions in Supeconducting Quantum Wires, 2014
- 16. Nils-Oliver Linden, Open and Reduced Wilson Chains for Quantum Impurity Models, 2014
- 15. Katharina Eissing, fRG study of interaction effects in coupled quantum chains, 2013
- 14. Katharina Stadler, NRG as DMFT impurity solver for models with non-abelian symmetries, 2013
- 13. Benedikt Bruognolo, Variational MPS-treatment of the two-bath spin boson model
- 12. Francesco Alaimo, On the Effects of Spin Orbit Interaction on the Conductance through a Quantum Dot in the presence of Kondo Correlations, 2012
- 11. Nikolai Ufer, Functional renormalization group study of transport in 2-dimensional nanostructures, 2011
- 10. Wael Chibani, Anisotropic Kondo Effect in STM studies of Co and Ti on Cu surfaces, 2010
- 9. Jan Heyder, Crossover from the Kondo Effect in Quantum Dots to the 0.7 Anomaly in Quantum Point Contacts, 2009
- 8. Arne Alex, Non-Abelian Symmetries in the Numerical Renormalization Group, 2009
- 7. Markus Hanl, *The Kondo exciton: non-equilibrium dynamics after a quantum quench in the Anderson impurity model, 2009*
- 6. Florian Bauer, 0.7 Anomaly of Quantum Point Contacts: Treatment of Interaction with

Functional Renormalization Group, 2008.

- 5. Maximilian Treiber, Decoherence in a Disordered Quasi-1D Metallic Ring, 2008.
- 4. Wolfgang Münder, *Matrix Product Calculation of Correlation Density Matrices for 1-Dimensional Quantum Chains*, 2008.
- 3. Andreas Holzner, *Matrix product state approach for a multi-lead Anderson model*, 2006.
- 2. Rolf Helmes, *The Effect of Kondo Correlations on the Absorption Spectrum of Semiconductor Quantum Dots*, 2004.
- 1. Igor Gazuz, Tunneling Anomaly in Superconducting Nanograins, 2003.

## FORMER GROUP MEMBERS PURSUING ACADEMIC CAREERS

FORMER GROUP MEMBERS PURSUING ACADEMIC CAREERS	
Laszlo Borda	Associate professor, Technical University Budapest, Hungary,
	2010 [left physics for industry, 2011]
Alexandre Faribault	Lecturer and researcher, Université de Lorraine Nancy, France, since 2014
Vitaly Golovach	Ikerbasque Research Associate, UPV/EHU and Material Physics
	Center, San Sebastian, Spain, since 2013
Olga Goulko	Assistant professor, Boise State University, USA, since 2018
Corinna Kollath	W3-Professor, Bonn Universität Bonn, since 2013
Wei Li	Assistant professor of physics, Beihang University, China, since 2015
Florian Marquardt	Director, Max Planck Institute for the Science of Light, Erlangen, since 2016
Jiang Qian	Senior Research Associate at Case Western Reserve University, since 2011

Hamed Saberi Postdoctoral researcher, Paderborn University, since 2015

Afif Siddiki Associate Professor, Mimar Sinan Fine Arts University, Turkey,

since 2009

Enrique Solano Ikerbasque professor, Universidad Bilbao, Spain, since 2008 Hong-Hao Tu Junior professor, Technical University Dresden, since 2017 Andreas Weichselbaum Associate staff scientist, Brookhaven National Laboratory,

since 2018

Ireneusz Weymann Professor, Adam Mickiewicz University, Poznan, since 2013

Frank Wilhelm: W3-Professor, Universität des Saarlandes, since 2011

# **REFEREEING ACTIVITIES**

APS Journals: Phys. Rev. Lett., Phys. Rev. A, Phys. Rev. B, Rev. Mod. Phys. Europhys. Lett, Euro. Phys. J. B

Nature Science

Deutsche Forschungsgemeinschaft Alexander von Humboldt-Stiftung Canada Research Chair Program

National Science Foundation, USA

Israel Science Foundation

# PARTICIPATION IN ORGANIZATION OF CONFERENCES/WORKSHOPS/SCHOOLS

2017 Arnold Sommerfeld School on "Numerical methods for correlated many-body systems", Munich, 11-15.09.2017

Organizers: M. Haack, U. Schollwöck, J. von Delft

Conference on Frontiers of Nanoscience, 24.08-01.09.2015, ITCP Trieste,

Organizers: V. Fal'ko, R. Fazio, J. von Delft, I. Lerner, C. Marcus, B. Simons, V. Kravtsov, A, Scarducchio

2015 Arnold Sommerfeld School on "Topological phases of matter", Munich, 31.08-04.09.2015

Organizers: I. Bloch, M. Haack, U. Schollwöck, J. von Delft

Walk and Talk at the Nanoscale, CeNS Workshop 2014, Venice, 22-26.09.2014 Program Committee: A. Hartschuh, J. Rädler, P. Schwill, J. von Delft, E. Wagner

Frontiers of Nanomechanics, ICTP Trieste, 09-13.09.2013

Organizers: M. Blencowe, J. von Delft, I. Favro, K. Lehnert, F. Marquardt, E. Weig, M. Kiselev

2013 Arnold Sommerfeld School on "Gauge-gravity duality and condensed matter physics", 05-09.08.2013

Organizers: J. Erdmenger, M. Haack, S. Kehrein, J. von Delft, W. Zwerger

International Workshop on "Quantum Physics of Low-Dimensional Systems and Materials", Stellenbosch, South Africa, January 3-7, 2011

Organizers: B. Altshuler, J. von Delft, V. Falko, Y. Gefen, F. Marquardt, U. Schollwöck, F. Scholtz, I. Snyman, P. Zoller

International Workshop on "Nano-Opto-Electro-Mechanical-Systems approaching the Quantum Regime", ICTP, Trieste, September 6 - 10, 2010

Organizers: J. Harris, K. Lehnert, R. Lifshitz, J. von Delft, E. Weig, M. Kiselev

International Workshop on "Time-Dependent Dynamics and Nonequilibrium Quantum Systems", Budapest, May 19-22, 2010. Supported by Research Networking Programme Interdisciplinary Statistical and Field Theory Approaches to Nanophysics and Low-dimensional Systems (INSTANS)

Organizers: G. Mussardo, G. Takács, J. von Delft, G. Zaránd

2009 Arnold Sommerfeld Summer School on "Condensed Matter Physics with Ultracold Atom Gases", Munich, October 12-17, 2009.

Organizers: S. Kehrein, J. von Delft, A. Pelster, U. Schollwöck, I. Bloch

International workshop on "New Renormalization Techniques in Condensed Matter Systems", Wallenberg Research Center, Stellenbosch, South Africa. August 31-September 11, 2009. Organizers: Izak Snyman, F. Scholtz, S. Kehrein, J. von Delft

DIP Workshop on "Dynamics of Electrons and Collective Modes in Nanostructures", Munich, November 21-22, 2008.

Organizers: J. von Delft, F. Marquardt, D. Cohen

Spintronics SPP1285 Mini-Meeting, Munich, October 17-18, 2008.

Organizers: J. von Delft, Y. Gefen

2008 Arnold Sommerfeld Summer School on "(Boundary) Conformal Field Theory:

Introduction and Applications", Munich, October 6-10, 2008.

Organizers: D. Lüst, G. Cardoso, J. Von Delft

International Workshop on "Nanomechanical Systems Approaching the Quantum Regime",

Munich, September 15-17, 2008.

Organizers: F. Marquardt, E. Weig, M. Kiselev, J. von Delft

Symposium: "Efficient classical simulation of strong correlated systems",

Frühjahrstagung der Deutschen Physikalischen Gesellschaft, Berlin, February 26, 2008.

Organizers: J. von Delft, I. Cirac

2007 Arnold Sommerfeld Summer School, Munich, October 1-12, 2007.

Organizers: T. Franosch, E. Frey, S. Kehrein, F. Marquardt, J. Von Delft

4th Windsor Summer School on Condensed Matter Theory, on "Quantum Transport and Dynamics in Nanostructures", Great Park, Windsor, UK, August 6-18, 2007.

Organizers: V. Falko, J. von Delft, V. Kravtsov, I. Lerner, P. Littlewood.

DIP Workshop on "Dynamics of Electrons and Collective Modes in Nanostructures",

Ben Gurion University, May 11-13, 2007.

Organizers: D. Cohen, J. von Delft

Arnold Sommerfeld Workshop on "Nonequilibrium Phenomena in Classical and

Quantum Systems", Munich, September 9-11, 2006.

Organizers: S. Kehrein, J. von Delft, E. Frey

Spintronics'05: International Conference of the "Spintronics" European Research Training

Network, on "Spin-Dependent Transport through Nanostructures", Mierzecin near Poznan;

Poland, 25-30 September, 2005

Organizers: J. Barnaś, J. von Delft, J. Martinek

Midterm Review Meeting of the "Spintronics" European Research Training Network,

Budapest, Hungary, October 4-7, 2004

Organizers: L. Borda, G. Zaránd, J. von Delft

Euro-Summer School on Condensed Matter Theory, "Field Theory of Quantum

Coherence, Correlations, and Mesoscopics", Great Park, Windsor, UK, August 9-22, 2004.

Organizers: V. Falko, Th. Giamarchi, I. Lerner, J. von Delft

330. WE-Heraeus Seminar on "Control of Quantum Coherence",

Bad Honnef, July 26-28, 2004

Organizers: F. Wilhelm, J. von Delft

DIP Meeting on "Coherence, Disorder and Interactions in Coupled Mesoscopic

Systems",

Munich, September 19-20, 2003. Organizers: J. von Delft, Y. Oreg, S. Levit

Workshop of "Spintronics" European Research Training Network, Munich, November 21-22, 2003 Organizers: L. Borda, J. von Delft

Workshop of "Spintronics" European Research Training Network, Trieste, Italy, August 19, 2002 Organizers: J. von Delft

#### TALKS: SEMINARS AND CONFERENCES

Multiloop Functional Renormalization Group That Sums Up All Parquet Diagrams

- Exact Renormalization Group 2018, Paris, July 9-13, 2018 [I was invited to give a plenary talk at this meeting, but suggested to the organizers that the talk should be given by my PhD student, Fabian Kugler.]

Open Wilson chains for quantum impurity models: keeping track of all bath modes - APS March Meeting, New Orleans, March 13, 2017

Nonequilibrium steady-state transport through quantum impurity models – a hybrid NRG-DMRG treatment

- Synergies between Mathematical and Computational Approaches to Quantum Many-Body Physics, Erwin Schrödinger Institute, Vienna, October 6, 2016
- Wilhelm and Else Heraeus-Seminar on Simulating Quantum Processes and Devices, September 22, 2016

Conductance anomalies in transport through quantum dots and quantum point contacts

- Bathseva de Rothshild Seminar on Topology meets Disorder and Interactions: Present Challenges, Future Promises, Mitzpe Ramon, Israel, May 27, 2018
- Universität Graz, June 7, 2016
- Universität Regensburg, June 30, 2016
- Max Planck Institut für Festkörperforschung, Stuttgart, May 24, 2016

Spin-orbital separation in a 3-band Hubbard-Hund metal: a real-frequency DMFT+NRG study

- Gordon Research Conference on Entanglement and Coherence in Quantum Matter, Mount Holyoke College, Massachusetts, USA, June 25, 2018
- Workshop on Quantum Many-Body Theory and Computation, Beijing, November 23, 2016
- Frontiers of Quantum and Mesoscopic Thermodynamics, Prague, July 30, 2015

*Spin dynamics in quantum point contacts showing the 0.7-anomaly* 

- APS March Meeting, San Antonio, March 5, 2015
- Freie Universität Berlin, July 7, 2015

Effect of spin-orbit interactions on the 0.7-anomaly in quantum point contacts

- Gordon Godfrey Workshop on Spins and Strong Correlations, Sydney, Australia, November 4, 2015
- International Workshop on Nonequilibrium Dynamics of Low-Dimensional Electronic Systems, Leipzig, January 15, 2015

*The 0.7-anomaly in quantum point contacts* 

- Max Planck Institute for Quantum Optics, Garching, November 26, 2014
- Cambridge University, October 22, 2014
- ETH Zürich, June 13, 2014
- Universität des Saarlandes, June 5, 2014

- Reinisch-Westfaelische Technische Universität Aachen, February 10, 2014
- Technische Universität Dresden, January 1, 2014
- International Workshop on Semiconductor Spintronics, Würzburg, October 1, 2013
- Frontiers of Quantum and Mesoscopic Thermodynamics, Prague, August 1, 2013
- NTH School for Contacts in Nanosystems, Goslar, June 15, 2013
- Trieste, April 10, 2013
- APS March Meeting, Baltimore, March 20, 2013
- Köln, January 18, 2013
- Altenberg, Transregio TR12 meeting, July 14, 2012
- ETH Zurich, July 2, 2012
- St. Petersburg, workshop:"Fundamentals of Electronic Nanosystems", NanoPiter2012, June 23 July 29, 2012
- Trieste, January 2012
- Workshop on Quantum Spintronics II, Porto Ottiolu, Sardinia, October 02-06, 2011
- Frontiers of Quantum and Mesoscopic Thermodynamics (FQMT'11), Prague, July 25-30, 2011
- SPP1285 Mini-Workshop on "Spin and Quantum Transport", Berlin, May 25-26, 2011

# Coulomb Blockade and Kondo Effect (3 lectures)

- International Doctoral Training Session, "Frontiers of Condensed Matter", Les Houches, September 5-16, 2011

## Chebychev matrix product state (CheMPS) approach for spectral functions

- Max Planck Institute for Quantum Optics, March 31, 2011

# DMRG-optimized NRG-treatment of sub-ohmic spin-boson model

- Workshop on "Developments and Prospects in Quantum Impurity Physics", Max Planck Institute for the Physics of Complex Systems, Dresden, May 30 - June 10, 2011
- 465. WE-Heraeus-Seminar Analytische und numerische Methoden korrelierter Elektronen, Physikzentrum Bad Honnef, September 27 October 1, 2010

# Numerical algorithm for calculating SU(N) Clebsch-Gordan coefficients

- SFB-TR12 meeting, Langeoog, February 21-26, 2010

# 1d-to-0d Crossover of Dephasing Time in Small Mesoscopic Rings

- Workshop on "Quantum transport in electronic nanosystems", Karlsruhe, September 20-24, 2009
- Perspectives of Mesoscopic Physics Celebrating the 70<sup>th</sup> Birthday of Professor Joe Imry, Weizmann Institute, Israel, Mai 31 June 1, 2009

#### Nonequilibrium Dynamics of a Kondo Exciton

- University of Witwatersrand, June 4, 2015
- ECT\* Trento, workshop "Many-body open quantum systems: From atomic nuclei to quantum dots", September 24-28, 2012
- KITP, Santa Barbara, program on "Quantum Dynamics in Far from Equilibrium Thermally Isolated Systems", September 2012
- 2nd Advanced workshop on Spin and charge properties of low dimensional systems, Brasov, Romania, July 17-22, 2011
- Autumn College on "Non-Equilibrium Quantum Systems", Buenos Aires, Argentina, May 2-13, 2011

- Workshop on "The Science of Nanostructures: New Frontiers in the Physics of Quantum Dots", Chergonolovka, September 20-24, 2010
- Oxford University, October 22, 2010
- Laboratoire de Physique des Solides, Orsay, October 5, 2010
- Munich, 7. June 2010
- University of Konstanz, February 8, 2010
- Dahlem Center, FU Berlin, November 3, 2009
- Workshop "From Nuclei to Nanoscience: Nuclei, Quantum Dots, and Nanostructures", Institute for Nuclear Theory, Seattle, July 20 August 28, 2009
- Karlsruhe, June 17, 2009
- Workshop on "Low Dimensional Electron Systems", Kavli Institute for Theoretical Physics, Santa Barbara, April 1, 2009

Kondo Decoherence: Finding the Right Spin Model for Iron Impurities in Gold and Silver

- Dahlem Center, FU Berlin, April 19, 2010
- Unifying Themes in Condensed Matter, Aspen Center for Physics, USA, January 11-17, 2009

Bosonization for Beginners – Refermionization for Experts (4 lectures)

- School on "Low Dimensional Nanoscopic Physics", at the Harish-Chandra Research Institute at Allahabad, India, January 28 - February 9, 2008

Mesoscopic to Universal Crossover of Transmission Phase of Multi-Level Quantum Dots

- Workshop on "Quantum Physics with Non-Hermitian Operators", Max Planck Institute for the Physics of Complex Systems, Dresden, June 15 25, 2011
- Frontiers of Quantum and Mesoscopic Thermodynamics 2008 (FQMT'08), Prague, July 28 August 2, 2008
- Solid State Theory Seminar, Frankfurt, June 13, 2008
- Advanced Research Workshop on "Fundamentals of electronic nanosystems", St. Petersburg, June 28 July 2008
- International Symposium on "Nanoelectronics and Quantum Transport", Karlsruhe, April 19, 2008
- International workshop on "Interaction and Interference in Nanoscopic Transport", Dresden, February 21, 2008
- International workshop on "Fundamental Problems of Mesoscopic Physics and Nanoelectronics", Mojacar, Spain, September 12, 2007
- Fifty Years of Condensed Matter Physics: A Symposium on the occasion of Vinay Ambegaokar's retirement, Cornell University, Ithaca, June 16, 2007
- ICTP, Trieste, May 23, 2007
- DIP-Meeting, Ber Sheeva, May 9 14, 2007
- Budapest, April 11, 2007
- Deutsch-Chinesische Konferenz, Hangzhou, March 10 18, 2007
- CeNS Winterschool, "From Quantum Devices to Biological Engines", February 12, 2007

Kondo Effect in Quantum Dot (4 lectures)

 The 4<sup>th</sup> Windsor Summer School on Condensed Matter Physics, "Quantum Transport and Dynamics in Nanostructures", Windsor, UK, August 6-18, 2007 Two-dimensional cavity grid for scalable quantum computation with superconducting circuits

- Internal Workshop of Klaus Ensslin & Atac Imamoglu, Conference, Villa Garbald, September 25, 2006

Modernizing the Numerical Renormalization Groups using Quantum Information Theory

- Workshop on Nonequilibrium Transport of Strongly Correlated Systems Towards Simulation of Novel Devices, Bad Honnef, January 30 to February 2, 2007
- Hannover, December 7, 2006
- Dynamics and Relaxation in Complex Quantum and Classical Systems and Nanostructures, MPI Dresden, August 7-11, 2006

Really (!) useful Quantum Information Theory: a Matrix Product State Approach to Quantum Impurity Models

- Waterloo University, Canada, June 5, 2006
- "Spintronics Workshop", Kavli Institute for Theoretical Physics, Santa Barbara, April 24, 2006

Gate-controlled Spin-splitting in Quantum Dots with ferromagnetic Leads in the Kondo Regime

- International Symposium Trends in Nanoscience, Irsee, October 8-12, 2005

Kondo Effect in Quantum Dots attached to ferromagnetic leads

- CNRS Grenoble, France, December 10, 2004

Kondo Excitons in Quantum Dots

- CeNS Workshop "Nanoscience: linking disciplines", Venice International University, Venice, Italy, September 30, 2004

Kondo Effect in Quantum Dot (3 lectures)

- Euro Summer School on Condensed Matter Theory, "Field Theory of Quantum Coherence, Correlations, and Mesoscopics", Windsor, UK, August 16-22, 2004

Charge Oscillations in Quantum Dots

- Scuola Normale Superiore, Pisa, Italy, July 12, 2004

Spectroscopy of Discrete Energy Levels in Ultrasmall Metallic Grains (4 lectures)

- Chris Engelbrecht Summer School in Theoretical Physics, in Drakensberg, Natal, South Africa, January 21-30, 2004

Decoherence of Interacting Electrons in Disordered Metals

- Caltech, USA, July 6, 2006
- International Seminar on "Quantum Coherence, Noise and Decoherence in Nanostructures", Dresden, May 15 26, 2006
- Cornell University, USA, May 14, 2006
- Yale University, USA, May 12, 2006
- Harvard University, USA, May 11, 2006
- Stanford University, USA, April 6, 2006
- Weizmann Institute, Rehovot, Israel, January 5, 2006
- Basel, Switzerland, December 16, 2005
- Karlsruhe, November 18, 2005
- Zürich, Switzerland, October 27, 2005

- Regensburg, September 2005
- Cologne, June 17, 2005
- University of Göttingen, April 28, 2005
- Physikalisches Kolloquium, Universität Augsburg, January 12, 2004
- NATO-ARW/EURESCO Conference "Fundamental Problems of Mesoscopic Physics", Granada, September 6-11, 2003
- Workshop "Quantum Transport and Correlations in Mesoscopic Systems and QHE", Dresden, August 3-16, 2003
- Dresden, DPG Frühjahrstagung, March 23-26, 2003

#### SU(4) Kondo Effect in coupled quantum dots

- 316. Heraeus Seminar, Bad Honnef, October 23, 2003
- University of Lund, Sweden, September 15, 2003
- Workshop "Modern Aspects of Quantum Impurity Systems", Dresden, April 2-5, 2003
- Dresden, January 22, 2003
- International Conference on Nanoelectronics, Lancaster, UK, January 2-9, 2003

## Kondo Effects in Quantum Dots

- Physikalisches Kolloquium, Karlsruhe, November 18, 2005
- CeNS Workshop, Seeon, September 28, 2003
- Workshop CeNS, Wildbad Kreuth, October 6-9, 2002

Transport durch Punktkontakte: Leitwertquantisierung,

- Jülich, March 10, 2003

DMRG-Study of Superfluid-Mott-transition in Dimensional Optical lettices

- Quantum Optics Meeting, Oberburgl, Austria, February 23-26, 2003

Decoherence of Interacting Electrons in Disordered Conductors: on the Relation between influence functional and diagrammatic Approaches,

- Tokyo, August 15, 2002

Decoherence of Interacting Electrons in Disordered Conductors,

- Workshop on Mesoscopics Physics and Electron, Trieste, June 26-30, 2002

Exact Solution of the Discrete-State BCS Model for Superconductivity in Nanograins (why perturbation theory fails and how nonperturbative results emerge with increasing system size)

- University of Wuppertal, May 13, 2004
- Augsburg, February 5, 2002
- Theoriekolloquium, Munich University, January 30, 2002

Transport through superconducting and ferromagnetic nanograins

- Antwerpen, 6-7. Juni 2002
- Berlin, FU und HMI Colloquium, February 1-4, 2002
- Basel, December 3, 2001
- Workshop on "Halbleiter und Metallcluster", Kochel am See, October 22, 2001

Tunneling Transport through Ferromagnetic Nanograins

- Nanoscience Conference, Institute for Theoretical Physics, Santa Barbara,

August 20-24, 2001.

- Harvard University, March 8, 2001

Tunneling Transport through Individual Ultrasmall Metallic Grains

- Hahn-Meitner Institut, Berlin, February 4, 2002
- Kolloquium der Münchner Physiker, TU Munich, November 5, 2001
- CeNS Workshop on "Nanoscience: Scientific, Technological and Economic Perspectives: Tools and Devices", in Venice, September 24-29, 2001
- Saarbrücken, January 9, 2001
- XXIV International School of Theoretical Physics on Transport Phenomena from Quantum to Classical Regimes, Ustron, Polen, September 25. - October 1, 2000

Spintronics: Anwendungsperspektiven des Spinabhängigen Transports in Halbleitern

- Habilitationskolloquium, University Karlsruhe, July 19, 2000

Superconductivity in Ultrasmall Grains: Richardson's Exact Solution

- Workshop on Nanoscale Superconductivity and Magnetism, Argonne National Laboratory, June 18.-20, 2000

Two channel Kondo scattering from two-level tunneling systems

- Workshop on Size Dependent Magnetic Scattering, Pecs, Hungary, May 28 - June 1, 2000

Exact Study of the Effect of Level Statistics in Ultrasmall Superconducting Grains

- 18th General Conference of the Condensed Matter Division of the European Physical Society, Montreux, Switzerland, March 13.-17, 2000

Transmission Phase Shift of a Quantum Dot with Kondo Correlations

- Madrid, September 10, 2002
- Freie Universität Berlin, February 1, 2002
- Workshop on "Spins in Nanostructures", Aspen Center for Physics, July 30- August 18, 2001
- Spinoza Institute, Utrecht, June 19, 2001
- CeNS, Munich University, April 27, 2001
- March Meeting of the American Physical Society, in Seattle, March 11-17, 2001
- ETH Zürich, February 26, 2001
- CeNS Winterschool on "Sensing and Manipulating in the Nanoworld", in Mauterndorf, February 17-24, 2001
- TMR Advanced Research School, "Space- and Frequency- and Time-Resolved Quantum Transport, Hamburg, September 3.-9, 2000
- Minisymposium on Correlation in Mesoscopic Systems, Trieste, August 1.-14, 2000
- 236. WH-Heraeus-Workshop on Interacting Electrons in Nanostructures, Bad Honnef, June, 12.-16, 2000
- Max-Planck-Institut für Festkörperforschung, Stuttgart, May 16, 2000
- Regensburg, May 5, 2000
- Newton Institute, Cambridge, April 6, 2000
- Physikalisches Kolloquium, Braunschweig, February 8, 2000
- Bonn, January 31, 2000
- RWTH Aachen, January 11, 2000
- Augsburg, December 14, 1999

- Tel Aviv, Israel, November 29, 1999
- Quantum Electronics in Low-Dimensional Systems, second meeting DIP, Beer Sheva, Israel, November 25-26, 1999
- Weizmann Institute, Rehovot, Israel, November 23, 1999
- Technische Universität in Delft, NL, November 15, 1999

Superconductivity in Ultrasmall Grains and the Crossover from the Bulk to the Few-Electron Limit

- Conference on Quantum Mesoscopic Phenomena and Mesoscopic Devices in Microelectronics, NATO Advanced Study Institute, Ankara/Antalya, Turkey, June 13.-25, 1999

Dephasing in Metals by Two-Level Systems in the 2-Channel-Kondo Regime (Poster) LOCALIZATION 1999 - Disorder and Interaction in Transport Phenomena, Hamburg, July 30 - August 2, 1999

Fixed-N Superconductivity: The Cross-Over from the Bulk to the Few-Electron Limit,

- March Meeting of the American Physical Society, Atlanta, March 20-26, 1999

Finite-Size Bosonization of 2-Channel Kondo Problem: a Bridge between the Numerical Renormalization Group and Conformal Field Theory,

- March Meeting of the American Physical Society, Atlanta, March 20-26, 1999

Chairman of the Symposium Supraleitung in mesoskopischen und nanoskopischen Systemen

- Frühjahrstagung der Deutschen Physikalischen Gesellschaft, Münster, March 22.-26, 1999

Finite-Size Bosonization of 2-Channel Kondo Problem: a Bridge between the Numerical Renormalization Group and Conformal Field Theory:

- Cologne, March 17, 1999
- Göttingen, October 22, 1998

Exakte Finite-Size Analyse des 2-Kanal-Kondo Models mittels Bosonisierung (Poster),

- Frühjahrstagung der Deutschen Physikalischen Gesellschaft, Regensburg, March 23-27, 1998

The Kondo Box: Transport through an Ultrasmall Metallic Grain with a Kondo Impurity

- Quantum Electronics in Low-Dimensional Systems, First Meeting DIP, Max-Plank Institut Stuttgart, November 13-14, 1998
- First International Symposium on Phase Coherent Dynamics of Hybrid Nanostructures, Ioannina, Greece, May 25-31, 1998
- Dresden (Max Planck Institut), December 4, 1997

Elementary Exact Solution of the 2-Channel Kondo Problem for the Mathematically Challenged

- Freiburg, May 13, 1998
- University Stellenbosch, South Africa, October 8, 1997
- Cornell University, August 29, 1997
- Bonn, June 30, 1997
- Boston (MIT), March 24, 1997

Paramagnetic Breakdown of Superconductivity in Ultrasmall Metallic Grains

- 184. WE-Heraeus-Seminar, "AC and Time Dependent Quantum Transport", Bad Honnef, October 20.-24, 1997
- Adriatico Research Conference on Superconductivity, Andreev Reflections and Proximity Effect in Mesoscopic Structures, Trieste, July 8.-11, 1997.
- First International Symposium on Phase Coherent Dynamics of Hybrid Nanostructures, Miraflores de la Sierra (Madrid), April 9.-12, 1997
- March Meeting of the American Physical Society, Kansas City, March 17.-21, 1997

Zusammenbruch der Supraleitung in ultrakleinen metallischen Körnern (Hauptvortrag)

- Frühjahrstagung der Deutschen Physikalischen Gesellschaft, Münster, March 17.-21, 1997

Breakdown of Superconductivity in Ultrasmall Metallic Grains

- Basel, May 28, 1997
- Providence (Brown University), March 26, 1997
- Boston (Boston College), March 25, 1997
- Budapest, December 6, 1996

Superconductivity in Ultrasmall Grains

- Brandeis University, March 7, 2001
- Hannover, June 7, 2000
- Graduiertenkolleg, Regensburg, July 9, 1999
- Grenoble, June 25, 1999
- Tübingen, June 23, 1999
- Ludwig-Maximilians-Universität Munich, June 7, 1999
- Penn State University, April 19, 1999
- UC Davis, April 12, 1999
- SUNY Stony Brook, April 7, 1999
- Harvard University, March 3, 1999
- Cornell University, February 23, 1999
- Walter-Meissner Institut, Munich, December 11, 1998
- Physikalisches Kolloquium, Karlsruhe, Novemeber 13, 1998
- Euroconference on Strongly Correlated Electrons in Mesoscopic Structures, Torino, September 2.-7, 1996

Finite-Size Effects in Ultra-small NSN SET Transistors

- 21st International Conference on Low Temperature Physics, Prague, August 8.-14, 1996

Parity-Affected Superconductivity in Ultrasmall Metallic Grains

- NATO Conference on "Mesoscopic Electron Transport, Curação, June 25 - July 5, 1996

Introduction to the Conformal Field Theory Solution of the Kondo Problem, (3 Vorträge): Augsburg, October 25-26, 1995

- 2-Channel Kondo Scaling in Metallic Point Contacts CFT Calculation of Scaling Curve
- Frühjahrstagung der Deutschen Physikalischen Gesellschaft, Regensburg, March 25-29, 1996
- (Poster) International Workshop on Localization and Transport in Disordered and Low-Dimensional Systems, Karlsruhe, October 4-6, 1995

- Euroconference on Mesoscopic Superconductivity and Josephson Junction Arrays, Torino, September 11-22, 1995
- Harvard University, August 15, 1995
- Technical University, Delft, May 12, 1995
- (Poster) Conference on "Quantum Impurity Problems", Gainsville, Florida, February 24-26, 1995
- 1994 March Meeting of the American Physical Society, Pittsburgh, March 21-25, 1994
- Munich, February 9, 1994
- Augsburg, February 8, 1994
- Bayreuth, February 7, 1994
- Karlsruhe, February 4, 1994

Introduction to the Kondo Problem and its Conformal Field Theory Solution, and 2-Channel Kondo Scaling in Metal Point Contacts (2 lectures)

- Summer School, Field Theory and Condensed Matter Physics, Stormsriviermond, South Africa, January 17.-28, 1994

Destructive Quantum Interference in the Kagomé Antiferromagnet,

- 1993 March Meeting of the American Physical Society, Seattle, March 22-26, 1993
- Gordon Conference on Strongly Correlated Electron Systems, Brewster Academy, Wolfeboro, New Hampshire, August 17-21, 1992

Resonances in the Walecka Model and the Rarita-Schwinger Inconsistencies

- 1990 Annual Meeting of the South African Physical Society, Port Elizabeth, June, 1990