Analytic and algebraic methods in physics (AAMP 13)

Prague, June 6–9, 2016

Schedule

Monday, June 6

09.00 - 09.50	Registration
09.50 - 10.00	Welcome & Opening
10.00 - 10.25	Pavel Exner: A small step for the coupling constant but a giant leap for the spectrum
10.30 - 11.00	Coffee break
11.00 - 11.25	Rafael Tiedra de Aldecoa: Commutator criteria for strong mixing
11.30 - 11.55	Emanuela Caliceti: An existence criterion for the PT-symmetric phase transition in higher dimension
12.00 - 14.00	Lunch break
14.00 - 14.25	Günter Wunner: The octagon method for finding exceptional points, and application to resonances of hydrogen-like systems in parallel electric and magnetic fields
14.30 - 14.55	Qinghai Wang: Non-linear Eigenvalue Problems and PT-symmetric Potentials
15.00 - 15.30	Coffee break
15.30 - 15.55	Teoman Turgut: Born-Oppenheimer approximation in a singular system
16.00 - 16.25	Juraj Boháčik: Propagator for quartic oscillator with time dependent parameters

Tuesday, June 7

09.30 - 9.55	Dorje Brody: Quantum Thermodynamics
10.00 - 10.25	Géza Lévai: Unavoided crossing of energy levels in PT-symmetric Natanzon-class potentials
10.30 - 11.00	Coffee break
11.00 - 11.25	Yogesh Joglekar: PT breaking transitions in dissipative two-level Floquet system
11.30 - 11.55	M Howard Lee: Hamilton-Jacobi trajectories of comets Kohoutek and ISON: A novel approach to celestial dynamics
12.00 - 14.00	Lunch break
14.00 - 14.25	Carl M. Bender: Some new results on PT symmetry
14.30 - 14.55	Eva-Maria Graefe: Quasiclassical analysis of Bloch oscillations in non-Hermitian tight-binding lattices
15.00 - 15.30	Coffee break
15.30 - 15.55	Daniel Hook: A study Hamiltonians with a logarithmic dependence
19.00 - 22.00	Conference dinner

Wednesday, June 8

10.00 - 10.25	Ali Mostafazadeh: Transfer matrix formulation of scattering theory in arbitrary dimensions
10.30 - 11.00	Coffee break
11.00 - 11.25	Sergeii Kuzhel: A class of solvable models with nonlocal point interactions
11.30 - 11.55	Carsten Trunk: On PT symmetric operators in Krein spaces
12.00 - 14.00	Lunch break
14.00 - 14.25	Vladimir Lotoreichik: Spectra of definite type in waveguide models
14.30 - 14.55	Ingrid Rotter: Higher-order exceptional points
15.00 - 15.30	Coffee break
15.30 - 15.55	Dieter Heiss: Three coupled wave guides and third order exceptional points

Thursday, June 9

09.30 - 9.55	Raymond F. Bishop: Journeys to and in Quantum Phase Space: Extended Quantum Phase-Space Formulations of Quantum Many-Body Theory and Quantum Information Theory
10.00 - 10.25	Joshua Feinberg: Self-Adjoint Wheeler-DeWitt Operators, the Problem of Time and the Wave Function of the Universe
10.30 - 11.00	Coffee break
11.00 - 11.25	Štěpán Starosta: Number theory and spectral instabilities in metamaterials
11.30 - 11.55	Vít Jakubský: Dispersionless wave packets in Dirac systems
12.00 - 14.00	Lunch break
14.00 - 14.25	Pavel Winternitz: Superintegrable systems in classical and quantum mechanics. Background, ideas and new developments.
14.30 - 14.55	Francisco Correa: Regularized degenerate multi-solitons
15.00 - 15.30	Coffee break
15.30 - 15.55	Uwe Guenther: From Landau-Ginzburg to PTQM
16.00 - 16.25	Fabio Bagarello: Bi-coherent states for pseudo-bosons and other stuff
16.30 - 16.45	Closing