

Tuesday 17.06.2025

	8:00	Registration	
	8:55	Opening	
	Spectroscopy I		
O1	9:00	James Tobin	TUTORIAL - HERFD vs XAS: The Case for Equivalence
O2	10:00	Denis Vyalikh	4f-driven surface effects in lanthanide materials from ARPES and XAS: Reorientation of 4f moments, 2D ferromagnetism, Kondo and Rashba effects
	10:30	Coffee break	
	Spectroscopy II		
O3	11:00	Jindřich Kolorenč	Can the Valence-to-Core RIXS Measured at the Uranium M5 Edge Quantify the Uranium–Ligand Hybridization in Insulators like UO ₂ and UF ₄ ?
O4	11:30	Ladislav Havela	XAS studies of U hydrides and other U systems - a key to the 5f occupancy?
	12:00	Lunch	
	Arsenides		
O5	14:00	Eteri Svanidze	Revisiting arsenides – from simple to complex
O6	14:30	Mitja Krnel	A new family of topological insulators RAsS (R = Y, La, Sm)
O7	15:00	Nazar Zaremba	New uranium-cobalt-arsenides with antiferromagnetic ordering
	15:30	Coffee break	
	RE-compounds I (YbRh ₂ Si ₂)		
O8	16:00	Petra Knappová	Magnetic Susceptibility of YbRh ₂ Si ₂
O9	16:30	Jan Knapp	The Heavy Fermion YbRh ₂ Si ₂ – Spin Triplet Superconductor Underpinned by Antiferromagnetism
	17:00	Welcome party	

Wednesday 18.06.2025

	Superconductivity		
O10	9:00	Oksana Karychort	New heavy fermion compound Ce ₆ Rh ₃₀ As ₁₉ : crystal structure and physical properties
O11	9:30	Anamaria Ghihor	Hybrid Superconducting Devices
O12	10:00	Özlem Evren	Synthesis and superconductivity of Be-based compounds
	10:30	Coffee break	
	Electronic structure – Theory I		
O13	11:00	Jeremy Sourd	Acoustic signatures of the field-induced electronic-topological transitions in YbNi ₄ P ₂
O14	11:30	Ryszard Radwanski	Strongly electron-correlated atomic-like approach to 3d/4f/5f/4d/5d/ compounds
	12:00	Lunch	
	Complex behavior		
O15	14:00	Phillip Gegenwart	Kagome spin ice HoAgGe
O16	14:30	Rachel Nixon	Expanding investigations into ternary compounds of rare-earth mercurides
O17	15:00	Sudip Malick	Large magnetoresistance and complex magnetism in single-crystalline EuAg ₄ Sb ₂
	15:30	Coffee break	
	U-compounds (UTe ₂)		
O18	16:00	Yoshifumi Tokiwa	Self-reconstruction of order parameter in spin-triplet superconductor UTe ₂
O19	16:30	Fabrice Wilhelm	5f electron occupancy and hybridization in the UTe ₂ superconductor from XANES and XMCD studies.
O20	17:00	Michal Vališka	Ultrasound Study of Field-Induced Superconducting Phases in UTe ₂
	17:30 19:00	Posters + refreshment (List of posters is at the end of program)	

Thursday 19.06.2025

	RE-compounds II (Ce)		
O21	9:00	Gertrud Zwicknagl	Unusual orders in CeRh ₂ As ₂
O22	9:30	Peter Riseborough	Magnetic Excitations of a Nodally-Hybridized Heavy-Fermion Semi-Metal: Application to CeNiSn
O23	10:00	Jeroen Custers	Magnetic Phase Transitions in Sawtooth-Structured CeRhSn ₂ : Interplay of Frustration and Ordering?
	10:30	Coffee break	
	Electronic structure – Theory II		
O24	11:00	Josef Spalek	Quantum statistics near Mott localization: Superexclusion and distinguishability
O25	11:30	Maciej Fidrysiak	Variational framework for quantitative description of quantum collective excitations in correlated systems
	12:00	Lunch	
	Transition metals		
O26	14:00	Krishna Pokhrel	Pressure-dependent Magnetism in 2D van der Waals Materials (CrBr ₃ and VI ₃): A Theoretical calculations
O27	14:30	Andrej Kancko	Spin-glass and random-singlet ground-states in NaCdM ₂ F ₇ pyrochlore (M = Co ²⁺ , Ni ²⁺ , Cu ²⁺) and defect-fluorite (M = Mn ²⁺) antiferromagnets
O28	15:00	Petr Čermák	Measurement of Altermagnetic Magnon Splitting in CrSb with Circularly Polarized X-Ray Scattering
	15:30	Coffee break	
	Applications		
O29	16:00	Itzhak Halevy	Novel Fission Track Detector for Nuclear Forensics: Integrated Aerogel-Lexan detector to determine the different fission isotope
O30	16:30	Galit Katarivas Levy	Transforming Healthcare through Additive Manufacturing
	17:00	Free time	
	19:00 22:00	Grill party	

Friday 20.06.2025

	RE-compounds III (Frustration)		
O31	9:00	Naoto Metoki	Magnetic and quadrupole coupling emerging in NdB ₄ with geometrical frustration
O32	9:30	Tim Treu	Utilizing frustration in Gd- and Yb-based oxides for milli-Kelvin adiabatic demagnetization refrigeration
O33	10:00	Sonu Kumar	Magnetoelectric Coupling and Dielectric Anomalies in the Frustrated Quantum Magnet PrMgAl ₁₁ O ₁₉
	10:30	Coffee break	
	RE-compounds IV		
O34	11:00	Fuminori Honda	Electronic Properties of Eu-Based Compounds under High Pressure
O35	11:30	Dominik Legut	Perpendicular magnetic anisotropy in a single Dy adatom ferrimagnet
	12:00 14:00	Summary, Non-structured discussion and excursions to the laboratories	

List of posters		
Code	Title	Presenter
P1	Angle-Resolved Photoemission Spectroscopy Study of Kondo Semimetals/Insulators: CeNiSn, CeRhSb, CeRhAs	J.-S. Kang
P2	Magnetic properties of the Dy _x Y _{1-x} (PO ₃) ₃ glasses	Vladimír Tkáč
P3	Magnetism of Nd _{3-x} U _x Ru ₄ Al ₁₂ intermetallic compounds	Alexander Andreev
P4	Pseudogap in slightly doped Y _{0.77} Pr _{0.23} Ba ₂ Cu ₃ O _{7-δ} single crystals	Liudmyla Bludova
P5	High field study of UTe ₃	Tetiana Haidamak
P6	Robust pressure effects on magnetic orders in NiBr ₂	Parvez Ahmed Qureshi
P7	Search for new REAgBi ₂ compounds	Ivanna Arseniuk
P8	Enhancing Fission Track Analysis for Nuclear Forensics: Image Processing Automation and Aerogel Integration	Itzhak Halevy
P9	Influence of Hafnium on α-UH ₃ Phase Stability and Magnetism in Uranium Hydrides	Shanmukh V.V. Uday Devanaboina
P10	Sub-50mK adiabatic demagnetization refrigeration with frustrated Yb- oxide magnets in the PPMS.	Marvin Klinger
P11	Magnetic structure and excitations in the antiferromagnet Na ₂ BaMn(PO ₄) ₂	David Svitak
P12	LaueDB: A Dataset for Laue Patterns	Štěpán Venclík
P13	Charles Automata: Physics laboratory automation	Tomáš Červen
P14	EuAl: synthesis, crystal structure and properties	Yurii Prots
P15	Taming Mosaicity with Robotics and AI: The Automatic Laue Sample Aligner (ALSA)	Jan Kříž
P16	Crystal growth of unconventional superconductor UTe ₂ and other U-Te intermetallics	Andrej Cabala
P17	Magnetism of NdMn _{1-x} Ti _x O ₃ system	Marian Mihalik