

SFB *BeyondC* Winter Workshop

25 & 26 February 2025

ISTA, Campus 1, MOONSTONE, 3400 Klosterneuburg



TUESDAY 25.02.2025

Time	Program
11:00-12:00	Business Meeting (for PIs and invitees)
12:00-13:00	Registration
13:00-13:10	Welcome: Philip Walther and Johannes Fink
13:10-14:00	Tracy Northup ISTA Quantum Colloquium talk UIBK Levitated nanoparticles: a route to the quantum regime
14:00-14:30	Gerhard Kirchmair UIBK Hot Schrödinger Cat state
14:30-15:00	Anne-Catherine de la Hamette UNIVIE Causality in Quantum Information: Indefinite Causal Order, Quantum Reference Frames, and QFT Measurements
15:00-15:30	Josip Bajo UNIVIE Quantum Light from 2D Materials: Entangled Photon Pair Generation
15:30-17:00	Poster Session - Drinks & Snacks
17:00 Bus transfer 18:00 Vienna	Dinner @ Zum Roten Bären (Berggasse 39, 1090) Welcome the SFB YS' Spokesperson & Announcement of the Best Poster Award winner

WEDNESDAY 26.02.2025

Time	Program
08:30-10:00	Women's Breakfast hosted by Tracy Northup @ ISTA Mensa
10:00-10:30	Michael Fellner UIBK Connectivity-aware Synthesis of Quantum Algorithms
10:30-11:00	Martin Mauser UNIVIE Experimental data re-uploading with provable enhanced learning capabilities
11:00-11:30	Miao Cai UIBK Analyzing the single photon indistinguishability: A method for ion-based quantum networks
11:30-12:00	Refik Mansuroglu UNIVIE Preparation of Matrix Product States with Shallow Quantum Circuits
	Lunch Break
13:00-13:30	Vikas Remesh UIBK Coherent optical control of quantum dots
13:30-14:00	Thomas Werner ISTA Interfacing superconducting qubits with optics
14:00-14:30	Artem Zhdanov UIBK Entanglement and site-resolved control in 2D ion crystals
14:30-15:00	Lukas Fiderer UIBK Measurement-based quantum models for generative modelling
	Coffee Break
15:30-17:00	Lab tours