

**MC13 Mesoscopic superconductivity and quantum circuits I**

Monday, 2 September, morning

Chair(s):

Room:

Hours	ID	Name	Type	Title
10h30-11h00	13121	Gerhard Kirchmair	Invited	Hot Schrödinger Cat States
11h00-11h15	12910	Eran Ginossar	Oral	Scalable and robust quantum computing on qubit arrays with fixed coupling
11h15-11h30	12610	Ben Blain	Oral	Many-body localization in chains of superconducting qubits
11h30-11h45	12759	Federico A. Roy	Oral	Parity-Depended State Transfer for Entanglement Generation on a Superconducting Qubit Chain
11h45-12h00	13494	Abbas H. Hirkani	Oral	Effects of Higher Josephson Harmonics in tunnel junctions on superconducting qubit designs
12h00-12h15	13493	Giampiero Marchegiani	Oral	Crossover from nonequilibrium to equilibrium quasiparticle distribution in superconducting qubits
12h15-12h30	13103	Dominik Maile	Oral	Dynamics of the Josephson Phase in the presence of general Ohmic environments
12h30-12h45	13102	Marcin Łobejko	Oral	The bosonic model of the Josephson junction and its relation to the RCSJ model
12h45-13h00	13765	Paul Benedikt Fischer	Oral	The Influence of sub-gap states on quasiparticle dynamics in disordered superconductors

**MC13 Mesoscopic superconductivity and quantum circuits II**

Monday, 2 September, afternoon

Chair(s):

Room:

Hours	ID	Name	Type	Title
16h00-16h30	12327	Francisco J. M- Cañadas	Invited	Quantum circuits with multiterminal Josephson-Andreev junctions
16h30-16h45	13603	Aleksandr Svetogorov	Oral	New type of a superconducting spin qubit
16h45-17h00	12954	Claudio Guarcello	Oral	Diode and anomalous Josephson effects in kinked nanowire-based Josephson junctions
17h00-17h15	13072	Angel Ibabe	Oral	Joule spectroscopy and heating effects in hybrid superconductor-semiconductor devices



17h15-17h30	13078	Gabriel Moraes Oliveira	Oral	Switching currents limited by the inverse proximity effect in a flux-tunable superconductor
17h30-17h45	12872	Giulio Cappelli	Oral	Josephson transmission lines based on Al-AIOx-Al capacitors
17h45-18h00	13658	Nicolò Crescini	Oral	Development and application of optically patterned overlap Josephson junction devices
18h00-18h15	12748	Roudy Hanna	Oral	Superconducting quantum circuits using SiO <sub>2</sub> /Si <sub>3</sub> N <sub>4</sub> on-chip stencil hard mask
18h15-18h30	12751	Thomas J. Smart	Oral	All-nitride superconducting devices on sapphire for quantum computing

### MC13 Mesoscopic superconductivity and quantum circuits III

Tuesday, 3 September, morning

Chair(s):

Room:

Hours	ID	Name	Type	Title
10h30-11h00	13097	Bayan Karimi	Invited	Bolometric detection of Josephson radiation
11h00-11h30	12753	Samuel Cailleaux	Invited	Photonic Joule effect in a superconducting circuit
11h30-11h45	12990	David Scheer	Oral	The superconducting clock-circuit: improving the coherence of Josephson radiation beyond the thermodynamic uncertainty relation
11h45-12h00	13645	Ciprian Padurariu	Oral	Phase locking squeezed states of microwave light
12h00-12h15	13659	Felix Ahrens	Oral	Observation of Microwave Photon Energy Lifting
12h15-12h30	12986	Michele Governale	Oral	Odd-frequency superfluidity from a particle-number-conserving perspective

### MC13 Mesoscopic superconductivity and quantum circuits IV

Tuesday, 3 September, afternoon

Chairman:

Room:

Hours	ID	Name	Type	Title
16h00-16h30	12632	Michael Stern	Invited	Coupling single electrons spins to a superconducting flux qubit
16h30-16h45	12374	Niccolo Traverso Ziani	Oral	Novel effects in quantum spin Hall based Josephson junctions
16h45-17h00	13143	Roberto Capecelatro	Oral	Transport and noise properties of ferromagnetic Josephson junctions at the $0 - \pi$ transition.

17h00-17h15	13560	Emil Siuda	Oral	Competition between Nagaoka ferromagnetism and superconducting pairing in a hybrid quantum dot plaquette
17h15-17h30	13696	Sourabh Patil	Oral	The Andreev bound states and a diode effect in an Ising-superconductor Josephson junction
17h30-17h45	13792	Phillip Mercebach	Oral	Thermoelectric signatures of Bogoliubov Fermi Surface in superconducting 3D Topological Insulator Heterostructures
17h45-18h00	13388	Yuriko Baba	Oral	Induced triplet pairing on chiral Andreev edge states in the quantum Hall regime
18h00-18h15	13171	Gianmichele Blasi	Oral	Topological Josephson junctions in the integer quantum Hall regime
18h15-18h30	13326	Haolin Jin	Oral	Hybrid superconducting coplanar resonator with high T <sub>c</sub> superconductor

### MC13 Mesoscopic superconductivity and quantum circuits V

Wednesday, 4 September, morning

Chair(s):

Room:

Hours	ID	Name	Type	Title
10h30-11h00	13567	Wolfgang Belzig	Invited	Quartet Tomography in Multiterminal Josephson Junctions
11h00-11h30	12270	Luca Chirulli	Invited	Cooper quartets designing in multi-terminal superconducting devices
11h30-11h45	12306	Gianluca Rastelli	Oral	Entangled photon-pair emission in circuit QED from a Cooper pair splitter
11h45-12h00	12623	Rok Zitko	Oral	Quantum dot Josephson junctions
12h00-12h15	13395	Andriani Keliri	Oral	Floquet-Andreev resonances in hybrid superconducting systems
12h15-12h30	12749	Sachin Verma	Oral	Theoretical modelling and Simulations study of Superconducting Qubits as a basis of Quantum Computing

### Poster Session

Monday, 2 September

ID	Name	Title
12876	Rafael Sánchez	Nonlocal heat engines with hybrid quantum dot systems
12879	Erik Sefland Samuelsen	Andreev molecules at distance
13119	Michał Horodecki	Open system description of the Josephson junction