

5th International Conference NanoPlasm2024

Grand Hotel San Michele – June 17-21

Cetraro (Italy)

Sunday, June 16

All day long	Participants arrival
19:00-20:15	Welcome Reception
20:15	Dinner

Monday, June 17

08:30 - 08:45	Opening Ceremony
08:45 – 09:15	Mark Brongersma , Stanford University, <i>Light manipulation with atomically-thin metasurfaces.</i>
09:15 – 09:45	Hatice Altug , Ecole Polytechnique Federale de Lausanne, <i>Nanophotonic Metasurfaces for Biosensing, Spectroscopy and Bioimaging.</i>
09:45 – 10:15	Mario Silveirinha , University of Lisbon, <i>Chiral-gain quantum optics.</i>
10:15 – 10:45	Coffee Break
10:45 – 11:15	Jennifer Dionne , Stanford University, Materials Science and Engineering; Pumpkinseed Technologies, <i>VINPix (Very-large-scale Integrated high-Q Nanophotonic Pixels) for Molecular Sensing, Sequencing and Synthesis.</i>
11:15 – 11:45	Onofrio M. Marago , Istituto per i Processi Chimico-Fisici CNR-IPCF, <i>Optical forces for environmental and space applications.</i>
11:45 – 12:15	Michele Celebrano , Dipartimento di Fisica, Politecnico di Milano, <i>Free-space interferometric routing of upconverted light by dielectric metasurfaces.</i>
12:15 – 16:00	Lunch
16:00 – 16:30	Vladimir Shalaev , Purdue University, <i>Extreme Space-Time Optics.</i>
16:30 – 17:00	Maria A. Vincenti , University of Brescia, <i>Tailoring tunability at the nanoscale: from phase-change materials to iontronic approaches.</i>
17:00 – 17:30	Nicolò Maccaferri , Umeå University, <i>Ultrafast collapse of molecular polaritons in plasmonic photoswitch-nanoantennas.</i>
17:30 – 18:00	Coffee Break and Posters Sessions

- 18:00 – 18:30 **Harald Giessen**, University of Stuttgart, *Plasmonic Twistronics: Discovery of Plasmonic Skyrmion Bags*.
- 18:30 – 19:00 **Carlo Forestiere**, University of Naples "Federico II", *Operative Approaches to Macroscopic Quantum Electrodynamics in Dispersive Dielectric Objects*.
- 19:00 – 19:30 **Cesare Soci**, Nanyang Technological University, *Strong light-matter interactions in dielectric metasurfaces*.
- 20:15 Dinner

Tuesday, June 18

- 08:30 – 09:00 **Andrea Alu'**, City University of New York, *Extreme wave control with space-time metamaterials*.
- 09:00 – 09:30 **Giulio Cerullo**, Politecnico di Milano, *Femtosecond Switching of Strong Light-Matter Interactions in 2D Semiconductor Microcavities*.
- 09:30 – 10:00 **Filippo Capolino**, University of California Irvine, TBA.
- 10:00 – 10:30 Coffee Break
- 10:30 – 11:00 **Yehiahu S. Fainman**, University of California San Diego, *Chip-scale Nanophotonic Technologies and Applications*.
- 11:00 – 11:30 **Rachel Grange**, ETH Zurich, *Solution derived nanomaterials for nonlinear metasurfaces and photonic crystals*.
- 11:30 – 12:00 **Alexander Kildishev**, Purdue University, *Multipole Expansion Centers: Multiplicity and Uniqueness*.
- 12:00 – 16:00 Lunch
- 16:00 – 16:30 **Albert Polman**, NWO Institute AMOLF, *Plasmon interferometry using high energy electrons*.
- 16:30 – 17:00 **Daniele C. Struppa**, Chapman University, Orange (CA), USA, *Analyticity and Supershift*.
- 17:00 – 18:00 Elevator Pitch Session
- 18:00 – 19:30 Coffee Break and Posters Session
- 20:15 Dinner

Wednesday, June 19

- 08:30 – 09:00 **Alexandra Boltasseva**, Purdue, *Transdimensional Materials: From Tailorable Photonics to New Physics*.
- 09:00 – 09:30 **Romain Quidant**, ETH Zurich, *Revisiting biosensing with digital holography*.

09:30 – 10:00	Georgia T. Papadakis , ICFO, <i>Thermal radiation control with crystallographic phase changes and extreme anisotropies.</i>
10:00 – 10:30	Coffee Break
10:30 – 11:00	Franco Nori , RIKEN and University of Michigan, TBA.
11:00 – 11:30	Maria Kafesaki , University of Crete and FORTH, Greece, <i>Dynamically controllable polarization laser employing chiral metamaterials.</i>
11:30 – 12:00	Guillermo Acuna , University of Fribourg, <i>DNA nanotechnology for nanophotonics.</i>
12:00	Lunch
All afternoon long	Cultural Event with Dinner

Thursday, June 20

08:30 – 09:00	Nikolay Zheludev , University of Southampton, <i>Nonreciprocal forces, ergodicity, and entropy of photonic metamaterial time crystals.</i>
09:00 – 09:30	Antonio Ambrosio , Istituto Italiano di Tecnologia, <i>Near-field spectroscopy of polaritons in 2D materials.</i>
09:30 – 10:00	Giuseppe Strangi , Università della Calabria, <i>Fano Resonance Optical Coatings.</i>
10:00 – 10:30	Coffee Break
10:30 – 11:00	Gennady Shvets , Cornell University, <i>Inverted reflection-mode chemical imaging of live cells using bio-photonic metasurfaces.</i>
11:00 – 11:30	Francesco De Angelis , Istituto Italiano di Tecnologia, <i>Ultrafast Raman sensing of small molecules by plasmonic nanopores.</i>
11:30 – 12:00	Duncan Sutherland , iNANO, Aarhus University, <i>Multivalency Studied at the Single Molecule Level via Plasmon Enhanced Fluorescence.</i>
12:00 – 16:00	Lunch
16:00 – 16:30	Harry Atwater , California Institute of Technology, TBA, <i>Active Metasurfaces in Space and Time.</i>
16:30 – 17:00	Jacob Khurgin , Johns Hopkins University, <i>Nonlinear index beyond the perturbative limit: far less than meets the eye.</i>
17:00 – 17:30	Lucia Petti , Institute of Applied Sciences and Intelligent Systems - ISASI, CNR, <i>Fractal Plasmonic Molecules for Multi-Sensing: SERS platform for SARS-CoV-2 detection.</i>
17:30 – 18:00	Coffee Break and Posters Session

18:00 – 18:30	Javier García de Abajo , ICFO-Institut de Ciències Fotoniques, <i>Plasmonics in ultrathin metal films</i> .
18:30 – 19:00	Giulia Tagliabue , LNET - EPFL, <i>Unraveling Hot Carrier Processes for Advancing Plasmonic Energy Devices</i> .
19:00 – 19:30	Uriel Levy , HUJI, <i>Recent progress in active metasurfaces</i> .
19:30	Awards
20:15	Dinner

Friday, June 21: Capasso's Day

08:30 – 09:00	Federico Capasso , Harvard University, TBA.
09:00 – 09:30	Evelyn Hu , Harvard University, <i>Nano-Photonic Emitters for Quantum Applications: Mapping and Control of "Defect" Emitters</i> .
09:30 – 10:00	David Miller , Stanford University, <i>Finding and Counting Channels with Waves</i> .
10:00 – 10:30	Coffee Break
10:30 – 11:00	Michael Berry , University of Bristol, <i>Geometric phases old and new</i> .
11:00 – 11:30	Jerome Faist , ETH Zurich, TBA.
11:30 – 12:00	Carlo Sirtori , Laboratoire de Physique de l'Ecole normale supérieure, ENS, Université PSL, CNRS, Sorbonne Université, Université Paris Cité, <i>Coherent detection of the temporal trace emitted by frequency modulated comb lasers</i> .
12:00 – 16:00	Lunch
16:00 – 16:30	Eli Yablonovitch , UC Berkeley, Electrical Engineering, Computer Science, & Physics Depts, <i>Onsager does Optimization (for Free); Progress in Physics-Based Optimization Circuits</i> .
16:30 – 17:00	Miriam S. Vitiello , NEST, National Research Council CNR-NANO and Scuola Normale Superiore, <i>Compact terahertz harmonic generation in the Reststrahlenband in nanophotonic graphene resonators and quantum cascade lasers comprising a graphene plasmonic grating</i> .
17:00 – 17:30	Nader Engheta , University of Pennsylvania, <i>4D Optics</i> .
17:30 – 20:15	Closing Ceremony and Drink
20:15	Gala Dinner