UPLAMP 2024 Summer School on Ultra-short Pulse Lasers Applications in Material Processing

Students Oral Presentations Programme

	July 1	**July 2**	**July 3**	**July 4**
Time:	**Session 1**	**Session 3**	**Session 5**	**Session 6**
12:30	***Yuan Xu*** Multiscale Computational Study of Surface Modification by Nonlinear Laser-Induced Surface Acoustic Waves	***Srivathsa Venkatesh*** Thin Film Deposition and patterning	***Jia-Fan Kuo*** High-quality structures on 4H-SiC fabricated by femtosecond laser	***Shang Yu Hsu*** Introduction of Ultrafast Laser Technology Research and Innovation Center in ITRI
12:42	***Chaobo Chen*** Atomistic Modeling of Pulsed Laser Ablation in Liquid	***Dainius Balkauskas*** Electrodes formation by laser induced copper deposition on glass for innovative smart windows	***Patrick Hildebrand*** Improving 2PP printing freedom with 3D beam shaping and intensity accumulation	***Ching Chan Chen*** Ultrafast Laser Material Modification Process Application at ITRI
12:54	***Luis Omeñaca*** Optimizing Ultrafast Laser Ablation: Experimental analysis and two-temperature model enhancement with multi-pulse and incubation considerations	***Šarūnas Mickus*** Investigation of the Formation of Electrically Conductive Zones on Dielectric Surfaces by Laser-Induced Metallization and Graphene Formation	***Soheil Alee Mazreshadi*** Optimizing Laser Parameters for Robust Bonding in Multiphoton Polymerization: A Parametric Study	***Jyun-Jhih Wang*** Applications of Ultra-Fast Laser Micro-Processing
13:06	***Evaldas Kažukauskas*** Exploring the dynamic surface roughness evolution of fused silica under multilayer ablation conditions using femtosecond laser pulses	***Justina Žemgulytė*** Effects of Different Manufacturing Techniques on the Performance of Planar Antennas	***Jaime Cuartero*** Beam parallelization for increased productivity Two-Photon Polymerization by means of Spatial Light Modulators	***Yongting Yang*** Ultrashort pulsed laser robot system: A step forward towards flexible and 3D laser micromachining
13:18	***Vishnu Prakash Karunakaran*** Femtosecond Laser Micromachining for Quantum Photonics Devices	***Mohamed Ahmed Baba*** Micromachining of solid oxide fuel cell	***Darija Astrauskytė*** Reducing reflection losses in multi-level micro-optics made by femtosecond laser direct writing	***Dominik Mücke*** Towards Automated Hybrid Laser Processing of Fused Silica

	Session 2	Session 4		Session 7
15:30	***Kernius Vilkevičius*** The periodic plasmonic nanostructures with tunable morphology produced using femtosecond pulses	***Dirk Obergfell*** Investigation of the Influence of Pulse Width and Different Burst Modes on Ablation Characteristics of different types of stainless steel		***Alireza Shahidi*** Enhanced Production of Gold Nanoparticles via Ultrasonic Cavitation and Ultrashort Pulse Laser Irradiation
15:42	***Rodrigas Liudvinavičius*** Plasmonic microbumb grating resilience to the immersion into liquids for practical applications	***Natalia Grudzień*** Increasing the removal rate of metals with femtosecond fiber laser		***Vita Petrikaitė*** Generation of bimetallic nanoparticles from thin gold and silver films on glass substrate and use for SERS enhancement
15:54	***Eulàlia Puig Vilardell*** 3D Photonic Crystal for Rainbow Trapping Fabricated via Two-Photon Lithography	***Robin Klöpfer*** Influence of heat accumulation on the melt film thickness and surface structure occurrence during laser percussion drilling		***Gazy Khatmi Rodowan Albedry*** Lateral Flow Assay Sensitivity and Signal Enhancement via Laser µ-Machined Constrains in Nitrocellulose Membrane
16:06	***Indrė Meškėlaitė*** Pathway towards femtosecond direct laser writing of waveguides in transparent media for optical neural networks	***Fabian Ränke*** High-speed laser surface texturing by combining direct laser interference patterning with polygon scanner technology		***Artur Harnik*** YAG:Ln for laser 3D lithography: precursor synthesis and study
16:18	***Edvinas Aleksandravičius*** Suppression of filamentation by photonic crystals	***Rimantas Naina*** Selective laser etching of fused silica using low numerical aperture focusing objective		***Jaroslaw Jacak*** 3D multiphoton -lithography of protein-based scaffolds for stem cell studies