

EOO2025: SPIE BEST STUDENT PAPER AWARDS

Conf. 13523: Metamaterials XV

13523-9

Spin-decoupled metasurfaces for the generation of self-accelerating vector beams

Andrea Vogliardi, Univ. degli Studi di Padova (Italy)

Conf. 13525: Photon Counting and Quantum Optics 2025

13525-8

Space qualified four channel Si SPAD detector

Matěj Stavinoha, Czech Technical Univ. in Prague (Czech Republic)

Conf. 13526: Real-time Processing of Image, Depth and Video Information 2025

13526-16

Hybrid deep learning with optical 4f correlator: simulation and performance analysis

Maryam Dehbashizadeh Chehreghan, Ripalta Stabile, Technische Univ. Eindhoven (Netherlands)

Conf. 13527: Optical Sensors 2025

13527-25

Infrared sensing based on Tamm plasmon resonance for hydrogen detection

Miguel Almeida, Univ. do Porto (Portugal)

AND

13527-55

Speech enhancement in FBG-based throat microphones: a tailored long short-term memory recurrent neural network approach

Rituparna Jana, Indian Institute of Technology Gandhinagar (India)

Conf. 13528: Smart Materials for Opto-Electronic Applications 2025

13528-27

Innovative flexible gold nanoparticle SERS platform fabricated by a self assembly and rapid approach Amalia D'Avino Univ. of Naples "Parthenope", Italy Institute of Applied Sciences and Intelligent Systems "Eduardo Caianiello", Italian national research council-CNR (Italy)

Conf. 13529: Holography: Advances and Modern Trends IX

13529-3

Single-shot characterization of microlenses using digital holographic microscopy

Maria Josef Lopera Acosta, Vrije Univ. Brussel (Belgium) and Univ. EAFIT (Colombia).



AND

13529-10

Photopolymerization shrinkage in holographic hybrid sol-gel material Jamshed Aftab, Technological Univ. Dublin (Ireland)

Conf 13530: Integrated Optics: Design, Devices, Systems, and Applications VIII 13530-41

Space radiation effects on photonic integrated circuits for optical satellite payloads
Giulio Terrasanta, Deutsches Zentrum für Luft- und Raumfahrt e.V. (Germany) and Technische Univ.
München (Germany)

Conf. 13532: High-power, High-energy Lasers and Ultrafast Optical Technologies II 13532-45

Measurement of fluorescence lifetime in thulium doped laser active media: minimizing reabsorption effects with the confocal method

Tereza Nováková, Czech Technical Univ. in Prague (Czech Republic)

Conf 13534: Laser Acceleration of Electrons, Protons, and Ions VIII 13534-10
Electron acceleration in a wakefield generated by structured light

Aaron Liberman, Weizmann Institute of Science (Israel)

EOO2025: BEST PAPER AWARD (SPONSORED)

REAL-TIME PROCESSING OF IMAGE, DEPTH AND VIDEO INFORMATION CONFERENCE (13526):

Sponsored by: The Imaging Source Europe GmbH



13526-4

Beyond von Neumann: fundamental limitations of current compute architectures for real-time image processing

Sergio R. Goma, Alkemista Group (United States)