

Photonic Device Workshop 2025 Technical Program (Poster)

ポスターセッション (6階 6D-1~3) Poster Session (6F 6D-1~3)		
16:30-17:30 Session A (Odd numbers)		
17:30-18:30 Session B (Even numbers)		
【英語/English】		
P-1	Simulation of optical neural network using all-optical phase shifter and nonlinearity of MZI	Shinya Tagawa (Institute of Science Tokyo)
P-2	Development of μ -TP Process for Magneto-Optical Crystals Using an MgO Sacrificial Layer	Kento Hiura (Institute of Science Tokyo)
P-3	Design of Dielectric Metasurface-based Hybrid Optical Neural Networks for Image Generation	Deyu Cao (The University of Tokyo)
P-4	Low-Scattering and maintaining single mode transmission of Green-light Wide SiN Waveguides with Adiabatic Tapers at Bending	Peng Zijian (Institute of Science Tokyo)
P-5	High-Q Raman Silicon Nanocavity Laser with S-Band-to-L-Band Wavelength Conversion	Rikuto Ichinose (Osaka Metropolitan University)
P-6	Spectral analysis of light-molecule coupling based on quantum chemical calculations and deep learning	Koki Yoshida (Yokohama National University)
P-7	Ultra-High-Q Asymmetric Photonic Heterostructure Nanocavity Design	Yuta Kanemaru (Osaka Metropolitan University)
P-8	Fiber-Coupled Raman Silicon Laser Module Using Photonic Crystal Nanocavities	Shoei Yamasaki (Osaka Metropolitan University)
P-9	Plasmonic Properties of High-Entropy Alloy Metasurfaces	Yuya Hoshimiya (Yokohama National University)
P-10	Design of 1-um-band InGaAs/GaAs membrane lasers for light sources in high temperature environment near xPU	Shun Ito (Institute of Science Tokyo)
P-11	Investigation of Radiation-induced Q-factor Degradation in High-Q Silicon Nanocavities	Ayumi Ishihara (Osaka Metropolitan University)
P-12	Error-Free Transmission Using a Thermally Stabilized High-Q Silicon Micro-Ring Modulator	Atsuro Shirasaki (Keio University)
P-13	Design of multi-mode interferometer based electric field absorption optical modulator using deep-learning-assisted local search	Rikuto Nagaya (Yokohama National University)
P-14	Optimization in electron beam lithography for three-dimensional semiconductor photonic crystals	Hikaru Murata (Kyoto Institute of Technology)
P-15	Transient Analysis of Photonic-Crystal Surface-Emitting Lasers with External Reflectors	Shota Koga (Kyoto University)
P-16	Comparative analysis of free-space optical receiver using MMF with mode-splitting coupler	Mengyuan Jiang (The University of Tokyo)
P-17	Fabrication of PCSELS with in-plane distribution of non-Hermitian coupling coefficient for implementation of non-radiative region below surface electrode	Kotaro Okuda (Kyoto University)
P-18	Investigation of the Impact of Signal Encoding Schemes on Time-Multiplexed Optical Computing Systems	Junnosuke Kokubu (Keio University)
P-19	Photonic Crystal-Based Quantum Cascade Detector: Optical Response Characteristics	Tomoki Tsukada (Toshiba)
P-20	Lattice strain in Si-capped Ge strip structure on Si	Soki Matsushita (Toyohashi University of Technology)
P-21	Programmable Large-Scale Multi-Port Interference-Based Optical Neural Network Chip for Simple Classification Applications	Yushan Hu (Kanazawa University)
P-22	Evaluation of topological hinge states in a near-infrared regime	Shintaro Kawabata (Kyoto Institute of Technology)
P-23	Micro-Photoluminescence Mapping Evaluation of Metamorphic InGaAs/GaAsSb Type-II Quantum Wells	Rikuto Takashima (University of Miyazaki)
P-24	Fabrication and Characterization of Laser Power Converter using InGaAs/GaAsSb Tunnel Junctions	Takeru Yamada (University of Miyazaki)
P-25	Electrical characterization of electrically injected CirD cavities with top-surface optical access for verification	Fuma Hayashi (The University of Osaka)
P-26	Highly Sensitive Optical Hydrogen Gas Sensor Based on Pt-SiO ₂ Microring Resonator with Al ₂ O ₃ Upper Cladding Layer	Hiroaki Tasaki (Yokohama National University)
P-27	Fabrication of a Horizontal Slot Waveguide DBR Resonator Using a Hollow Slot cascade Connection Structure	Hisashi Tatsuno (Kanagawa Institute of Technology)
P-28	Design of Large-Aperture Metalens for Use in the Visible Wavelength	Reo Kondo (Yokohama National University)
P-29	Fabrication of Nb ₂ O ₅ microring resonators using SiO ₂ cladding by CSD method	Yuki Shimamura (Kanagawa Institute of Technology)
P-30	Theoretical wavelength characteristics of series coupled disk resonators for TE-mode isolators	Haruto Hori (Kanagawa Institute of Technology)
P-31	An experimental study of tapered MMI couplers for MZI-type optical switches	Kansho Sato (Kanagawa Institute of Technology)
P-32	Design of antenna-integrated quantum well optical modulator for 100 GHz millimeter-wave band	Yuto Yamada (Yokohama National University)
P-33	Study of Broad Area Vibrational Strong Coupling of Water Molecules Using Two-Dimensional Photonic Crystal	Ryogo Okayama (Tohoku University)
P-34	A study of tunable phase-shifter length in Si race-track micro-ring resonators using ferro-electric liquid crystal for improvement of characteristics	Makoto Taniguchi (Kanagawa Institute of Technology)
P-35	Wavelength characteristics in FLC-loaded asymmetric MZI using tapered MMI couplers	Motoya Okazaki (Kanagawa Institute of Technology)
P-36	A fundamental study of couplers for ring resonators based on slot waveguides	Kenta Suzuki (Kanagawa Institute of Technology)
P-37	Experimental Demonstration of Directional Output Control in Circular Defect in 2D Photonic Crystal (CirD) Lasers via Sub-cavity Coupling	Yuto Kudo (The University of Osaka)
P-38	Current Injection Distribution Control of Large-Area GaN-based PCSELS	Masahiro Jutori (Kyoto University)
P-39	Analysis of non-reciprocity in a temporally modulated coupled-cavity system using the FDTD method	Masahiro Horibe (Kyoto University)
P-40	Mutual Injection locking of Terahertz Resonant Tunneling Diodes Coupled Through Photonic Crystal Waveguide	Yuki Morita (The University of Osaka)
P-41	Design of Higher-Order Series-Coupled Microring Wavelength Filters Using Success-History Based Parameter Adaptation for Differential Evolution	Haruto Naganuma (Yokohama National University)
P-42	Design of silicon-organic-hybrid metasurface modulator with Au nanowire	Mamoru Tanabe (The University of Tokyo)