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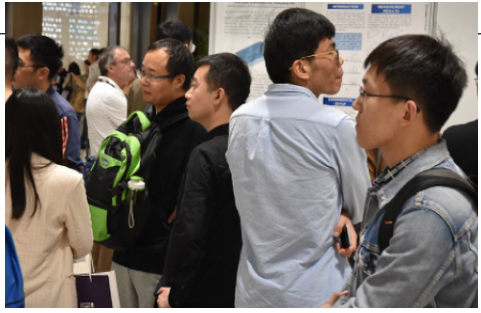
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(China)

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Advanced Lasers, High-Power Lasers, and Applications XIV (PA101)

Conference Chairs: **Jun Liu**, Shanghai Institute of Optics and Fine Mechanics, Chinese Academy of Sciences (China); **Shibin Jiang**, AdValue Photonics, Inc. (United States); **Ingmart Hartl**, Deutsches Elektronen-Synchrotron (Germany)

Program Committee: **Willy L. Bohn**, BohnLaser Consult (Germany); **Guoqing Chang**, Institute of Physics, Chinese Academy of Sciences (China); **Dianyuan Fan**, Shanghai Institute of Optics and Fine Mechanics, Chinese Academy of Sciences (China); **Mali Gong**, Tsinghua Univ. (China); **Minglie Hu**, Tianjin Univ. (China); **Do-Kyeong Ko**, Gwangju Institute of Science and Technology (Republic of Korea); **Ruxin Li**, Shanghai Institute of Optics and Fine Mechanics, Chinese Academy of Sciences (China); **Zhaoyang Li**, Zhangjiang Lab. (China); **Chong Liu**, Zhejiang Univ. (China); **Zejin Liu**, National Univ. of Defense Technology (China); **Deyuan Shen**, Fudan Univ. (China); **Upendra N. Singh**, NASA Langley Research Ctr. (United States); **Fengqiu Wang**, Nanjing Univ. (China); **Shuangchun Wen**, Shenzhen Univ. (China); **Zuyan Xu**, Technical Institute of Physics and Chemistry, Chinese Academy of Sciences (China); **Jianquan Yao**, Tianjin Univ. (China); **Tai Hyun Yoon**, Korea Univ. (Republic of Korea); **Jirong Yu**, NASA Langley Research Ctr. (United States); **Heping Zeng**, East China Normal Univ. (China); **Xiaomin Zhang**, China Academy of Engineering Physics (China); **Pu Zhou**, National Univ. of Defense Technology (China); **Shou-huan Zhou**, Sichuan Univ. (China)

Papers on the following and related topics are solicited for this conference:

- design of innovative lasers
- demonstration of innovative lasers
- advanced solid-state free-space lasers
- advanced fiber lasers
- high-average-power laser
- ultra-short and super-intense lasers
- high-power DPL and ceramic lasers
- high-power fiber laser
- high-power gas, excimer, and chemical laser
- laser system for ICF
- high-power laser beam propagation and beam quality
- design and simulation for high-power laser
- lasers development and qualification for space applications
- new gain materials including crystals, glasses, semiconductors, and fibers
- pump diodes and reliability
- applications of lasers for space-based sensing and detections
- applications of high peak power lasers
- applications of high pulse energy lasers
- applications of high average power lasers
- new applications of advanced lasers
- needs of lasers for specific new applications.

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Semiconductor Lasers and Applications XIII

(PA102)

Conference Chairs: **Wei Li**, Institute of Semiconductors, Chinese Academy of Sciences (China); **Werner H. Hofmann**, Deutsches Patent- und Markenamt (Germany); **Ting Wang**, Institute of Physics, Chinese Academy of Sciences (China)

Program Committee: **Minghua Chen**, Tsinghua Univ. (China); **Xiangfei Chen**, Nanjing Univ. (China); **Nan Chi**, Fudan Univ. (China); **Brian Corbett**, Tyndall National Institute (Ireland); **Dawei Di**, Zhejiang Univ. (China); **Qianggao Hu**, Accelink Technologies Co., Ltd. (China); **Weisheng Hu**, Shanghai Jiao Tong Univ. (China); **Ming Li**, Institute of Semiconductors, Chinese Academy of Sciences (China); **Xianjie Li**, China Electronics Technology Group Corp. (China); **Yong Liu**, Univ. of Electronic Science and Technology of China (China); **Xiaoyu Ma**, Institute of Optics and Electronics, Chinese Academy of Sciences (China); **Frank H. Peters**, Tyndall National Institute (Ireland); **Edwin Y. Pun**, City Univ. of Hong Kong (Hong Kong, China); **Yikai Su**, Shanghai Jiao Tong Univ. (China); **Hong-Bo Sun**, Tsinghua Univ. (China); **Lijun Wang**, Changchun Univ. of Science and Technology (China); **Yixin Wang**, Institute for Infocomm Research (Singapore); **Guang-Qiong Xia**, Southwest Univ. (China); **Kun Xu**, Beijing Univ. of Posts and Telecommunications (China); **Lianshan Yan**, Southwest Jiaotong Univ. (China); **Jinlong Yu**, Tianjin Univ. (China); **Siyuan Yu**, Univ. of Bristol (United Kingdom); **Li Zeng**, Huawei Technologies Co., Ltd. (China); **Baoping Zhang**, Xiamen Univ. (China); **Guo-yi Zhang**, Peking Univ. (China); **Shangjian Zhang**, Univ. of Electronic Science and Technology of China (China); **Xinliang Zhang**, Wuhan National Research Ctr. for Optoelectronics (China); **Zhiping Zhou**, Peking Univ. (China); **Ning Hua Zhu**, Institute of Semiconductors, Chinese Academy of Sciences (China); **Sha Zhu**, Beijing Univ. of Technology (China); **Xihua Zou**, Southwest Jiaotong Univ. (China)

Recent advances in semiconductor lasers are resulting in improvements in power, spatial brightness, modulation bandwidth, linewidth, and wavelength ranges from the UV to the mid-IR. These advances led to better performance and opened the door for photonic integration, new laser applications including materials processing, metrology, printing, display, biomedical, imaging, Raman spectroscopy, and remote sensing. This conference intends to cover the following topics:

- integrated optoelectronic devices
- narrow linewidth lasers
- frequency-stabilized lasers
- high-speed lasers
- optical frequency combs
- fabrication and packaging technologies
- vertical-cavity surface-emitting laser (VCSEL) sources and their applications
- modeling and design
- characterization technologies for laser diodes
- high-brightness laser diodes
- quantum cascade lasers
- photonic integrated circuits
- blue-green laser technologies
- novel lasers and devices
- applications of laser diodes
- microwave photonics link.

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Advanced Laser Processing and Manufacturing VII (PA103)

Conference Chairs: **Rongshi Xiao**, Beijing Univ. of Technology (China); **Minghui Hong**, Xiamen Univ. (China); **Jianhua Yao**, Zhejiang Univ. of Technology (China); **Yuji Sano**, Institute for Molecular Science (Japan) and Osaka Univ. (Japan), Osaka Univ. (Japan)

Program Committee: **Liang Guo**, Southern Univ. of Science and Technology (China); **Anming Hu**, The Univ. of Tennessee Knoxville (United States); **Yongxiang Hu**, Shanghai Jiao Tong Univ. (China); **Ting Huang**, Beijing Univ. of Technology (China); **Hiroyuki Kokawa**, Tohoku Univ. (Japan); **Jian Liu**, PolarOnyx, Inc. (United States); **Tomokazu Sano**, Osaka Univ. (Japan); **Xiahui Tang**, Huazhong Univ. of Science and Technology (China); **Peng Wen**, Tsinghua Univ. (China); **Haibin Zhang**, MKS Instruments, Inc. (United States); **Wenwu Zhang**, Ningbo Institute of Materials Technology and Engineering (China); **Jianzhong Zhou**, Jiangsu Univ. (China)

Laser processing and manufacturing has become one of the most convenient and enabling technologies for manufacturing with a reduced carbon footprint and are applicable to related industries such as automobile, railway, shipbuilding, aerospace, microelectronics, photonics, biomedical and energy. It offers unprecedented versatility and range in terms of feature size, material, phase, and processing option. During the last decade, there have been significant advances on laser processing and manufacturing research and development including laser additive manufacturing, laser welding, laser drilling, laser cutting, laser peening, laser cleaning, laser surface texturing, and laser nanofabrication. The primary goal of this conference is to provide a platform for professionals to share and discuss the latest advances in laser processing and manufacturing. The solicited exemplary topics include, but are not limited to:

- laser welding and joining
- laser cladding and remanufacturing
- laser additive manufacturing and 3D printing
- laser cutting and drilling
- laser peening, forming, polishing, cleaning, and texturing
- laser re-melting and alloying
- laser micro and nano fabrication
- pico- / femto-second laser processing
- laser-based hybrid/combined processing and manufacturing
- novel industry lasers and optical technologies
- upgrading and improvement of laser devices
- novel techniques for key elements in optical systems such as laser sources
- novel elements and components in laser processing and manufacturing systems such as diffractive optical elements and multi-axis scan heads
- industrial applications of laser processing and manufacturing technologies
- applications of machine learning, AI (artificial intelligence), and DX (digital transformation) in laser processing and manufacturing.

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Photonics for Energy III (PA104)

Conference Chairs: **Haizheng Zhong**, Beijing Institute of Technology (China); **Rui Zhu**, Peking Univ. (China); **Samuel D. Stranks**, Univ. of Cambridge (United Kingdom); **Jianpu Wang**, Nanjing Univ. of Technology (China)

Program Committee: **Tae-Woo Lee**, Seoul National Univ. (Republic of Korea); **Qihua Xiong**, Tsinghua Univ. (China); **Yabing Qi**, Okinawa Institute of Science and Technology Graduate Univ. (Japan); **Anita Ho-Baillie**, The Univ. of Sydney (Australia); **Osman M. Bakr**, King Abdullah Univ. of Science and Technology (Saudi Arabia); **Sheng Xu**, Univ. of California, San Diego (United States); **Feng Gao**, Linköping Univ. (Sweden); **Jia Zhu**, Nanjing Univ. (China); **Michael Saliba**, Univ. Stuttgart (Germany), Forschungszentrum Jülich (Germany); **Wolfgang R. Tress**, Zurich Univ. of Applied Sciences (Switzerland); **Yuan Yang**, Columbia Univ. (United States); **Haizheng Zhong**, Beijing Institute of Technology (China); **Wei Zhang**, Univ. of Surrey (United Kingdom); **Feng Liu**, Shanghai Jiao Tong Univ. (China); **Hin-Lap Yip**, City Univ. of Hong Kong (Hong Kong, China); **Jingshan Luo**, Nankai Univ. (China); **Zhi-Kuang Tan**, National Univ. of Singapore (Singapore); **Guichuan Xing**, Univ. of Macau (Macao, China)

This conference on Photonics for Energy covers fundamental and applied research areas focused on the applications of photonics for renewable energy harvesting, conversion, storage, distribution, monitoring, consumption, and efficient usage, etc. Energy utilization and optoelectronic conversion play important roles in daily life and modern society, and have also become hot research topics. This conference will provide a remarkable opportunity for scientists to present their recent progresses on photonics for energy. The solicited exemplary topics include, but are not limited to:

- novel photonic materials for renewable energy
- innovative photonic concepts for renewable energy
- photovoltaic devices (including thin film and organic semiconductors)
- photonic devices for efficient harvesting and conversion of solar energy
- solar thermal and concentrator technology
- energy-efficient photonic devices (e.g., solid-state lighting, flat-panel displays)
- sensors to measure, control, and regulate energy
- photonic technologies for monitoring energy usage
- photonic technologies for monitoring exhaust gases and pollutants
- measurement techniques for energy technologies
- photonics in process control (e.g., for greater energy efficiency)
- photonics in production of renewable energy devices and applications
- photonic sensors in power plants and buildings
- photonics in buildings (e.g., sensing, integrated photovoltaics).

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Optoelectronic Devices and Integration XII

(PA105)

Conference Chairs: **Xuping Zhang**, Nanjing Univ. (China); **Baojun Li**, Jinan Univ. (China); **Changyuan Yu**, The Hong Kong Polytechnic Univ. (Hong Kong, China); **Xinliang Zhang**, Wuhan National Research Ctr. for Optoelectronics (China)

Program Committee: **Dayan Ban**, Univ. of Waterloo (Canada); **Zhongping Chen**, Beckman Laser Institute and Medical Clinic (United States); **Daoxin Dai**, Zhejiang Univ. (China); **Ho-Pui Ho**, The Chinese Univ. of Hong Kong (Hong Kong, China); **Jan Ingenhoff**, Ionexphotonics, Inc. (Canada); **Zhongcheng Liang**, Nanjing Univ. of Posts and Telecommunications (China); **Xuejun Lu**, Univ. of Massachusetts Lowell (United States); **Ali Masoudi**, Univ. of Southampton (United Kingdom); **Hai Ming**, Univ. of Science and Technology of China (China); **Gang-Ding Peng**, The Univ. of New South Wales (Australia); **Yaocheng Shi**, Zhejiang Univ. (China); **Yuan Shi**, Allwave Lasers Devices Inc. (United States); **Anna K. Swan**, Boston Univ. (United States); **Frank Vollmer**, Univ. of Exeter (United Kingdom); **Daniel M. Wasserman**, The Univ. of Texas at Austin (United States); **Lixin Xu**, Univ. of Science and Technology of China (China); **Yang Yang**, Zhejiang Univ. of Technology (China); **Yu Yu**, Huazhong Univ. of Science and Technology (China); **Ningmu Zou**, Advanced Micro Devices, Inc. (United States)

Optoelectronic devices are being used in a wide array of applications in telecommunications, solar cells, scientific instrumentation, data storage, automotive, and military applications. Photonic design and simulation methods are a prerequisite for a fundamental understanding of advanced photonic structures as well as for the development of new photonic devices and applications. Research on new materials, processes and design are giving rise to optoelectronic devices with higher efficiencies, denser integration, and better reliabilities. With the new breakthroughs in organic photonic devices, vertical-cavity surface-emitting lasers, semiconductor photodetectors and optoelectronic integrated circuits, new package designs and reliability methodologies must be developed as these devices increase in functionality and integration.

This conference is intended to provide a forum for the interchange of ideas on optoelectronic device at different levels, including design, simulation, fabrication, integration, and applications. The topics of this conference are broad and will cover, but not limited to, the following topics:

- physics and simulation of optoelectronic devices
- devices for photonic applications
- fiber and guided-wave lasers and amplifiers
- organic photonic materials and devices
- terahertz and gigahertz electronics and photonics
- synthesis and photonics of nanoscale materials
- emerging optoelectronic applications
- vertical-cavity surface-emitting lasers
- polarization maintained/scrambled laser
- semiconductor photodetectors
- reliability of optical fiber components, devices, systems, and networks
- micro-optics and photonic interconnects
- multifunctional components, and arrayed devices
- optoelectronic hybrid and monolithic integration
- integrated optics and photonic integrated circuits
- photonics packaging and integration
- surface plasmon nanolithography, plasmonic waveguide and devices.

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Optical Design and Testing XIII (PA106)

Conference Chairs: **Yongtian Wang**, Beijing Institute of Technology (China); **Tina E. Kidger**, Kidger Optics Associates (United Kingdom); **Rengmao Wu**, Zhejiang Univ. (China)

Program Committee: **Yasuhiro Awatsuji**, Kyoto Institute of Technology (Japan); **Jian Bai**, Zhejiang Univ. (China); **Dewen Cheng**, Beijing Institute of Technology (China); **Chunlei Du**, Chongqing Institute of Green and Intelligent Technology, Chinese Academy of Sciences (China); **Fabian Duerr**, Vrije Univ. Brussel (Belgium); **Yi Chin Fang**, National Kaohsiung Univ. of Science and Technology (Taiwan); **Zexin Feng**, Beijing Institute of Technology (China); **Zhishan Gao**, Nanjing Univ. of Science and Technology (China); **Sen Han**, Suzhou Graduate School of Nanjing Univ. (China); **Andrew R. Harvey**, Univ. of Glasgow (United Kingdom); **Chulmin Joo**, Yonsei Univ. (Republic of Korea); **Ki-Nam Joo**, Chosun Univ. (Republic of Korea); **Jaejoong Kwon**, SAMSUNG Display Co., Ltd. (Republic of Korea); **Yun-Woo Lee**, Korea Research Institute of Standards and Science (Republic of Korea); **Donglin Ma**, Huazhong Univ. of Science and Technology (China); **Youri Meuret**, KU Leuven (Belgium); **Julius A. Muschaweck**, JMO GmbH (Germany); **Takanori Nomura**, Wakayama Univ. (Japan); **Tomoyoshi Shimobaba**, Chiba Univ. (Japan); **Jan M. ten Thije Boonkkamp**, Technische Univ. Eindhoven (Netherlands); **Sandy To**, The Hong Kong Polytechnic Univ. (Hong Kong, China); **Chunyu Zhao**, Arizona Optical Metrology LLC (United States); **Jun Zhu**, Tsinghua Univ. (China)

We encourage you to submit abstracts and papers on the following and related topics:

- aberration theory and image analysis
- aspheric fabrication and metrology
- astronomical optics
- asymmetric optics
- biomedical optics
- computational optics
- conformal optics
- development in local and global optimization methods
- diffractive optics
- freeform optics: design, fabrication, and testing
- gradient index optics
- illumination optics
- information optics and photonics
- interferometry
- light-field display and imaging
- liquid optics
- lithographic optics
- metasurface optics
- micro- and nano-optics
- new fabrication developments
- novel devices based on subwavelength structures
- novel display systems
- novel lens designs
- optical instrument design
- optical systems for visualization, virtual and augmented reality
- plastic and molded optics
- polarization and coherence in optical design
- spaceborne optics
- stray light analysis
- testing and alignment of optical surfaces and elements
- tolerance generation and application
- UV optics
- varifocal/multifocal optics
- wavefront modulation
- waveguide optics
- zoom optics and multi-configuration optics.

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Advanced Optical Imaging Technologies VI

(PA107)

Conference Chairs: **Xiao-Cong Yuan**, Shenzhen Univ. (China); **P. Scott Carney**, The Institute of Optics, Univ. of Rochester (United States); **Kebin Shi**, Peking Univ. (China)

Program Committee: **Benfeng Bai**, Tsinghua Univ. (China); **David J. Brady**, Wyant College of Optical Sciences (United States); **Liangyi Chen**, Peking Univ. (China); **Xiang Hao**, Zhejiang Univ. (China); **Yoshio Hayasaki**, Utsunomiya Univ. Ctr. for Optical Research & Education (Japan); **Minghui Hong**, Xiamen Univ. (China); **Zhenli Huang**, Wuhan National Lab. for Optoelectronics (China); **Wei Ji**, Institute of Biophysics, Chinese Academy of Sciences (China); **Dayong Jin**, Univ. of Technology, Sydney (Australia); **Cuifang Kuang**, Zhejiang Univ. (China); **Malgorzata Kujawińska**, Warsaw Univ. of Technology (Poland); **Puxiang Lai**, The Hong Kong Polytechnic Univ. (Hong Kong, China); **ByoungHo Lee**, Seoul National Univ. (Republic of Korea); **Xu Liu**, Zhejiang Univ. (China); **Changjun Min**, Shenzhen Univ. (China); **Wolfgang Osten**, Institut für Technische Optik (Germany); **Michelle Y. Sander**, Boston Univ. (United States); **Guohai Situ**, Shanghai Institute of Optics and Fine Mechanics, Chinese Academy of Sciences (China); **Michael G. Somekh**, Shenzhen Univ. (China); **Wei Song**, Shenzhen Univ. (China); **Peter Török**, Nanyang Technological Univ. (Singapore); **Lidai Wang**, City Univ. of Hong Kong (Hong Kong, China); **Changfeng Wu**, Southern Univ. of Science and Technology (China); **Pingyong Xu**, Institute of Biophysics, Chinese Academy of Sciences (China); **Baoli Yao**, Xi'an Institute of Optics and Precision Mechanics of CAS (China); **Shian Zhang**, East China Normal Univ. (China); **Chao Zuo**, Nanjing Univ. of Science and Technology (China)

Through non-invasive interaction between light and matter, optical imaging has become one of the most favorable and critical research tools for scientific community where a variety of topics ranging from fundamental biomedical/material science to advanced imaging applications are developed. Recent advances on more diverse imaging contrast mechanisms as well as higher spatio-temporal resolution has made advanced optical imaging technologies and their applications one of the most attractive scientific fields. This conference will provide a remarkable opportunity for scientists to present their recent progresses on exploring novel optical imaging techniques and their applications. The solicited exemplary topics include, but are not limited to:

- high-resolution fluorescence and label-free imaging technologies
- nonlinear optical imaging technologies
- holographic imaging, tomographic diffractive microscopy
- near-field and plasmonics-based imaging technologies
- photo-acoustic microscopy
- photothermal imaging techniques
- computational and compressive sensing imaging technologies
- time-resolved imaging technologies such as FLIM and transient-absorption microscopy
- imaging applications in biomedical and material sciences
- quantum imaging technologies
- novel techniques for key elements in optical imaging systems such as detection and laser sources
- novel imaging algorithms and protocols.

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Optoelectronic Imaging and Multimedia Technology X (PA108)

Conference Chairs: **Qionghai Dai**, Tsinghua Univ. (China); **Tsutomu Shimura**, The Univ. of Tokyo (Japan); **Zhenrong Zheng**, Zhejiang Univ. (China)

Program Committee: **Moshe Ben-Ezra**, MIT Media Lab. (United States); **Liheng Bian**, Beijing Institute of Technology (China); **Xudong Chen**, National Univ. of Singapore (Singapore); **Ya Cheng**, Shanghai Institute of Optics and Fine Mechanics, Chinese Academy of Sciences (China); **Jingtao Fan**, Tsinghua Univ. (China); **Jinwei Gu**, SenseTime Research (United States); **Yo-Sung Ho**, Gwangju Institute of Science and Technology (Republic of Korea); **Bormin Huang**, Univ. of Wisconsin-Madison (United States); **Ivo Ihrke**, Institut National de Recherche en Informatique et en Automatique (France); **Yoshiaki Kanamori**, Tohoku Univ. (Japan); **Chung-Chieh Kuo**, The Univ. of Southern California (United States); **Kyros N. Kutulakos**, Univ. of Toronto (Canada); **Wanqing Li**, Univ. of Wollongong (Australia); **Xing Lin**, Univ. of California, Los Angeles (United States); **Yuan Luo**, National Taiwan Univ. (Taiwan); **Evan Y. Peng**, The Univ. of Hong Kong (Hong Kong, China); **Imari Sato**, National Institute of Informatics (Japan), Tokyo Institute of Technology (Japan); **Yoichi Sato**, The Univ. of Tokyo (Japan); **Yoav Yosef Schechner**, Technion-Israel Institute of Technology (Israel); **John T. Sheridan**, Univ. College Dublin (Ireland); **Guangming Shi**, Xidian Univ. (China); **Guohai Situ**, Shanghai Institute of Optics and Fine Mechanics, Chinese Academy of Sciences (China); **Jinli Suo**, Tsinghua Univ. (China); **Lei Tian**, Boston Univ. (United States); **Gordon Wetzstein**, Stanford Univ. (United States); **Feng Wu**, Univ. of Science and Technology of China (China); **Bo Yang**, Univ. of Shanghai for Science and Technology (China); **Jingyi Yu**, ShanghaiTech Univ. (China); **Xiaolin Zhang**, Shanghai Institute of Microsystem and Information Technology (China)

The areas of optoelectronic systems for image/video acquisition and their applications have expanded rapidly in recent years. Advanced optoelectronic sensors, novel programmable optical modulators, combined with smart computational theories and algorithms, produce novel optoelectronics imaging systems that expand the spatial and temporal dimension for image/video acquisition. Multimedia and data acquired by these new optoelectronic systems impose new challenges in analysis and processing. This conference will provide an international forum for the publicashing of the state-of-the-art techniques of optoelectronic system and multimedia processing. Invited talks will be presented by leading scientists in the relevant fields. We are calling for papers in all relevant areas including, but not limited to, the following:

- advanced sensing systems and applications
- high-speed and high-resolution imaging
- multidimensional multiscale imaging
- multispectral and hyperspectral imaging
- high dynamic range imaging
- deep optics
- application of AI techniques in imaging systems
- computational imaging
- ghost imaging /single pixel imaging
- ultra-sonics, PET, MRI, X-ray imaging
- micro- and nano-optical imaging and its biomedical applications
- adaptive optics system
- 3D image/video system
- novel display techniques and applications
- tomographic imaging
- time-of-flight imaging
- scattering robust imaging
- optical information processing
- image/video analysis, processing, and retrieval
- machine vision methods, architectures, and applications
- advancement in shape-from-x method.

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Holography, Diffractive Optics, and Applications XIII (PA109)

Conference Chairs: **Changhe Zhou**, Jinan Univ. (China); **Ting-Chung Poon**, Virginia Polytechnic Institute and State Univ. (United States); **Liangcai Cao**, Tsinghua Univ. (China); **Hiroshi Yoshikawa**, Nihon Univ. (Japan)

Program Committee: **Partha P. Banerjee**, Univ. of Dayton (United States); **Chau-Jern Cheng**, National Taiwan Normal Univ. (Taiwan); **Gaoliang Dai**, Physikalisch-Technische Bundesanstalt (Germany); **Wei Gao**, Tohoku Univ. (Japan); **Min Gu**, Univ. of Shanghai for Science and Technology (China); **Yoshio Hayasaki**, Utsunomiya Univ. Ctr. for Optical Research & Education (Japan); **Hoonjong Kang**, Wonkwang Univ. (Republic of Korea); **Taegeun Kim**, Sejong Univ. (Republic of Korea); **Ai Gun Liu**, Nanyang Technological Univ. (Singapore); **Jung-Ping Liu**, Feng Chia Univ. (Taiwan); **Ignacio Moreno Soriano**, Univ. Miguel Hernández (Spain); **Pascal Picart**, Lab. d'Acoustique de l'Univ. du Maine (France); **Xinzhu Sang**, Beijing Univ. of Posts and Telecommunications (China); **Yunlong Sheng**, Univ. Laval (Canada); **Tatsuki Tahara**, National Institute of Information and Communications Technology (Japan); **Xiaodi Tan**, Fujian Normal Univ. (China); **Vladimir Y. Venediktov**, Saint Petersburg Electrotechnical Univ. "LETI" (Russian Federation), Saint Petersburg State Univ. (Russian Federation); **Baoli Yao**, Xi'an Institute of Optics and Precision Mechanics of CAS (China); **Qiwen Zhan**, Univ. of Shanghai for Science and Technology (China); **Fucai Zhang**, Southern Univ. of Science and Technology (China); **Yan Zhang**, Capital Normal Univ. (China); **Yaping Zhang**, Kunming Univ. of Science and Technology (China); **Jianlin Zhao**, Northwestern Polytechnical Univ. (China); **Chao Zuo**, Nanjing Univ. of Science and Technology (China)

Papers are solicited on, but not limited to, the following topics.

- holography, diffractive, and micro-optics
- computer-generated holograms
- digital holography
- digital holographic microscopy, 3D holographic microscopy
- quantitative phase imaging
- subwavelength optics and plasmonics
- metasurface holography
- quantum holography
- dynamic holography, space light modulators
- digital holography in scattering media
- incoherent holography
- x-ray and terahertz wave digital holography
- polarization holography and polarization imaging
- artificial intelligence (AI) based imaging, display, and metrology
- machine-learning-based digital holography
- holographic imaging with deep-learning networks
- 3D imaging and 3D display
- 3D remote sensing
- full-field tomography
- compressive holography
- computational imaging
- super-resolution imaging
- adaptive imaging, feedback, or feedforward-controlled imaging
- documentation and product anti-counterfeiting
- optical metrology
- picometer-scale optics and metrology
- gratings technology
- holographic lithography
- 2D and 3D printing, lithography, fabrication, and machining
- high-dimensional optical recording, optical memory and storage
- volume holograms
- optical signal processing
- optical analog and digital computing
- optical neuron networks
- optics in quantum computers
- optics for life science applications
- optical holographic tweezers
- acousto-optics
- optics for metaverse.

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Optical Metrology and Inspection for Industrial Applications X (PA110)

Conference Chairs: **Sen Han**, Suzhou Graduate School of Nanjing Univ. (China), Suzhou H&L Instruments LLC (China); **Gerd Ehret**, Physikalisch-Technische Bundesanstalt (Germany); **Benyong Chen**, Zhejiang Sci-Tech Univ. (China)

Program Committee: **Masato Aketagawa**, Nagaoka Univ. of Technology (Japan); **Yasuhiko Arai**, Kansai Univ. (Japan); **Yasuhiro Awatsuji**, Kyoto Institute of Technology (Japan); **James H. Burge**, Arizona Optical Metrology LLC (United States); **Garrett D. Cole**, Thorlabs Crystalline Solutions (United States); **Junfei Dai**, Zhejiang Univ. (China); **Fabian Duerr**, Vrije Univ. Brussel (Belgium); **Yuegang Fu**, Changchun Univ. of Science and Technology (China); **Ming Jiang**, Suzhou Univ. of Science and Technology (China); **Lianhua Jin**, Univ. of Yamanashi (Japan); **Kazuhide Kamiya**, Toyama Prefectural Univ. (Japan); **Tina E. Kidger**, Kidger Optics Associates (United Kingdom); **Malgorzata Kujawska**, Warsaw Univ. of Technology (Poland); **Chao-Wen Liang**, National Central Univ. (Taiwan); **Yuxiang Lin**, ASML (United States); **Yasuhiro Mizutani**, Osaka Univ. (Japan); **Yukitoshi Otani**, Utsunomiya Univ. (Japan); **Giancarlo Pedrini**, Institut für Technische Optik (Germany); **Xiang Peng**, Shenzhen Univ. (China); **Qian Kemao**, Nanyang Technological Univ. (Singapore); **Jaejoong Kwon**, SAMSUNG Display Co., Ltd. (Republic of Korea); **Guohai Situ**, Shanghai Institute of Optics and Fine Mechanics, Chinese Academy of Sciences (China); **H. Philip Stahl**, NASA Marshall Space Flight Ctr. (United States); **John C. Stover**, The Scatter Works Inc. (United States); **Takamasa Suzuki**, Niigata Univ. (Japan); **Toshitaka Wakayama**, Saitama Medical Univ. (Japan); **Haoyu Wang**, Univ. of Shanghai for Science and Technology (China); **Xiangzhao Wang**, Shanghai Institute of Optics and Fine Mechanics, Chinese Academy of Sciences (China); **Yajun Wang**, Wuhan Univ. (China); **Quanying Wu**, Suzhou Univ. of Science and Technology (China); **Jiangtao Xi**, Univ. of Wollongong (Australia); **Jing Xu**, Tsinghua Univ. (China); **Lianxiang Yang**, Oakland Univ. (United States); **Dawei Zhang**, Univ. of Shanghai for Science and Technology (China); **Hao Zhang**, Tianjin Univ. (China); **Qican Zhang**, Sichuan Univ. (China); **Xiangchao Zhang**, Fudan Univ. (China); **Zonghua Zhang**, Hebei Univ. of Technology (China); **Ping Zhou**, ASML US, Inc. (United States); **Ping Zhong**, Donghua Univ. (China); **Weihu Zhou**, Institute of Microelectronics, Chinese Academy of Sciences (China); **Chao Zuo**, Nanjing Univ. of Science and Technology (China)

Papers on the following and related topics are solicited for this conference:

- absolute testing for metrology
- application of interferometric techniques in optical mask and LED industry
- large optics testing
- machine/robot vision methods, architectures, and applications
- surface inspection methods and applications
- flatness metrology
- dynamic measurement
- special optical systems for inspection and measurements
- 2D and 3D machine vision methods and applications
- stitching techniques
- 3D data manipulation
- detection of gravitational waves
- AR/VR optical testing
- aspherical and freeform testing
- super-high accurate measurement for smooth surfaces
- micro- and nano-scale measurement methods
- structured light methods and applications
- phase shifting methods applied to industrial inspection
- optical methods for dimensional and surface metrology
- mechanic-optics and photonics for metrology and inspection
- system calibration and error analysis
- spherical and cylindrical measurements
- online and process control measurements
- deflectometry or fringe projection measurement
- high-resolution and high-speed inspection applications.

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Optics in Health Care and Biomedical Optics XIII (PA111)

Conference Chairs: **Qingming Luo**, Hainan Univ. (China); **Xingde Li**, Johns Hopkins Univ. (United States); **Ying Gu**, Chinese PLA General Hospital (China); **Dan Zhu**, Huazhong Univ. of Science and Technology (China)

Program Committee: **Defu Chen**, Beijing Institute of Technology (China); **Shih-Chi Chen**, The Chinese Univ. of Hong Kong (Hong Kong, China); **Wei R. Chen**, The Univ. of Oklahoma (United States); **Yu Chen**, Univ. of Maryland, College Park (United States); **Zhihua Ding**, Zhejiang Univ. (China); **Hui Li**, Fujian Normal Univ. (China); **Huafeng Liu**, State Key Lab. of Modern Optical Instrumentation (China); **Hui Ma**, Tsinghua Univ. Shenzhen International Graduate School (China); **Paras N. Prasad**, Univ. at Buffalo (United States); **Jun Qian**, Zhejiang Univ. (China); **Junle Qu**, Shenzhen Univ. (China); **Kebin Shi**, Peking Univ. (China); **Ke Si**, Zhejiang Univ. (China); **Valery V. Tuchin**, Saratov State Univ. (Russian Federation); **Ruikang K. Wang**, Univ. of Washington (United States); **Xueding Wang**, Univ. of Michigan (United States); **Xunbin Wei**, Peking Univ. Health Science Ctr. (China); **Da Xing**, South China Normal Univ. (China); **Kexin Xu**, Tianjin Univ. (China); **Xibin Yang**, Suzhou Institute of Biomedical Engineering and Technology, Chinese Academy of Sciences (China); **Zhenxi Zhang**, Xi'an Jiaotong Univ. (China)

During the last 1.5 decades there have been significant scientific advances and technology developments in diagnosis, treatment and health care using light. Optical methods are generally noninvasive and sensitive to unique tissue contrast (absorption, scattering, birefringence, fluorescence, and nonlinear signal generation etc.) that complements other biomedical diagnostic technologies. Optical-based instruments/devices can be extremely compact and cost effective, suitable for home, clinic and global health care. The field of biomedical photonics is highly multi-disciplinary and has been attracting more and more researchers from physics, chemistry, electrical engineering, biomedical engineering, computer science, nanotechnology and many other disciplines. The past few years have also witnessed the integration of biomedical photonics with other technologies, such as photo-acoustics, optics-molecular and nano-techniques, optics and MRI, optics and positron emission tomography (PET), and more recently with artificial intelligence. Clinical applications of emerging biomedical photonics technologies span many areas including ophthalmology, dermatology, cardiology, gastroenterology, dentistry, urology, and neurology, etc. The objective of this conference is to provide a technical forum for engineers, scientists, clinicians, and health care industry and government agencies to report, share and learn the latest fundamental, translational, and clinical research and developments in the field of biomedical optics, and promote cross-disciplinary, institutional, and international collaborations. The topics of this conference are broad and will cover (but are not limited to) the following:

- tissue optics, light-tissue/cell interaction (fundamental theories and new methodologies for diagnosis and therapy)
- photon therapeutics (photo dynamic therapy, low-level red light therapy, laser surgery and other photo therapy)
- biomedical spectroscopy (reflectance, fluorescence, Raman, single molecule spectroscopy) fluorescence imaging, multiphoton microscopy, multidimensional microscopy
- novel microscopy and endoscopy (confocal, nonlinear, super resolution, OCT, multidimensional)
- translational optical techniques for basic research and clinical medicine (neurophotonics, diagnosis devices, implantable devices, point of care devices)
- multimodal biomedical imaging (photo-acoustic imaging, optical-MRI, optical PET)
- nano/biophotonics (nano-scale imaging, nano-particles and molecular probes for biomedical applications)
- AI in biomedical photonics.

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Advanced Sensor Systems and Applications XIII (PA112)

Conference Chairs: **Minghong Yang**, Wuhan Univ. of Technology (China); **Chang-Seok Kim**, Pusan National Univ. (Republic of Korea); **Xinyu Fan**, Shanghai Jiao Tong Univ. (China); **Jianzhong Zhang**, Harbin Engineering Univ. (China)

Program Committee: **Xiaoyi Bao**, Univ. of Ottawa (Canada); **Gilberto Brambilla**, Univ. of Southampton (United Kingdom); **Kevin P. Chen**, Univ. of Pittsburgh (United States); **Kin-Seng Chiang**, City Univ. of Hong Kong (Hong Kong, China); **Xudong Fan**, Univ. of Michigan (United States); **Claire Gu**, Univ. of California, Santa Cruz (United States); **Bai-Ou Guan**, Jinan Univ. (China); **Tuan Guo**, Jinan Univ. (China); **Zuyuan He**, Shanghai Jiao Tong Univ. (China); **Huizhu Hu**, Zhejiang Univ. (China); **Shibin Jiang**, AdValue Photonics, Inc. (United States); **Wei Jin**, Shenzhen Research Institute (China); **Deming Liu**, Huazhong Univ. of Science and Technology (China); **Qingwen Liu**, Shanghai Jiao Tong Univ. (China); **Tiegen Liu**, Tianjin Univ. (China); **Huilian Ma**, Zhejiang Univ. (China); **Yosuke Mizuno**, Yokohama National Univ. (Japan); **Niels Neumann**, Technische Univ. Clausthal (Germany); **Li Pei**, Beijing Jiaotong Univ. (China); **Gang-Ding Peng**, The Univ. of New South Wales (Australia); **Xueguang Qiao**, Northwest Univ. (China); **Yunjiang Rao**, Univ. of Electronic Science and Technology of China (China); **Tobias Schuster**, Evonik Industries AG (Germany); **Anuj K. Sharma II**, National Institute of Technology, Delhi (India); **Anbo Wang**, Virginia Polytechnic Institute and State Univ. (United States); **Tingyun Wang**, Shanghai Univ. (China); **Hai Xiao**, Clemson Univ. (United States); **X. Steve Yao**, NuVision Photonics, Inc. (United States); **Shizhuo Yin**, The Pennsylvania State Univ. (United States); **Paul Kit-Lai Yu**, Univ. of California, San Diego (United States); **Libo Yuan**, Harbin Engineering Univ. (China)

The areas of photonic sensors and their applications have expanded rapidly in recent years. Photonic sensors, especially fiber-optic sensors, are widely used for measurement of various physical and chemical parameters in many fields. Recent developments in fiber gratings, micro-structured optical fibers, specialty optical fibers and devices, planar waveguides and devices, etc, provide great potential and solutions for a variety of sensing applications that conventional sensors cannot handle. This topical conference will provide an international forum for the most recent and interesting technical issues concerning photonic sensors and their applications, including novel sensor devices, advanced sensing methods and sensor systems, innovative sensor integration and multiplexing techniques, and new applications and field tests. There will be a number of invited talks presented by leading scientists in the field of photonic sensors. Papers focused on the following and related topics are welcome:

- optical sensors based on fiber gratings, photonic crystal fibers, planar/integrated waveguides, etc.
- optical sensors for chemical, environmental, biological, medical, and other applications
- discrete and distributed optical sensors, as well as optical sensor systems and networks
- new fibers, smart structures, and materials for optical sensing
- passive and active devices for optical sensing
- new physics, principles, and modeling related to optical sensing
- applications, field tests, and standardizations of optical sensing technologies.

Submit abstracts by **17 May 2023**

Real-time Photonic Measurements, Data Management, and Processing VII (PA113)

Conference Chairs: **Ming Li**, Institute of Semiconductors, Chinese Academy of Sciences (China); **Kebin Shi**, Peking Univ. (China); **Hossein Asghari**, Loyola Marymount Univ. (United States); **Nuannuan Shi**, Institute of Semiconductors, Chinese Academy of Sciences (China)

Program Committee: **Hongwei Chen**, Tsinghua Univ. (China); **Xiangfei Chen**, Nanjing Univ. (China); **Jianji Dong**, Huazhong Univ. of Science and Technology (China); **Ruifang Dong**, National Time Service Ctr., Chinese Academy of Sciences (China); **Yongkang Dong**, Harbin Institute of Technology (China); **Xinyu Fan**, Shanghai Jiao Tong Univ. (China); **Mable P. Fok**, The Univ. of Georgia (United States); **Shiming Gao**, Zhejiang Univ. (China); **Minglie Hu**, Tianjin Univ. (China); **Jungwon Kim**, KAIST (Republic of Korea); **Hongpu Li**, Shizuoka Univ. (Japan); **Xueming Liu**, Zhejiang Univ. (China); **Yong Liu**, Univ. of Electronic Science and Technology of China (China); **Chengbo Mou**, Shanghai Univ. (China); **Fufei Pang**, Shanghai Univ. (China); **Liyang Shao**, Southern Univ. of Science and Technology of China (China); **Yikai Su**, Shanghai Jiao Tong Univ. (China); **Kevin K. Tsia**, The Univ. of Hong Kong (Hong Kong, China); **Chao Wang**, Univ. of Kent (United Kingdom); **Jian Wang**, Huazhong Univ. of Science and Technology (China); **Xu Wang**, Heriot-Watt Univ. (United Kingdom); **Fei Xu**, Nanjing Univ. (China); **Kun Xu**, Beijing Univ. of Posts and Telecommunications (China); **Haitao Yan**, Henan Univ. of Science and Technology (China); **Lilin Yi**, Shanghai Jiao Tong Univ. (China); **Lixing You**, Shanghai Institute of Microsystem and Information Technology, Chinese Academy of Sciences (China); **Shangjian Zhang**, Univ. of Electronic Science and Technology of China (China); **Xinliang Zhang**, Wuhan National Research Ctr. for Optoelectronics (China); **Hua Zhao**, Nanjing Normal Univ. (China); **Xiaoping Zheng**, Tsinghua Univ. (China); **Zheng Zheng**, Beihang Univ. (China); **Tao Zhu**, Chongqing Univ. (China); **Xihua Zou**, Southwest Jiaotong Univ. (China)

Real-time photonic measurement of fast non-repetitive events is arguably the most challenging problem in the fields of instrumentation and measurement. The challenge is performing fast continuous single-shot measurements for applications ranging from sensing, spectroscopy, and imaging. Some of the example applications include the study of optical rogue waves, detection of rare cancer cells in blood, industrial inspection and machine vision. Notwithstanding the sensitivity and speed limitations of single-shot real-time measurements, such instruments also create a big data problem. Owing to their high measurement rate, they produce a firehose of data that overwhelms even the most advanced computers. This necessitates innovations in data management and in-inline processing techniques.

The aim of this conference is to create a forum for presentation of the latest developments in real-time photonic instruments, data management and real-time processing, and to create a forum for exchange of ideas in this new and exciting field of photonic instrumentation. This conference intends to cover the following, and related topics:

- real-time optical imaging and spectroscopy
- real-time process photonic monitoring
- ultrafast optical signal characterization
- real-time photonic data processing systems
- computationally efficient algorithms
- photonic data compression
- photonic techniques for big data visualization and analytics
- single-photon detection and imaging from vis to NIR.

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Nanophotonics and Micro/Nano Optics IX

(PA114)

Conference Chairs: **Zhiping Zhou**, Peking Univ. (China); **Kazumi Wada**, Massachusetts Institute of Technology (United States); **Limin Tong**, Zhejiang Univ. (China)

Program Committee: **Eric Cassan**, Univ. Paris-Saclay (France); **Tao Chu**, Zhejiang Univ. (China); **David S. Citrin**, Georgia Institute of Technology (United States); **Hiroshi Fukuda**, NTT Device Technology Labs. (Japan); **Min Gu**, Univ. of Shanghai for Science and Technology (China); **Xiaoyong Hu**, Peking Univ. (China); **Ching-Fuh Lin**, National Taiwan Univ. (Taiwan); **Gong-Ru Lin**, National Taiwan Univ. (Taiwan); **Yan-Qing Lu**, Nanjing Univ. (China); **Jurgen Michel**, Massachusetts Institute of Technology (United States); **Takahiro Nakamura**, Photonics Electronics Technology Research Association (PETRA) (Japan); **Andrew W. Poon**, Hong Kong Univ. of Science and Technology (Hong Kong, China); **Haisheng Rong**, Intel Corp. (United States); **Yikai Su**, Shanghai Jiao Tong Univ. (China); **Hon Ki Tsang**, The Chinese Univ. of Hong Kong (Hong Kong, China); **Yun-Feng Xiao**, Peking Univ. (China); **Dan-Xia Xu**, National Research Council Canada (Canada); **Koji Yamada**, National Institute of Advanced Industrial Science and Technology (Japan); **Qing Yang**, Zhejiang Univ. (China); **Fabi Zhang**, Guilin Univ. of Electronic Technology (China); **Changhe Zhou**, Jinan Univ. (China); **Weidong Zhou**, The Univ. of Texas at Arlington (United States)

The focus of this conference is on the design, fabrication, and application of micro/nanostructures that facilitate the generation, propagation, manipulation, and detection of light from the infrared to the ultraviolet. Papers are solicited on the following and related topics:

- tunable, multifunctional, and/or active nanomaterials and metamaterials
- nonlinear nanophotonics including metamaterials and plasmonics
- molecular self-assembly, and other nanofabrication techniques
- nanoparticles and nanoparticulate composite materials
- nanotubes, nanowires, and nanofibers
- quantum dots and other low-dimensional nanostructures
- quantum optics and spintronics
- nanowaveguides and nanoantennas
- sculptured thin films and nanostructured photonic crystals
- nanobiophotonics
- near-field optics
- light-harvesting materials and devices
- nanophotonic detectors
- nanoscale optical electronics
- silicon photonics and photonic integrated circuits
- nanophotonic concepts for continued integration of various optical and/or electronic functions
- optical manipulation techniques, spectroscopies, and scattering techniques
- surface plasmons and nanoplasmonics
- ultrashort pulse propagation.

Submit abstracts by **17 May 2023**

Plasmonics VII (PA115)

Conference Chairs: **Zheyu Fang**, Peking Univ. (China), Rice Univ. (United States); **Takuo Tanaka**, RIKEN (Japan)

Program Committee: **David J. Bergman**, Tel Aviv Univ. (Israel); **Che Ting Chan**, Hong Kong Univ. of Science and Technology (Hong Kong, China); **Hongsheng Chen**, Zhejiang Univ. (China); **F. Javier García de Abajo**, ICFO - Institut de Ciències Fotòniques (Spain); **Min Gu**, Univ. of Shanghai for Science and Technology (China); **Xin Guo**, Zhejiang Univ. (China); **Minghui Hong**, Xiamen Univ. (Singapore); **Satoshi Kawata**, Osaka Univ. (Japan); **Zhi-Yuan Li**, Institute of Physics, Chinese Academy of Sciences (China); **Ai Qun Liu**, Nanyang Technological Univ. (Singapore); **Peter Nordlander**, Rice Univ. (United States); **Ru-Wen Peng**, Nanjing Univ. (China); **Min Qiu**, Westlake Univ. (China); **Atsushi Taguchi**, Hokkaido Univ. (Japan); **Din Ping Tsai**, City Univ. of Hong Kong (Hong Kong, China); **Jianfang Wang**, The Chinese Univ. of Hong Kong (Hong Kong, China); **Hong Wei**, Institute of Physics, Chinese Academy of Sciences (China); **Hongxing Xu**, Wuhan Univ. (China); **Jianbin Xu**, The Chinese Univ. of Hong Kong (Hong Kong, China); **Lei Zhou**, Fudan Univ. (China); **Shining N. Zhu**, Nanjing Univ. (China); **Xing Zhu**, Peking Univ. (China)

This SPIE/COS Photonics Asia conference on plasmonics will bring together plasmonics experts from across the globe, both junior and senior, from academia and industry, to share their latest results and set the agenda for future developments in the field. Papers are solicited on the following and related topics:

- active plasmonics
- plasmonic metamaterials and metasurfaces
- plasmonic antennas
- graphene plasmonics
- quantum plasmonics
- thermal plasmonics
- plasmon-enhanced spectroscopy
- plasmon-enhanced light harvesting
- near-field optics and related applications
- plasmonics in medicine and biology
- plasmonic circuits
- plasmon-assisted chemical reactions and hot electron generations
- chiral plasmonics
- topological plasmonics
- spoof plasmons
- plasmonic structure fabrication
- machine learning and inverse design for plasmonics
- nonlinear and coherent plasmonics
- plasmonics in 2D materials
- plasmonics for medical and health applications
- plasmonic photovoltaic and light harvesting applications.

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Quantum and Nonlinear Optics X (PA116)

Conference Chairs: **Qiongyi He**, Peking Univ. (China); **Dai-Sik Kim**, Ulsan National Institute of Science and Technology (Republic of Korea); **Chuan-Feng Li**, Univ. of Science and Technology of China (China)

Program Committee: **Fang Bo**, Nankai Univ. (China); **Chunhua Dong**, Univ. of Science and Technology of China (China); **Osamu Hirota**, Tamagawa Univ. (Japan); **Kebin Shi**, Peking Univ. (China); **Xiaolong Su**, Shanxi Univ. (China); **Jianwei Wang**, Peking Univ. (China)

Information security concerns and explosive data transmission and storage have led to exciting new developments and advances in quantum cryptography, quantum communication, nonlinear optics, optical data storage, optical communication etc. We encourage you to submit abstracts and papers on the following and related topics:

- quantum cryptography and quantum communication
- entanglement photon resource
- long-distance quantum network
- quantum measurement and quantum computations
- high-intensity and relativistic nonlinear optics
- novel nonlinear materials and structures
- nonlinear optics in waveguides
- optical coherent transient phenomena
- nonlinear frequency conversion and nonlinear spectroscopy
- optical data storage and associative memories
- nonlinear fiber optics
- phase-controlled nonlinear optical processes
- ultrafast nonlinear optics
- nonlinear plasmonics and nano-photonics
- quantum sensing and metrology
- quantum electrodynamics
- matter-light entanglement
- optical field engineering in quantum and nonlinear optics
- integrated quantum information and computation.

Submit abstracts by **17 May 2023**

Infrared, Millimeter-Wave, and Terahertz Technologies X (PA117)

Conference Chairs: **Cunlin Zhang**, Capital Normal Univ. (China); **Xi-Cheng Zhang**, The Institute of Optics, Univ. of Rochester (United States); **Masahiko Tani**, Univ. of Fukui (Japan)

Program Committee: **Derek Abbott**, The Univ. of Adelaide (Australia); **M. Hassan Arbab**, Stony Brook Univ. (United States); **Juncheng Cao**, Shanghai Institute of Microsystem and Information Technology (China); **Jian Chen**, Nanjing Univ. (China); **Yiwen E.**, The Institute of Optics, Univ. of Rochester (United States); **Vladimir Yu Fedorov**, Texas A&M Univ. at Qatar (Qatar); **Jiaguang Han**, Ctr. for Terahertz Waves of Tianjin Univ. (China); **Zhi Hong**, China Jiliang Univ. (China); **Yen-Chieh Huang**, National Tsing Hua Univ. (Taiwan); **Biaobing Jin**, Nanjing Univ. (China); **Weiqi Jin**, Beijing Institute of Technology (China); **Rajib Kumar Mitra**, S.N. Bose National Ctr. for Basic Sciences (India); **Fengqi Liu**, Institute of Semiconductors, Chinese Academy of Sciences (China); **Weiwei Liu**, Nankai Univ. (China); **Chih Wei Luo**, National Yang Ming Chiao Tung Univ. (Taiwan); **Yungui Ma**, Zhejiang Univ. (China); **Hiroaki Minamide**, RIKEN (Japan); **Makoto Nakajima**, Osaka Univ. (Japan); **Hua Qin**, Suzhou Institute of Nano-Tech and Nano-Bionics, Chinese Academy of Sciences (China); **Shengcai Shi**, Purple Mountain Observatory, Chinese Academy of Sciences (China); **Alexander P. Shkurinov**, M.V. Lomonosov Moscow State Univ. (Russian Federation); **Xianghong Tang**, Hangzhou Dianzi Univ. (China); **Joo-Hiuk Son**, The Univ. of Seoul (Republic of Korea); **Anton N. Tsyppkin**, ITMO Univ. (Russian Federation); **Masayoshi Tonouchi**, Osaka Univ. (Japan); **Xiaojun Wu**, Beihang Univ. (China); **Xinlong Xu**, Northwest Univ. (China); **Yuping Yang**, Minzu Univ. of China (China); **Chao Zhang**, Univ. of Wollongong (Australia); **Dongwen Zhang**, National Univ. of Defense Technology (China); **LiangLiang Zhang**, Capital Normal Univ. (China); **Weili Zhang**, Oklahoma State Univ. (United States); **Yan Zhang**, Capital Normal Univ. (China); **Yaxin Zhang**, Univ. of Electronic Science and Technology of China (China); **Zhuoyong Zhang**, Capital Normal Univ. (China); **Kun Zhao**, China Univ. of Petroleum (China); **Zengxiu Zhao**, National Univ. of Defense Technology (China); **Zhenyu Zhao**, Shanghai Normal Univ. (China); **Li-Guo Zhu**, China Academy of Engineering Physics (China); **Yiming Zhu**, Univ. of Shanghai for Science and Technology (China); **Olga G. Kosareva**, M. V. Lomonosov Moscow State Univ. (Russian Federation); **Tae-In Jeon**, Korea Maritime and Ocean Univ. (Republic of Korea)

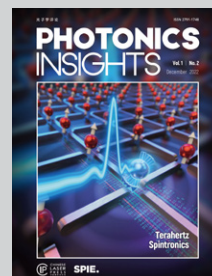
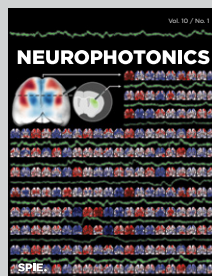
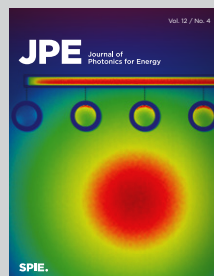
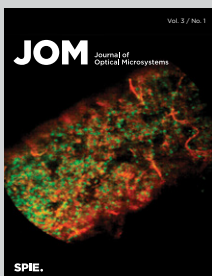
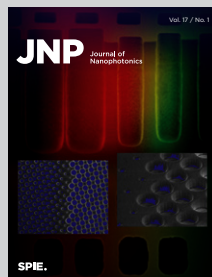
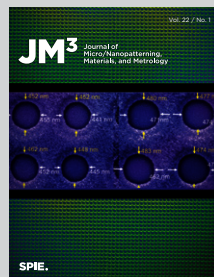
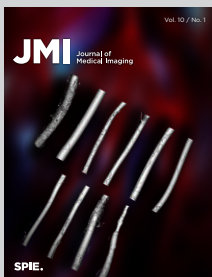
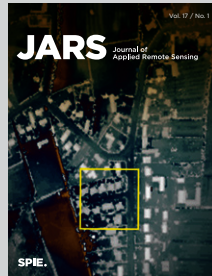
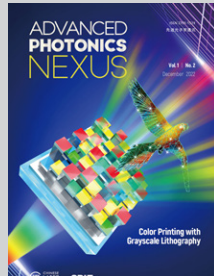
Papers on the following and related topics are solicited for this conference:

- infrared detectors and focal plane arrays
- testing and calibration
- communication and radar
- waveguides, metamaterials, components, and devices
- spectroscopy and imaging
- high field phenomena and nonlinear physics
- novel THz generation and detection
- interaction of THz radiation with matter
- THz for biomedical applications
- nondestructive sensing
- bright THz source
- remote THz sensing
- light field imaging
- spintronics.

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