

Chinese Optics Letters

Volume 13
Number 10
October 10, 2015

www.col.org.cn

Atomic and molecular physics

Observation of $^1S_0-^3P_0$ transition of bosonic strontium in the Lamb-Dicke regime

*Qinfang Xu, Hui Liu, Benquan Lu,
Yebing Wang, Mojuan Yin,
Dehuan Kong, Jie Ren, Xiao Tian,
and Hong Chang*

100201

Detectors

Quantum efficiency decay mechanism of NEA GaN photocathode: A first-principles research

*Yang Shen, Liang Chen, Shuqin Zhang,
and Yunsheng Qian*

100401

Diffraction and gratings

Symmetrical short-period and high signal-to-noise ratio heterodyne grating interferometer

*Cunbao Lin, Shuhua Yan, Zhiguang Du,
Guochao Wang, and Chunhua Wei*

100501

Free-space optical data links based on coaxial sidelobe-modified optical vortices

*Meng Zhang, Ping Jia, Yuru Li,
Ting Lei, Zhaohui Li,
and Xiaocong Yuan*

100502

Fiber optics and optical communications

FFPI-FBG hybrid sensor to measure the thermal expansion and thermo-optical coefficient of a silica-based fiber at cryogenic temperatures

*Litong Li, Dongsheng Zhang,
Xiaoyan Wen, and Sisi Peng*

100601

1.2 Gbit/s visible light transmission based on orthogonal frequency-division multiplexing using a phosphorescent white light-emitting diode and a pre-equalization circuit

*Xingxing Huang, Siyuan Chen,
Zhixin Wang, Yiguang Wang,
and Nan Chi*

100602

Novel distributed passive vehicle tracking technology using phase sensitive optical time domain reflectometer

*Zhaoyong Wang, Zhengqing Pan,
Qing Ye, Bin Lu, Zujie Fang,
Haiwen Cai, and Ronghui Qu*

100603

Improved modulation format identification based on Stokes parameters using combination of fuzzy c-means and hierarchical clustering in coherent optical communication system

*Longxue Cheng, Lixia Xi, Donghe Zhao,
Xianfeng Tang, Wenbo Zhang,
and Xiaoguang Zhang*

100604

Fourier optics and signal processing

Digital holographic shape measurement using Fizeau microscopy

*D. G. Abdelsalam, Junwei Min,
Daesuk Kim, and Baoli Yao*

100701

Imaging systems

Photoacoustic microscopy by scanning mirror-based synthetic aperture focusing technique

*De Cai, Zhongfei Li,
and Sung-Liang Chen*

101101

Contents continued

Instrumentation, measurement, and metrology

Beam combination setup for dual-frequency laser with orthogonal linear polarization *Haijin Fu, Jiubin Tan, Pengcheng Hu, and Zhigang Fan* 101201

Cubic polynomial curve-guided method for isochromatic determination in three-fringe photoelasticity *Xiaomeng Liu and Shuguang Dai* 101202

Integrated optics

Large-mode-volume transverse-electric-polarized distributed feedback cavity on silicon-on-insulator *Xiangjie Zhao, Yong Zhang, Cheng Zeng, Danping Li, Ge Gao, Qinzhong Huang, Yi Wang, Jinzhong Yu, and Jinsong Xia* 101301

Lasers and laser optics

Observation of wave-breaking-free square pulses in a fiber ring laser *Tonghui Liu, Dongfang Jia, Ying Liu, Zhaoying Wang, and Tianxin Yang* 101401

Diode-pumped electro-optical cavity-dumped Tm:YAP laser at 1996.9 nm *Baoquan Yao, Xiaolei Li, Hongwei Shi, Tongyu Dai, Zheng Cui, Chuampeng Qian, Youlun Ju, and Yuezhu Wang* 101402

Materials

Polarization insensitivity in square split-ring resonators with asymmetrical arm widths *Qianan Wu, Feng Lan, YaXin Zhang, HongXin Zeng, Ziqiang Yang, and Xi Gao* 101601

Monochromic orange emission of Pr³⁺ ions in phosphate glass *Weichuan Gao, Yu Tong, Yunxia Yang, and Guorong Chen* 101602

Medical optics and biotechnology

Model of Raman-Nath acousto-optic diffraction *Cuncheng Weng and Xiaoman Zhang* 101701

Optics at surfaces

Silver hierarchical structures grown on microstructured silicon in chip for microfluidic integrated catalyst and SERS detector *Zhaoxu Yan, Chunhao Li, Yang Luo, Jihong Zhao, Hai Yang, Prabhat Verma, and Satoshi Kawata* 102401

Scattering

The influence of the characteristics of a collection of particles on the scattered spectral density and its applications *Tao Wang, Yi Ding, Xiaoling Ji, and Daomu Zhao* 102901

Thin films

Role of oxygen defects in inducing the blue photoluminescence of zinc oxide films deposited by magnetron sputtering *Kun Chen, Huanfeng Zhu, Xinyu Yi, Shuai Cheng, Jing Li, Songyou Wang, Ming Lu, Min Xu, Li Ma, and Lei Lü* 103101