

## LETTERS

### **Time-resolved and excitation-dependent photoluminescence study of CdTe/MgCdTe double heterostructures grown by molecular beam epitaxy**

Xin-Hao Zhao, Michael J. DiNezza, Shi Liu, Su Lin, Yuan Zhao and Yong-Hang Zhang  
J. Vac. Sci. Technol. B **32**, 040601 (2014); <http://dx.doi.org/10.1116/1.4878317>

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### **Thermal stability of DNA origami on mica**

Michelle A. Pillers and Marya Lieberman  
J. Vac. Sci. Technol. B **32**, 040602 (2014); <http://dx.doi.org/10.1116/1.4879417>

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## REVIEW ARTICLES

### **Role of molybdenum oxide for organic electronics: Surface analytical studies**

Chenggong Wang, Irfan Irfan, Xiaoliang Liu and Yongli Gao  
J. Vac. Sci. Technol. B **32**, 040801 (2014); <http://dx.doi.org/10.1116/1.4886364>

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### **Access devices for 3D crosspoint memory<sup>a</sup>)**

Geoffrey W. Burr, Rohit S. Shenoy, Kumar Virwani, Pritish Narayanan, Alvaro Padilla, Bülent Kurdi and Hyunsang Hwang  
J. Vac. Sci. Technol. B **32**, 040802 (2014); <http://dx.doi.org/10.1116/1.4889999>

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## ELECTRONIC & OPTOELECTRONIC MATERIALS, DEVICES & PROCESSING

### **GaSb oxide thermal stability studied by dynamic-XPS**

Stephen McDonnell, Barry Brennan, Emin Bursa, Robert M. Wallace, Konrad Winkler and Peter Baumann  
J. Vac. Sci. Technol. B **32**, 041201 (2014); <http://dx.doi.org/10.1116/1.4878940>

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### **Effect of Al concentration on Al-doped ZnO channels fabricated by atomic-layer deposition for top-gate oxide thin-film transistor applications**

Eom-Ji Kim, Jun-Yong Bak, Jeong-Seon Choi and Sung-Min Yoon  
J. Vac. Sci. Technol. B **32**, 041202 (2014); <http://dx.doi.org/10.1116/1.4880823>

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### **Barrier height inhomogeneities induced anomaly in thermal sensitivity of Ni/4H-SiC Schottky diode temperature sensor**

Vibhor Kumar, Anup Singh Maan and Jamil Akhtar  
J. Vac. Sci. Technol. B **32**, 041203 (2014); <http://dx.doi.org/10.1116/1.4884756>

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**Development of cap-free sputtered GeTe films for inline phase change switch based RF circuits**

Matthew R. King, Brian P. Wagner, Evan B. Jones, Nabil El-Hinnawy, Pavel Borodulin, Sean R. McLaughlin, John S. Mason Jr., Robert S. Howell, Michael J. Lee and Robert M. Young  
J. Vac. Sci. Technol. B **32**, 041204 (2014); <http://dx.doi.org/10.1116/1.4883217>

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**Dual-superlattice calibrations for group-III species in III-V semiconductor epitaxial structure growth**

Richard P. Leavitt, Lei He and Christopher J. K. Richardson  
J. Vac. Sci. Technol. B **32**, 041205 (2014); <http://dx.doi.org/10.1116/1.4887482>

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**Isotope effects on plasma species of Ar/H<sub>2</sub>/D<sub>2</sub> plasmas**

Nick Fox-Lyon and Gottlieb S. Oehrlein  
J. Vac. Sci. Technol. B **32**, 041206 (2014); <http://dx.doi.org/10.1116/1.4889858>

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**Fabrication of sub-200 nm AlN-GaN-AlN waveguide with cleaved end facet**

Yijing Chen, Vivek Krishnamurthy, Yicheng Lai, Yi Luo, Zhibiao Hao, Lai Wang and Seng-Tiong Ho  
J. Vac. Sci. Technol. B **32**, 041207 (2014); <http://dx.doi.org/10.1116/1.4890487>

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**LITHOGRAPHY****Electron scattering analysis based on electron ray-tracing in extreme ultraviolet photomask**

Jin Choi, Byung Sup Ahn and Chan Uk Jeon  
J. Vac. Sci. Technol. B **32**, 041601 (2014); <http://dx.doi.org/10.1116/1.4878943>

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**Focused ion beam direct patterning of hardmask layers**

Simon Waid, Heinz D. Wanzenboeck, Michael Muehlberger, Marco Gavagnin and Emmerich Bertagnolli  
J. Vac. Sci. Technol. B **32**, 041602 (2014); <http://dx.doi.org/10.1116/1.4884777>

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**NANOMETER SCIENCE & TECHNOLOGY****Ni<sub>2.36</sub>Mn<sub>0.72</sub>Ga<sub>0.92</sub> nanowires with high martensite transition temperature**

Parshu Gyawali, Keshab Sapkota, Ian Pegg and John Philip

J. Vac. Sci. Technol. B **32**, 041801 (2014); <http://dx.doi.org/10.1116/1.4881137>

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**Nanocolumnar growth of thin films deposited at oblique angles: Beyond the tangent rule**

Rafael Alvarez, Carmen Lopez-Santos, Julian Parra-Barranco, Victor Rico, Angel Barranco, Jose Cotrino, Agustin R. Gonzalez-Elipe and Alberto Palmero

J. Vac. Sci. Technol. B **32**, 041802 (2014); <http://dx.doi.org/10.1116/1.4882877>

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**AC and DC electrical transport studies of (Fe, Co) codoped ZnO nanoparticles**

Sanjay Kumar Mandal, Puja Dey and Tapan Kumar Nath

J. Vac. Sci. Technol. B **32**, 041803 (2014); <http://dx.doi.org/10.1116/1.4887480>

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**Pattern transfer of hydrogen depassivation lithography patterns into silicon with atomically traceable placement and size control**

Joshua B. Ballard, James H. G. Owen, William Owen, Justin R. Alexander, Ehud Fuchs, John N. Randall, James R. Von Ehr, Stephen McDonnell, Don D. Dick, Robert M. Wallace, Yves J. Chabal, Maia R. Bischof, David L. Jaeger, Richard F. Reidy, Joseph Fu, Pradeep Nambodiri, Kai Li and Richard M. Silver

J. Vac. Sci. Technol. B **32**, 041804 (2014); <http://dx.doi.org/10.1116/1.4890484>

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## MEMS & NEMS

**Fabrication and characterization of glassy carbon membranes**

Yuri Koval, Andreas Geworski, Klaus Gieb, Irina Lazareva and Paul Müller

J. Vac. Sci. Technol. B **32**, 042001 (2014); <http://dx.doi.org/10.1116/1.4890008>

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## MICROELECTRONIC & NANOELECTRONIC DEVICES

**Growth of high-density Ir nanocrystals by atomic layer deposition for nonvolatile nanocrystal memory applications**

Xiao-Jie Liu, Lin Zhu, Xue-Fei Li, Zheng-Yi Cao, Ai-Dong Li and Di Wu

J. Vac. Sci. Technol. B **32**, 042201 (2014); <http://dx.doi.org/10.1116/1.4878942>

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## ERRATA

**Erratum: "Strain- and kinetically induced suppression of phase separation in MBE-grown metastable and unstable GaInAsSb quaternary alloys for mid-infrared optoelectronics" [J. Vac. Sci. Technol. B **31**, 03C125 (2013)]**

Asli Yildirim and John P. Prineas

J. Vac. Sci. Technol. B **32**, 043401 (2014); <http://dx.doi.org/10.1116/1.4884775>

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## 41ST CONFERENCE ON THE PHYSICS AND CHEMISTRY OF SEMICONDUCTOR INTERFACES (41ST PCSI 2014)

### Theory of graphene–insulator–graphene tunnel junctions

Sergio C. de la Barrera, Qin Gao and Randall M. Feenstra

J. Vac. Sci. Technol. B **32**, 04E101 (2014); <http://dx.doi.org/10.1116/1.4871760>

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### Revealing optically induced magnetization in SrTiO<sub>3</sub> using optically coupled SQUID magnetometry and magnetic circular dichroism

William D. Rice, Palak Ambwani, Joe D. Thompson, Christopher Leighton and Scott A. Crooker

J. Vac. Sci. Technol. B **32**, 04E102 (2014); <http://dx.doi.org/10.1116/1.4871691>

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### Coexisting Bi and Se surface terminations of cleaved Bi<sub>2</sub>Se<sub>3</sub> single crystals

Andrew S. Hewitt, Jingying Wang, Jon Boltersdorf, Paul A. Maggard and Daniel B. Dougherty

J. Vac. Sci. Technol. B **32**, 04E103 (2014); <http://dx.doi.org/10.1116/1.4873689>

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### Tuning the oxidation states and crystallinity of copper oxide nanofibers by calcination

Juyun Park, SungYong Seo, Yong-Cheol Kang and Sung-Wi Koh

J. Vac. Sci. Technol. B **32**, 04E104 (2014); <http://dx.doi.org/10.1116/1.4874617>

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### Flexible transparent conductive heater using multiwalled carbon nanotube sheet

Daewoong Jung, Maeum Han and Gil S. Lee

J. Vac. Sci. Technol. B **32**, 04E105 (2014); <http://dx.doi.org/10.1116/1.4876127>

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### Selective Raman modes and strong photoluminescence of gallium selenide flakes on sp<sup>2</sup> carbon

Raul D. Rodriguez, Susanne Müller, Evgeniya Sheremet, Dietrich R. T. Zahn, Alexander Villabona, Santos A. Lopez-Rivera, Philipp Tonndorf, Steffen Michaelis de Vasconcellos and Rudolf Bratschitsch

J. Vac. Sci. Technol. B **32**, 04E106 (2014); <http://dx.doi.org/10.1116/1.4881995>

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### Infrared sensing characteristics of multiwalled carbon nanotube sheet

Daewoong Jung, Maeum Han and Gil S. Lee

J. Vac. Sci. Technol. B **32**, 04E107 (2014); <http://dx.doi.org/10.1116/1.4883050>

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