Second International Conference on Optical, Optoelectronic and Photonic Materials and Applications 2007

ICOOPMA 2007
30 July – 3 August 2007

An international conference on optical, optoelectronic and electro-optic properties of all classes of materials and material systems; optical, optoelectronic and photonic materials for a wide range of applications from telecommunications to photovoltaics. Authors are invited to submit abstracts on line by 30 March 2007, using the web link:

http://www.icoopma.org

ICOOPMA07
London, England
30 July – 3 August 2007

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PROCEEDINGS

Editors: Stephen Sweeney (University of Surrey) and Steffi Krause (Queen Mary, University of London)

Presented papers will be refereed and will be published in a special issue of the

Journal of Materials Science: Materials in Electronics

ICOOPMA 2007

ICOOPMA07 is the second in the ICOOPMA series, and will be hosted by Queen Mary, University of London. The conference is co-sponsored by The Institution of Electrical Engineers and Technology, Springer and LG Philips Displays. London is the largest city in Europe offering a great mixture of cultures and unique experiences for visitors of all ages to enjoy its art galleries, museums and exciting buildings and monuments of historical importance.

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Armando Luches, Lecce University, Italy
Hideo Hosono, Tokyo Institute of Technology, Japan

SCOPE

Optical and optoelectronic properties of a wide range of materials and materials systems, such as single crystals, polycrystalline bulk and film samples, amorphous materials, organics, polymers, photonic crystals and nanostructures, quantum wells, wires and dots
II-VI and Related Semiconductors Including Alloys
III-V and Related Semiconductors Including Alloys
Oxide Semiconductors, Silicon Photonics
a-Si:H, a-SiN:H, a-SiC:H, a-SeGe:H
Nonoxide Glasses and Chalcogenide Glasses
ZBLAN and Oxyfluoride Glasses
Excitonic processes
Luminescence, Phosphors and Applications
Photoinduced effects
Electro-optic properties and applications
Nonlinear optical properties and applications
Materials for optoelectronics and photonics
Nano-optoelectronics and Nanophotonics
Photoconductivity
Optically induced processes
Optical fibers and waveguides
Materials for optical storage
Materials for photovoltaics or solar cells
Photogeneration, quantum efficiency
Experimental techniques
Optoelectronic and photonic devices
Applications of materials in photonics and optoelectronics

IMPORTANT DATES

Abstract Submission: 30 March 2007
Acceptance: 23 April 2007
Early registration: Friday 11 May 2007

Manuscripts: Electronic submission online before or during the conference

REGISTRATION

ICOOPMA2007 Conference

Conference Registration Fees. *Includes meals*, except conference dinner (GBP40)

Full	**GBP 450** (GBP 575 after 11 May 2007)
Student	**GBP 250** (GBP 325 after 11 May 2007)
Exhibitor	**GBP 575** (GBP 675 after 11 May 2007)

PLENARY LECTURES

Sajeev John, University of Toronto, Canada
Photonic Band Gap Materials: Localization of Light

David Lockwood, FRS (Canada), NRC, Ottawa, Canada,
Light Emission in Silicon Nanostructures

Shuji Nakamura, University of California, Santa Barbara,
Current Progress of Solid State Lighting

Philip Russell, FRS, University Erlangen-Nuremberg, Germany, *Enhancing Light-Matter Interactions with Photonic Crystal Fibres*

Osamu Wada, Kobe University, Japan
Semiconductor quantum dots and nanostructures for photonic device applications

SELECTED INVITED SPEAKERS

Jean-Luc Adam, Universite de Rennes, France, *Chalcogen Based Glasses for Infrared Applications*

Carmen N. Afonso and Jose Gonzalo, Instituto de Optica, CSIC, Madrid, Spain, *Advanced Heavy Metal Oxide Film Glasses with Large Optical Nonlinearities*

Rui Almeida, Instituto Superior Tecnico, Lisbon, Portugal,
Rare-Earth Doped Photonic Crystals via Sol-Gel

Claudia Ambrosch-Draxl, University Leoben, Austria,
Tailoring the Optical Properties of Organic Semiconductors

Yasuhiko Arakawa, Institute of Industrial Science, Komaba, Japan, Advances In Quantum Dots for Nanophotonic and Quantum Information Devices

Sergei Baranovski, Philipps University Marburg, Germany,
Impact Ionization Phenomena in Disordered Systems Related to the Avalanche Multiplication and Switching Effect.

Harbhajan Singh Bhatti, Punjabi University, India
Laser Induced Photoluminescence and Morphological Characterization of $Cd_{(1-x)-y}Zn_xMn_yS$ *Nanocrystals.*

Dietmar Borchert, Fraunhofer Institut fur Solare Energiesysteme ISE, Germany,
Interaction between process technology and material quality during the processing of multicrystalline silicon sloar cells.

Rudi Bruggeman, Carl von Ossietzky Universität Oldenburg, Germany, *Electroluminescence and Photoluminescence for the Characterization of Solar Cells*

Pere Roca Cabarrocas, Ecole Polytechnique, France
Low temperatre plasma deposition of silicon thin films for solar cells

Giulio Cerullo, Institute for Photonics and Nanotechnologies, Milano, Italy, *Few-Optical-Cycle Pulses with Stable Carrier-Envelope Phase from Optical Parametric Amplifiers*

Isabel Cristina dos Santos Carvalho, Pontifical University Catholic of Rio De Janeiro, Brazil, *New Glassy Materials for Sensors & applications*

Jamal Deen, McMaster University, Canada
High Sensitivity Photodetection Systems for Biological/Medical Applications

Ananth Dodabalapur, The University of Texas at Austin, USA, *Organic and Polymer Thin-Film Transistors: Recent Advances*

Jaroslav Fabian, University Regensburg, Germany
Semiconductor Spintronics Devices

Miloslav Frumar, University of Pardubice, Czech Republic
Phase change memory materials and the mechanism of their solidification

Shubra Gangopadhyay, University of Missouri - Columbia, Missouri, USA, *Novel Processes for Low Temperature Crystallization of a-Si:H and a-SiC:H for Optoelectronic Applications*

Michael Graetzel, ISIC, Switzerland and Ayodha N. Tiwari, University of Loughborough, UK,
Development of flexible dye sensitized solar cells: challenges and strategies.

Frank Hegmann, University of Alberta, Canada
Using Terahertz Spectroscopy to Probe Carrier Dynamics and Localization in Semiconductor Materials

Jong Heo, Pohang University of Science and Technology, Korea, *Novel nano-structured glasses containing semiconductor quantum dots*

Peter Hess, University of Heidelberg, Germany,
Spectroscopic and ellipsometric characterization of SiC films

Hideo Hosono, Tokyo Institute of Technology, Japan, *Low Work Function in C12A7 Electride and Its Applications*

Jorn Hvam, Technical University of Denmark,
Recent Advances in Nanophotonics

Richard Jones and Mario Paniccia, Intel, USA
Silicon Photonics: Materials and Devices, and Recent Advances

Raman Kashyap, Ecole Polytechnique, University of Montreal, Canada, *Progress in Bragg Grating Optical Fiber Sensors*

Junji Kido, Yamagata University, Japan, *Design and Fabrication of High Performance OLEDs for Lighting Applications*

Andrew Knights, McMaster University, Canada
Progress in Bragg Grating Optical Fiber Sensors

Krisztian Kohary, University of Oxford, Oxford, UK
Structural optimization of organi light-emitting diodes incorporating nancrystal quantum dots

Nobuyoshi Koshida, Tokyo University of Agriculture & Technology, Tokyo, Japan, *Photonic, Electronic and Acoustic Devices Based on Nanocrystalline Silicon*

S. Kugler, Budapest University of Technology & Economics, Hungary, *Microscopic and macroscopic models of Photoinduced volume changes in chalcogenides*

Miguel Levy, Michigan Technological University, Houghton, USA, *Magnetophotonic Crystals: Nonreciprocity, Birefringence and Confinement*

Roger Lewis, University of Wollongong, Australia, *Reflectance Studies of Candidate THz emitters*

Zhenghong Lu, Unniversity of Toronto, Canada, *Superluminescent Organic Light-Emitting Diodes*

Takayuki Makino, University of Hyogo, Japan, *Optical Properties of ZnO and Their Extension to the Ultraviolet Optoelectronic Application*

Walter Margulis, Acreo Fibre Optic Centre, Sweden. *Electrical control of light in fibre-based components*

Stefan Matefi-Tempfli, Unite de Physico-Chimie et Physique des Materiaux, Universite Catholique de Louvain, Belgium *Nanowires and nanostructures fabrication using template methods. A step forward to real devices combining electrochemical synthesis with lithographic techniques*

Stephen W. S. Mckeever, Oklahoma State University, USA *Induced Luminescence for Dosimetry: Recent Advances*

Qingbo Meng, Chinese Academy of Sciences, China *Pressure controlled self-assembly of high quality opals and inverse opals.*

Bill Milne and Alex Rhozin, University of Cambridge, UK, *Carbon Nanotubes for Photonic Devices*

Tanya Monro, University of Adelaide, Australia, *New Developments in Soft Glass Microstructured Optical Fibres*

Mayasuki Nagami, Nagoya Institute of Technology, Japan, *Nonlinear optical emission properties of sol-gel-derived glasses*

Hiroyoshi Naito, Osaka Prefecture University, Japan, *Characterization of Polymer Light-Emitting Diodes*

Maurizio Martino, University of Lecce, Italy, *Pulse Laser Deposition of Organic, Inorganic and Biological Materials*

Alex Moewes, University of Saskatchewan, Canada
Synchrotron characterization of Optical and Electronic Properties of Materials: Recent Advances and Examples

Dirk Poelman, Ghent University, Belgium, *Advances in Inorganic Phosphors for Displays and Lighting*

Jianrong Qiu, Zhejiang University, China
Broadband infrared luminescence and optical amplification of transparent glass-ceramics containing Ni2+-doped nanocrystals.

Mark Reed, Yale University, USA, *Plasmonic Waveguides: A New Approach to Sub-Wavelength Optics*

John Rowlands and K. Tanioka, University of Toronto, Canada and NHK, Japan, *Ultrasensitive HARP Video Tubes, Imaging Devices and Applications*

Michael F. Rubner, Massachusetts Institute of Technology *Thin film optical coatings from functional nanoparticle multilayers.*

Harry Ruda, University of Toronto, *Transport and Optical Response of Single Nanowires*

Jas Sanghera and Ishwar Aggarwal, Naval Research Laboratory, Washington DC, USA, *Infrared Transmitting Glasses, Ceramics and Optical Fibers*

Heinz von Seggern, Darmstadt University
Mechanism of Long-lasting Photoluminescence Afterglow in Csl:Tl

Setsuhisa Tanabe, Kyoto University, Japan, *Glass Ceramic Phosphors for Solid-State Lighting*

Keiji Tanaka, Hokkaido University, Japan, *Photoinduced Phenomena in Group VIB Glasses*

Peter Tanner, City University of Hong Kong, *Developments and Applications of Ultraviolet and Vacuum Ultraviolet Luminescence of Lanthanide Ions*

Roberto Teghil, University of Basilicata, Italy
Femtosecond Pulsed Laser Deposition of Inorganic Electrochromic Materials

Michael Thewalt, Simon Fraser University, Canada, *Spectroscopy of Semiconductor Structures: Recent Advances*

Peter Thomas, Philipps-University Marburg, Germany, *Investigating Disorder in Semiconductor Quantum Structures using Angular Photonic Correlation in Spontaneous Emission*

Joe Trodahl and Ben Ruck, Victoria University of Wellington, New Zealand
Electronic and Optical Properties of Rare Earth Nitrides

M. Asfar Uddin and Andy Hau-Ping Chan, City University of Hong Kong, Hong Kong
The challenges in the fabrication of Polymer based photonic devices.

Joe Trodahl and Ben Ruck, Victoria University of Wellington, New Zealand
Electronic and Optical Properites of Rare Earth Nitrides

Ashok Vaseashta, Marshall University, Huntington,
Nanoscale Materials, Devices and Systems for Energy Generation and Storage

Frank van Veggel, University of Victoria, Canada
Lanthanide (III) - Based photonic materials and their applications

Helge Werman, Norwegian University of Science and Technology, Norway, *Semiconductor Quantum-Wires and Nano-Wires For Optoelectronic Applications*

Ian White, University of Cambridge, UK
High Speed Quantum Dot Mode Locked Lasers

Michael Winokur, University of Wisconsin, USA, *The Role of Nematic Order in Conjugated Polymer Spectroscopy*

Mitsuo Yamaga, Gifu University, Japan.
Long-lasting phosphorescence in Ce-doped oxides.

SESSIONS

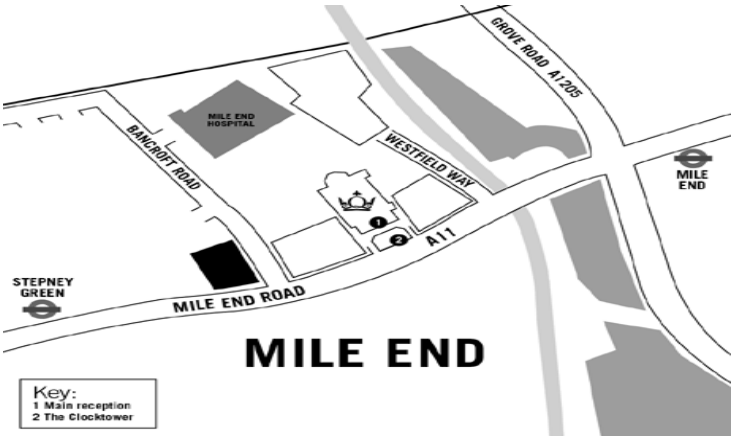
Optical properties of materials
- General
- Crystals
- Polycrystalline bulk and film
- Amorphous and organics
- Nanostructures, including photonic crystals

Quantum Dots
Quantum Wires
II-VI and Related Semiconductors Including Alloys
III-V and Related Semiconductors Including Alloys
Oxide Semiconductors
Silicon Photonics
a-Si:H, a-SiN:H, a-SiC:H, a-SeGe:H
Nonoxide Glasses and Chalcogenide Glasses
ZBLAN and Oxyfluoride Glasses
Excitonic Processes
Luminescence, Phosphors and Applications
Photoinduced Effects and Applications
Photoconductivity and Photogeneration
Nonlinear Optical Effects and Applications
Electro-Optic Effects and Applications
Semiconductors for Optoelectronics (including wide bandgap materials) for applications in lasers, photodetectors, waveguides, modulators etc.
Light Emitting Devices (including organics)
Photonic and Optoelectronic Materials and Devices
- Quantum Wells, Quantum Wires, Quantum Dots, Nanophotonics and Nano-Optoelectronics

Optical Storage
Photovoltaics (materials and devices, and their properties)
Waveguides and Fibers
Integrated Photonics
Experimental Techniques
Phgotoreflectance
Photonic Bandgap Materials and Nonlinear Photonic bandgap materials
Defect Spectroscopy
Femtosecond Spectroscopy
Optical Fibers and Fiber Sensors
Plasmons and Surface Plasmons
Selected Topics (e.g. Photocatalysis in Materials, Materials for Energy Conversion etc)

VENUE

The venue for the symposium is the Queen Mary London University Mile End campus. It is served by two underground (Metro) stations: Mile End on the Central Line, and Stepney Green on Hammersmith & City and District Lines



Accommodation

Typical bedroom

A limited number of single ensuite rooms are available at the University student village for GBP50/night including breakfast. Please book early. First come first served booking is used.

Student village

There are also many wonderful hotels in London and the London Metro is very efficient. The conference website has links to suggested online accommodation booking information.

ICOOPMA 2007 Oral Sessions

Day 1: Monday 30 July 2007

8.30am	**Registration:** The Great Hall, People Palace, Mile End Campus		
10.30am	**Conference opening address:** Adrian Smith FRS, Principal, Queen Mary, University of London at The Skeel Lecture Theatre		
11.00am (Plenary)	**P. St.J. Russell FRS** (University of Erlangen-Nuremberg, Germany) *Enhancing Light-Matter Interactions with Photonic Crystal Fibres* Chair: **Arthur Willoughby** (University of Southampton) The Skeel lecture theatre		
Session	**I** The Skeel Lecture Theatre	**II** People's Palace Lecture Theatre I	**III** People's Palace Lecture Theatre II
Topic	**Nonlinear Optical Effects and Applications**	**Nanophotonics and Nano-Optoelectronics**	**Photovoltaics**
Chair	**Ajoy Kar** (Heriot Watt University)	**Vinod S Agarwala** (US office of Naval Research Global, London)	**Nazir Kherani** (University of Toronto, Canada)
12.00 noon (Invited)	**Giulio Cerullo** (Politecnico di Milano, Italy) *Few-optical-cycle pulses with stable carrier-envelope phase from optical parametric amplifiers*	**Bill Milne and Alex Rozhin**, (University of Cambridge, UK) *Carbon Nanotubes for Photonic Devices*	**Dietmar Borchert**, (Fraunhofer Institut für Solare Energiesysteme ISE, Germany) *Interaction between process technology and material quality during the processing of multicrystalline silicon solar cells*
12.30pm (Invited)	**G. Morthier, W. D'Oosterlinck** and **K. Huybrechts** (Ghent University-IMEC, Belgium) *All-optical flip-flops based on DFB laser diodes and DFB-arrays.*	**Jørn Hvam**, (Technical University of Denmark, Denmark) *Recent Advances in Nanophotonics*	**Rudolf Brueggemann** (Carl von Ossietzky University of Oldenburg,Germany) *Electroluminescence and photoluminescence for the characterisation of solar cells*
1.00pm	**Lunch**		
Topic	**Nonlinear Optical Effects and Applications**	**Nanotubes and quantum dots**	**Photovoltaics**
Chair	**Ajoy Kar** (Heriot Watt University)	**Clive Woods** (Louisiana State University, U.S.A)	**Nazir Kherani** (University of Toronto, Canada) and **Mazhar Bari** (STREP Ltd, Ireland)
2.00pm (Invited)	**J.Gonzalo, C.N. Afonso, J. Solis** and **J.M. Fernandez-Navarro** (Instituto de Optica, Spain) *Advanced Heavy Metal Oxide Film Glasses with Large Optical Nonlinearities*	**Yasuhiko Arakawa** (University of Tokyo, Japan) *Advances in quantum dots for nanophotonic and quantum information devices*	**Pere Roca i Cabarrocas** (LPICM, Ecole Polytechnique, France) *Low temperature plasma deposition of Silicon thin films for solar cells*
2.30pm	**Claudia Dragonetti**, **Stefania Righetto, Dominique Roberto, Renato Ugo, Adriana Valore and Francesco Sannicolò** (Università di Milano, Italy), **Filippo De Angelis, Simona Fantacci and Antonio Sgamellotti** (Istituto di Scienze e Tecnologie Molecolari del CNR, Italy) *Cyclometalated Iridium(Iii) Complexes With Substituted 1,10-Phenanthrolines: A New Class Of*	**N. F. Massé, I. P. Marko, A. R. Adams, S. J. Sweeney** (University of Surrey, UK) *Temperature insensitive Quantum Dot Lasers – Are we really there yet?*	**Paul G. O'Brien, Nazir P. Kherani, Alongkarn Chutinan, Geoffrey A. Ozin, Sajeev John and Stefan Zukotynski** (University of Toronto, Canada) *Silicon Photovoltaics With Photonic Crystal Back Reflectors*

	Complexes With Interesting Nonlinear Optical Properties		
2.50pm	**Asli Karakas** (Selçuk University, Turkey), **Yasemin Yahsi** and **Hulya Kara** (Balikesir University, Turkey) **Ayhan Elmali** (Ankara University, Turkey) *A Manganese(Iii) Transition Metal Complex: Synthesis, Crystal Structure, Spectroscopic Characterization and Nonlinear Optical Properties*	**D. De** (West Bengal University of Technology, India) and **K.P. Ghatak** (University of Calcutta, India) *Einstein Relation in Carbon Nanotubes and Quantum Wires of Nonlinear Optical and Optoelectronic Materials*	**Nara Cho, Sanghyun Paek and Jaejung Ko** (Korea University, Korea), **Md. K. Nazeeruddin** and **Michael Grätzel** (Swiss Federal Institute of Technology, Switzerland) *Molecular Engineering of Organic Dye for Solar Cell*
3.10pm	**Kailash Kasala, Ana Villafranca, Whitney E. Shimmell, Ian B. Burgess** and **Kalaichelvi Saravanamuttu (**McMaster University, Canada) *Nonlinear Optical Phenomena in Polymerisation Systems: From Self-Trapped Beams to Spontaneous*	**Jai Singh** (Charles Darwin University, Australia) *Radiative lifetime of triplet excitations mediated by spin-photon interaction in semiconductors*	**Hari M.Upadhyaya** (Loughborough University, UK), **K. Ravindranathan Thampi and Michael Graetzel** (ISIC, Switzerland) and **Ayodhya N. Tiwari** (ETH Zurich, Switzerland) *Development of flexible dye sensitised solar cells: challenges and strategies **(invited)***
3.30pm	**Afternoon Coffee**		
Topic	**Nonlinear Optical Effects and Applications**	**Polycrystaline bulk and film**	**Nanostructures**
Chair	Andrevi Sapelkin (Queen Mary University of London, UK)	**Mehmet Günes** (Mugla University, Turkey)	**Carl Brown** (Nottingham Trent University)
4.00pm (Invited)	**Tanya M. Monro** (University of Adelaide, Australia) *Developments in soft glass microstructured optical fibres*	**Jas Sanghera and Ishwar Aggarwal**, (Naval Research Laboratory, Washington DC, USA). *Infrared Transmitting Glasses, Ceramics and Optical Fibers*	**Nobuyoshi Koshida**, (Tokyo University of Agriculture & Technology, Japan.) *Photonic, Electronic and Acoustic Devices Based on Nanocrystalline Silicon*
4.30pm	**Ying Lin, Yu Chen and Nan He** (East China University of Science and Technology, China) *and* **Osamu Ito** (Institute of Multidisciplinary Research for Advanced Materials, Japan) *tBu4PcTiO/polymer composite materials: optoelectronic and nonlinear optical responses*	**J. Ibáñez, E. Alarcón-Lladó, R. Cuscó, L. Artús** (Institut Jaume Almera, Spain), **D. Fowler** and **A. Patanè** (University of Nottingham, United Kingdom), **K. Uesugi** and **I. Suemune** (Hokkaido University, Japan) *Lo Phonon-Plasmon Coupled Modes and Carrier Mobilities In Heavily Se-Doped Ga(As,N) Thin Films*	**S. Kokenyesi and D. Beke, K. Sangunni** (Indian Institute of Science, India) **V. Takats, A. Csik and L. Daroczi** (University of Debrecen, Hungary) *Photoinduced Transformations in Amorphous Chalcogenide Nano-Multilayers*
4.50pm	**P. Sagayaraj** (Loyola College, India) **and S. Selvakumar** (Sathyabama University, India) *Studies on the Growth and Characterization of Novel Organometallic NLO Crystals: Cd (HCOO)2.2CS(NH2)2*	**S. Tanemura** and **L.Miao** (Japan Fine Ceramics Centre, Japan) **Y.G.Cao** (Northwestern Polytechnical University, China) *Thickness-Dependent Optical Properties of Indium-Oxide Thin Films*	**V. Pačebutas, K. Bertulis, G. Aleksejenko, and A. Krotkus** (Semiconductor Physics Institute, Lithuania) *Molecular-beam-epitaxy grown GaBiAs for terahertz optoelectronic applications*
5.10pm	**Close**		
6.00pm-8.00pm	**Poster session and buffet dinner**		

ICOOPMA 2007 Oral Sessions

Day 2: Tuesday 31 July 2007

9.00am (Plenary)	**David J Lockwood FRS** (National Research Council, Canada) *Luminescence in Silicon Nanostructures* Chair: **Stephanie Haywood** (University of Hull) Venue: The Skeel lecture theatre		
Session	**I** The Skeel lecture theatre	**II** People's Palace Lecture Theatre I	**III** People's Palace Lecture Theatre II
Topic	**Novel phenomena** **(**Selected topics)	**Organic photonics**	**Semiconductors for Optoelectronics**
Chair	**Ravi Pandey** (Michigan Technological University, U.S.A.)	**Suchi Guha** (University of Missouri, USA	**Arounas Krotkus** (**Semiconductor Physics Institute, Lithuania**)
10.00am (Invited)	**Miguel Levy, Amir A. Jalali and Xiaoyue Huang (**Michigan Technological University, Houghton, U.S.A.) *Magnetophotonic Crystals: Nonreciprocity,birefringence and Confinement*	**Claudia Ambrosch-Draxl**, (University of Leoben, Austria) *Tailoring the optical properties of organic semiconductors*	**Richard Jones** (Intel, USA) *Silicon Photonics: Materials and Devices, and Recent Advances*
10.30am (Invited)	**Jaroslav Fabian (**University Regensburg, Germany) *Semiconductor Spintronics Devices*	**Ananth Dodabalapur, Liang Wang, Daniel Fine, and Debarshi Basu** (The University of Texas at Austin, Austin, USA) *Scaling Behavior and Transport Phenomena in Organic and Polymer Transistors*	**Harry Ruda, Joe Salfi, Usha Philipose, Alex Shik, Christina de Souza, Stephane Aouba, Selvakumar Nair, Ankur Saxena, Suxia Yang, Li Zhong, Ping Sun, and Carlos Fernandes** (University of Toronto, Canada) Transport and Optical Response Of Single Nanowires
11.00am	**Morning Coffee**		
Topic	**Modelling** **(Selected topics)**	**Organic photonics**	**Semiconductors for Optoelectronics**
Chair	**Ravi Pandey** **(**Michigan Technological University, U.S.A.)	**Suchi Guha** (University of Missouri, USA	**Stephen J Sweeney** (University of Surrey)
11.30am (Invited)	**M. Frumar, J. Prikryl, M. Hrdlicka, Mil. Vlcek, L. Benes, B. Frumarova, T. Wagner and P. Nemec** (University of Pardubice, Czech Republic) *Phase Change Memory Materials and The Mechanism of Their Solidification*	**Michael Winokur** (University of Wisconsin, USA) *The Role of Nematic Order in Conjugated Polymer Spectroscopy*	**Andrew Knights** (McMaster University, Canada) *Progress in Silicon Photonics: Materials and Devices*
12.00 noon	**D.E. Schaub** and **D.R. Oliver** (University of Manitoba, Canada) *Fast Calculation of PBG Characteristics using the Rayleigh Multipole Method*	**Nan He, Yu Chen and Ying Liu** *(East China University of Science and Technology, China)* **J.J. Doyle and W.J. Blau** (*Trinity College Dublin, Ireland)* *Phthalocyanine/Polymer Composite Materials for Laser Protection*	**Kevin Robbie, Jian Yang, Tim Brown, and Cristina Buzea** (Queen's University, Canada) Engineered optical anisotropy in nanostructured thin films
12.20pm	**A.B. Khanikaev and A.V.**	**Enrico Da Como** and **Klaus**	**P.E. Jessop, L.K. Rowe, S.M.**

	Baryshev (Toyohashi University of Technology, Japan), **A. B. Granovsky and M. Inoue** (Moscow State University, Russia) *Magneto-Optical Faraday Effect of One-Dimensional Periodically nanostructured Metals*	**Becker** (Ludwig-Maximilians-Universität, Germany), **John M. Lupton** *(University of Utah, USA)* and **Jochen Feldmann** *(Ludwig-Maximilians-Universität, Germany). Influence Of Intrachain Crystallinity On Exciton Dephasing In Single Polyfluorene Nanowires*	**McFaul, A.P. Knights** (McMaster University, canada) and **N.G. Tarr** (Carleton University, Canada) *Monolithic Integration of Sub-bandgap Detection, Signal Amplification and Optical Attenuation on a Silicon Photonic Chip*
12.40pm	**Ehab Abdel-Rahman and Amr Shaarawi** (The American University in Cairo, Egypt) *Defect Mode in Periodic and Quasiperiodic 1-Dimensional Photonic Structures*	**Pavel Prunici and Peter Hess** (University of Heidelberg, Germany) *IR-UV Ellipsometry of Organic Monolayers On Silicon and their Photo-Oxidation*	**Igor Konovalov** and **Liudmila Makhova** (Universität Leipzig, Germany) *Valence Band Offset Between CuI and Indium Sulfides*
1.00pm	**Lunch**		
Topic	**Waveguides, Fibers and Applications**	**Organic photonics**	**Imaging devices: materials and physics**
Chair	**Asim K Ray** (Queen Mary, University of London)	**Kalaichelvi Saravanamuttu** (McMaster University, Canada)	**Derek R Oliver** (University of Manitoba, Canada)
2.00pm (Invited)	**M. A. Reed, A. Sanders, M.H. van der Veen, J. Merrill, and E.R. Dufresne** (Yale University, USA) *Plasmonic Waveguides: A New Approach to Sub-Wavelength Optics*	**M. A. Uddin and H. P. Chan** (City University of Hong Kong, Hong Kong) *The Challenges in the Fabrication of Reliable Polymer Photonic Devices*	**J.A. Rowlands** (Sunnybrook Health Sciences Centre, Canada) and **K. Tanioka** (NHK Science & Technical Research Laboratories, Japan) *Avalanche Multiplication in Amorphous Selenium and its Application in Imaging Devices*
2.30pm	**G. S. Kliros** (Hellenic Air-Force Academy, Greece) and **P. C. Divari** (University of Ioannina, GR-Greece) *Coupling Characteristics of Laser Diodes to High Numerical Aperture Thermally Expanded Core Fibers*	**K. Pavani, I. Naydenova, R. Howard, S. Martin and V. Toal** (Dublin Institute of Technology, Ireland)*Fabrication of Switchable Liquid Crystal Devices Using Surface Relief Gratings in the Photopolymer*	**A. Reznik** (Sunnybrook Health Sciences Centre, Canada), **S. D. Baranovskii** *(Philipps University Marburg, Germany)*, O. Rubel, **V. Lyubin** (Sunnybrook Health Sciences Centre, Canada), **M. Klebanov, R. E. Tallman** (*Ben-Gurion University of Negev, Israel)* **B. A. Weinstein** (State University of New YorkY at Buffalo, USA) and **J. A. Rowlands** (Sunnybrook Health Sciences Centre, Canada) *Reversible vs. Irreversible Photodarkening in Amorphous Selenium: The Kinetics Study*
2.50pm	**Janis Teteris** (University of Latvia, Latvia) *Immersion Holography Based on Amorphous Chalcogenide Films*	**R.H.C. Tan, Y. Zheng, J. Pearson, M. Motevalli, W.P. Gillin, P.B. Wyatt** ((Queen Mary, University of London, London, UK) *Going organic – Fluorinated lanthanide complexes for optoelectronics*	**A. Florez, L. M. Guerrero and M. Brick** (University of Tartu, Estonia) *Characterization of Er+3 Doped Fluoroindate And Flurophosphate Glasses for Laser Applications*
3.10pm	**John S. Marsland** (University of Liverpool, UK) **Resonance Effects on Gain And Noise in Avalanche Photodiodes**	**Costas Tsakonas, Andrew Davidson, Gary Wells and Carl Brown** (Nottingham Trent University, UK) and **Nigel Mottram** (University of Strathclyde, Glasgow G1 1XH, Scotland, UK)	**Ki Seo Kim, Je Hwang Ryu, Chang Suk Lee, Jin Jang, and Kyu Chang Park (Kyung Hee Unioversity, Korea) Stable electron emission of carbon nanotube emitter arrays after constant bias-aging**

		Multistable Switchable Photonic Devices	
3.30pm	**Afternoon Coffee**		
Topic	**Sol gel optoelectronics**	**Organic photonics**	**Experimental Techniques**
Chair	**Simon Hodgson** (University of Teesside**)**	**Hau Ping Chan** (City University of Hong Kong, Hong Kong)	**Asa Barber** (Queen Mary, University of London)
4.00pm (Invited)	**Mayasuki Nogami** (Nagoya Institute of Technology, Japan) *Nonlinear optical emission properties of sol-gel-derived glasses*	**Hiroyoshi Naito** (Osaka Prefecture University, Japan) *Characterization of Polymer Light-Emitting Diodes by Impedance Spectroscopy*	**Peter Hess (**University of Heidelberg, Germany) *Submonolayer spectroscopy and mass spectrometry of functionalized silicon: tailoring physical and chemical surface properties*
4.30pm (Invited)	**Rui M. Almeida, Ana C. Marques** and **M. Clara Gonçalves** (Instituto Superior Técnico, Portugal) *Rare Earth-Doped Photonic Crystals Via Sol-Gel*	**Z.H. Lu** (University of Toronto and Norel Optronics, Canada) Superluminescent Organic Light-Emitting Diodes based on Fullerene-based Charge Injection Materials	**Roger A. Lewis** and **L. J. Bignell** (University of Wollongong, Australia) *Reflectance Studies of Candidate THz emitters*
5.00pm	**Close**		
6.00pm-8.00pm	**Poster session and buffet dinner**		

ICOOPMA 2007 Oral Sessions

Day 3: Wednesday 1 August 2007

9.00am (Plenary)	**Osamu Wada** (Kobe University, Japan) Semiconductor quantum dots and nanostructures for photonic device applications Chair: **John Simmons** (McMaster University) Venue: The Skeel Lecture Theatre		
Session	**I** The Skeel lecture theatre	**II** People's Palace Lecture Theatre I	**III** People's Palace Lecture Theatre II
Topic	**Optoelectronic Materials and Devices**	**Experimental Techniques**	**Luminescence and Excitonic Processes**
Chair	**Animesh Jha** (University of Leeds)	**Alex Moewes** (University of Saskatchewan, Canada)	**Jai Singh** (Charles Darwin University, Australia)
10.00am (Invited)	**I.H. White, R.V. Penty and M G Thompson** (University of Cambridge, UK) *High Speed Quantum Dot Mode Locked Lasers*	**Frank A. Hegmann** (University of Alberta, Canada) and **David G. Cooke (**Technical University of Denmark, Denmark) Using Terahertz Spectroscopy to Probe Carrier Dynamics And Localization In Semiconductor Materials	**Keiji Tanaka, A. Saitoh, N. Terakado** and **H. Asao** (Hokkaido University, Japan) *Photoinduced phenomena in Group VIb glasses*
10.30am (Invited)	**Jean-Luc Adam** (UMR CNRS 6226 Sciences de Rennes, France) *Progress in chalcogenide glasses for infrared applications*	**P. Thomas, P. Bozsoki, M. Kira, W. Hoyer, T. Meier, S.W. Koch (Philipps-University Marburg, Germany), K. Maschke** (Ecole Polytechnique Fédérale, Switzerland), **I. Varga** (Elméleti Fizika Tanszék, Hungary), **H. Stolz** (Universität Rostock, Germany) *Investigating disorder in semiconductor quantum structures using angular photonic correlation in spontaneous emission*	**K. Kohary, V.M. Burlakov**, and **D.G. Pettifor** (University of Oxford, UK) *Structural optimization of organic light-emitting diodes incorporating nanocrystal quantum dots*
11.00am	**Morning Coffee**		
11.20am	**F. Surre, S.Latkowski and P. Landais** (Dublin City University, Ireland), **R. Maldonado-Basilio** (CICESE Research Centre, Mexico), **S.A. Lynch** (University of Cambridge, UK) *Generation of THz signal from Four-Wave-Mixing in Multimode Lasers due to Material non-linearities*	**D. L.-H. Kong, A. R. L. Travis** (University of Cambridge, UK) *Limits on A Bent Waveguide For A Wedge Display*	**T. Aoki, N. Ohrui, S. Kobayashi** and **C. Fujihashi** (Tokyo Polytechnic University, Japan), and **K. Shimakawa** (Gifu University, Japan) *Different field-dependence of geminate and non-geminate recombination in photoluminescence (PL) of a-Si:H*
11.40am	**Stanislava Janáková and Jarmila Špirková and Martin Míka** (Institute of Chemical Technology, Czech Republic) *Properties of chromium ions containing novel silicate glasses*	**D. M. Snyder and J. M. Thomsen** (Eastern Michigan University, USA) *Laser Surface Thermal Lensing (STL) - An Optical Technique For Surface Analysis Of Thermomechanical Properties of Transparent Polymers*	**Jeppe Johansen, Søren Stobbe, Jørn M. Hvam** and **Peter Lodahl** (*Technical University of Denmark, Denmark)* *Modified Local Density of Optical States as a Diagnostic Tool for Quantum Dot Decay Dynamics*
12.00pm	**Special session for science students in Schools** Chair: **Dr Francisca Wheeler** (St. Clement Danes School and Queen Mary, University of London UK)		
1.00pm	**Lunch**		
2.00pm - 6.30pm	**Excursions**		
7.00 - 9.00pm	**Multicultural Evening and buffet dinner** The Octagon, Queens' Building, Queen Mary University of London, Mile End Campus.		

ICOOPMA 2007 Oral Sessions

Day 4: Thursday 2 August 2007

9.00am (Plenary)	**Sajeev John** (University of Toronto, Canada) *Photonic Band Gap Materials: Semiconductors of Light* Chair: **Stephen Watts** (University of Manchester) Venue: The Skeel lecture theatre		
Session	**I** The Skeel lecture theatre	**II** People's Palace Lecture Theatre I	**III** People's Palace Lecture Theatre II
Topic	**Nanostructures**	**Experimental Techniques**	**Quantum Dots, Nanophotonics**
Chair	**John S. Marsland** (University of Liverpool, UK)	**William Gillin** (Queen Mary University of London)	**Jørn Hvam** (Technical University of Denmark, Denmark)
10.00am (Invited)	**Jong Heo, Chao Liu** and **Yong Gon Kw** (Pohang University of Science and Technology, South Korea) *Novel nano-structured glasses containing semiconductor quantum dots*	**Alex Moewes** (University of Saskatchewan, Canada) *Synchrotron Characterization of Optical and Electronic Properties of Materials: Recent Advances and Examples*	**Helge Weman** (Norwegian University of Science and Technology, Norway), **S. Palmgren, K.F. Karlsson** and **E. Kapon** (Swiss Federal Institute of Technology, Switzerland), **D. Dasa, and B.-O. Fimland** (Norwegian University of Science and Technology, Norway) *Semiconductor Quantum-Wires and Nano-Wires for optoelectronic Applications*
10.30am (Invited)	**Mitsuo Yamaga, Yusuke Ohsumi** and **Tomomi Nakayama** (Gifu University, Japan), **Nobihiro Kodama** (Akita University, Akita Japan) and **Thomas P.J. Han** (University of Strathclyde, UK) *Long-LastingPhosphorescencein Ce-Doped Oxides*	**Michael Thewalt** (Simon Fraser University, Canada) *Highly Enriched 28Si: a New Paradigm for High Resolution Semiconductor Spectroscopy*	**Stefan Mátéfi-Tempfli**, (Université Catholique de Louvain, Belgium) *Nananowires and nanostructures fabrication using template methods. A step forward to real devices combining electrochemical synthesis with lithographic techniques*
11.00am	**Morning Coffee**		
Session	**I** The Skeel lecture theatre	**II** People's Palace Lecture Theatre I	**III** People's Palace Lecture Theatre II
Topic	**Organics optoelectronics**	**Transparent Electrodes**	**Thin Films**
Chair	**Natalie Stingelin-Stutzmann** (Queen Mary University of London)	**Simon Hodgson** (University of Teesside**)**	**Ton Peijs** (Queen Mary University of London)
11.30am (Invited)	**Junji Kido** (Yamagata University, Japan) *Design and Fabrication of High Performance OLEDs for Lighting Applications*	**Masahiro Hirano** (Tokyo Institute of Technology, Japan) *Small Work function (2.4eV) of a room-temperature stable electride C12A7:e- and Its Application to displays*	**Michael F. Rubner** (Massachusetts Institute of Technology, USA) *Thin Film Optical Coatings from Functional Nanoparticle Multilayers*
12.00 noon	**S. Guha, M. Arif and S. Gangopahdyay** (University of Missouri-Columbia, USA) and **U. Scherf** (Bergische Universität Wuppertal, Germany) Space-Charge-Limited	**K. Shimakawa** and **T. Itoh** (Gifu University, Japan) *Free carrier absorption in transparent conductive oxides: Effects of grain boundary*	**Dominik Danieluk, A. Mitra and A.L. Bradley** (Trinity College, Ireland), **P.J. McNally, L. O'Reilly, O. F. Lucas, G. Natarajan, S. Daniels, E.McGlynn, A. Cowley, B. Foy**

	Conduction in Ethyl-Hexyl Substituted Polyfluorene		(Dublin City University, Ireland) and **D.C. Cameron** (Lappeenranta University of Technology, Finland) *Optical properties of CuCl on Si substrates – toward UV photonic devices*
12.20pm	**Wen-Hsi Lee, C.C. Wang, W. T. Chen** and **Y. C. Lee** (National Cheng Kung University, Taiwan) High performance OTFTs Using Surface-Modified Nanocomposite Dielectric Gate Insulator	**Eduard Feldbach, Viktor P. Denks, Marco Kirm, Peeter Liblik, Aarne Maaroos, Hugo Mändar, Tea Avarmaa** and **Kristjan Kunnus** (University of Tartu, Estonia) *VUV and Cathodoluminescence Spectroscopy of C12A7*	**Thomas G. Mayerhöfer** (Friedrich-Schiller Universität Jena, Germany), **Vladimir Ivanovski** (Sts. Cyril and Methodius University, Macedonia) and **Jürgen Popp** (Institut für Photonische Technologien e.V., Germany) *Determination of Longitudinal Optical Constants*
12.40pm	**P. Sagayaraj and Ginson P. Joseph (**Loyola College, India) *Investigations on the Physicochemical Properties of Thiocyanate And Allylthiourea Complex Crystals for Blue-Violet Laser Light Generation*	**S. Giurgola and P. Vergani** and **F. Lucchi** (Avanex Corp., Italy), and **V. Pruneri** (Institut de Ciencies Fotoniques, Spain) *Ultra Thin Nickel Transparent Electrodes*	**Beena Mary John, Rani Joseph, K. Sreekumar and C. Sudha Kartha** (Cochin University of Science and Technology, India). *Effect of Chromium Doping on the Diffraction Efficiency of Methylene Blue Sensitized Pva/Acrylamide Films.*
1.00pm	**Lunch**		
Topic	**Semiconductors for Optoelectronics and Thin Films**	**Optical properties of materials**	**Luminescence and Excitonic Processes**
Chair	**Richard Jones** (Intel, USA)	**Paul E. Jessop** (McMaster University, Canada)	**Harbhajan Singh Bhatti** (Punjabi University, India)
2.00pm (Invited)	**Shubhra Gangopadhyay Suchi Guha, Keshab Gangopadhyay and Maruf Hossain** (University of Missouri, USA) *Novel Processes For Low Temperature Crystallization of A-Si:H and A-SiC:H for Optoelectronic Applications*	**Zhongyu Zheng, Bingying Cheng, Daozhong Zhang,** and **Qingbo Meng** (Institute of Physics, Chinese Academy of Sciences, China) Pressure controlled self-assembly of high quality opals and inverse opals	**Stephen W.S. McKeever**, Oklahoma State University, USA. *Induced Luminescence for Dosimetry: Recent Advances*
2.30pm	**Katsuhiko Saito, Kouji Yamaguchi, Tooru Tanaka, Mitsuhiro Nishio, Qixin Guo** and **Hiroshi Ogawa** (Saga University, Japan) *Post-annealing effect upon electrical and optical properties of MOVPE grown P-doped ZnTe homoepitaxial layers*	**A. V. Baryshev, A. B. Khanikaev, R. Fujikawa, H. Uchida, M. Inoue** (Toyohashi University of Technology) Diffraction Processes in 3-D Photonic Crystals Based on Thin Opal Films	**S. Mridha** and **D. Basak** (Indian Association for the Cultivation of Science, India) *Photoresponse of n-ZnO/p-Si heterojunction towards ultraviolet/visible lights: thickness dependent behavior*
2.50pm	**L. Miao, F.Y.Ran, S.Tanemura, M.Tanemura** (Nagoya Institute of Technology, Japan) *Spectroscopic Ellipsometry Analysis of Er-Doped ZnO Thin Films*	**A Jha** and **S Shen** (University of Leeds) *Lattice Strain Dependent Optical Transitions in Ho3+-ion doped Barium Strontium Titanate Thin Films*	**C P Jisha and V C Kuriakose** (Cochin University of Science and Technology, India), **K Porsezian** (Pondicherry University, India) *Four Wave Mixing Induced Modulational Instability In Photorefractive Media*
3.10pm	**Gurinder Kaur, Fengping Wang, David W. Shoesmith, Martin Z. Allmang and Zhifeng Ding** (University of Western Ontario,	**Shoji Yamamoto and Jun Ohara** (Hokkaido University, Japan) *Optical Observations of New Halogen-Bridged Platinum*	**G. V. M. Williams, A. Edgar, C. Dotzler** and **S. Raymond** (MacDiarmid Institute, New Zealand)

	Canada) *Second Harmonic Generation Studies on amorphous Se-Te-Sb System*	*Complexes Assembled Within a Ladder Lattice*	*Optically Rewritable Bragg Gratings in Mn2+ Doped RbCdF3*
3.30pm	**Afternoon Coffee**		
Topic	**Phosphors and Applications and selected topics**	**Waveguides and Fibers**	**Luminescence and Excitonic Processes**
Chair	**C Sudha Kartha** (Cochin University of Science & Technology, India)	**Raman Kashyap** (Ecole Polytechnique, Canada)	**Kyu Chang Park** **(**Kyung Hee Unioversity, Korea)
3.50pm (Invited)	**Dirk Poelman**, (Ghent University, Belgium) *Advances in Inorganic Phosphors for Displays and Lighting*	**Isabel C. S. Carvalho (**Pontifícia Universidade Católica do Rio de Janeiro, Brazil**) Michael Fokine** (Politecnico di Torino, Italy)**, Cristiano M. B.Cordeiro** (UNICAMP, Brazil)**, Raman Kashyap** (Ecole Polytechnique, Canada) *Low Cost Boro-Silicate Glasses for Photonics Applications*	**Heinz von Seggern** (University of Darmstadt University, Germany) *Sensitization and Radiation Hardening of the X-ray Storage Phosphor CsBr:Eu2+*
4.20pm (Invited)	**Setsuhisa Tanabe** (Kyoto University, Japan) *Glass ceramic phosphors for solid-state lighting*	**W. Margulis, O. Tarasenko, H. Knape, N. Myren, E. Zetterlund** and **Å. Claesson** (Acreo,, Sweden) *Electrical Control of Light in Fibre-based Components*	**S. Kugler and R. Lukács** (Budapest University of Technology and Economics, Hungary) *Microscopic and macroscopic models of photoinduced volume changes in chalcogenides*
4.50pm	**M. Vlcek** (University of Pardubice, Czech Republic), **S. Schroeter**, **S. Brueckner**, **S. Fehling** (Institute of Photonic Technology, Germany) and **A. Fiserova** (University of Pardubice, Czech Republic) *DIRECT Fabrication of Surface Relief Gratings in Chalcogenide Glasses by Excimer Laser Interference Lithography*	**Nakeeran Ponnampalam** and **Ray G. DeCorby** (University of Alberta) *Hybrid metal-dielectric omnidirectional reflectors*	**Harbhajan Singh Bhatti** (Punjabi University, India) *Laser Induced Photoluminescence and Morphological Characterization of Cd(1-x)-yZnxMnyS Nanocrystals* ***(invited)***
5.10pm	**Close**		
7.00pm	**Conference Dinner** **After dinner speaker: Professor Peter J Dobson** (Oxford University Begbroke) Chair: **Professor Safa Kasap** (University of Saskatchewan, Canada)		

ICOOPMA 2007 Oral Sessions

Day 5: Friday 3 August 2007

9.00am (Plenary)	**Shuji Nakamura** (University of California, Santa Barbara, USA) Recent Performance of Nonpolar/Semipolar/Polar GaN-based Blue LEDs and LDs Chair: **Chris F. McConville** (*University of Warwick, UK*)		
Session	**I** The Skeel lecture theatre	**II** People's Palace Lecture Theatre I	**III** People's Palace Lecture Theatre II
Topic	**Semiconductors for Optoelectronics**	**Optoelectronic Devices**	**Polycrystaline bulk and Amorphous**
Chair	**Keiji Tanaka** (Hokkaido University, Japan)	**Durga Basak** (Association for the Cultivation of Science, India)	**Armando Luches** (Lecce University, Italy)
10.00am (Invited)	**Ashok Vaseashta** (Marshall University, USA) *Nanoscale Materials, Devices and Systems for Energy Generation and Storage*	**Raman Kashyap** (Ecole Polytechnique, University of Montreal, Canada) *Progress in Bragg Grating Optical Fiber Sensors*	**Roberto Teghil** (University of Basilicata, Italy) *Femtosecond Pulsed Laser Deposition of Inorganic Electrochromic Materials*
10.30am (Invited)	**Ben Ruck, Joe Trodahl, Andrew Preston, Simon Granville** and **Felix Budde** (Victoria University, New Zealand), **Tony Bittar** and **Grant Williams** (Industrial Research Ltd., New Zealand), **James Downes** (Macquarie University, Australia), **Kevin Smith** (Boston University, USA), **Walter Lambrecht** (Western Reserve University, USA) *Electronic and Optical Properties of Rare Earth Nitrides*	**Jamal Deen** (McMaster University, Canada) *High Sensitivity Photodetection Systems for Biological/Medical Applications*	**Maurizio Martino and Anna Paola Caricato** (University of Salento, Italy), Roberto Rella (Istituto per la Microelettronica ed i Microsistemi CNR, Italy), **Marco Anni** (University of Salento, Italy) *Pulsed Laser Deposition of Organic, Inorganic and Biological Materials*
11.00am	**Morning Coffee**		
Topic	**Semiconductors for Optoelectronics**	**Wide bandgap materials**	**Polycrystaline bulk and Amorphous**
Chair	**Mark Baxendale** (Queen Mary University of London, UK)	**Mike Reece** (Queen Mary University of London, UK)	**Kevin Robbie** (Queen's University, Canada)
11.20am (Invited)	**Sergei Baranovski** (Philipps University Marburg, Germany) *Impact Ionization Phenomena in Disordered Systems Related to the Avalanche Multiplication and Switching Effect*	**Takayuki Makino** (University of Hyogo, Japan) *Optical Properties of ZnO and their Extension to the Ultraviolet Optoelectronic Application*	**Frank van Veggel** (University of Victoria, Canada) *Lanthanide(III)-Based Photonic Materials and Their Applications*
11.50 noon	**P.D.C. King, T.D. Veal and P.H. Jefferson** (*University of Warwick, United Kingdom)*, **Hai Lu** and **W.J. Schaff** (*Cornell University, USA*), **C.F. McConville** *(University of Warwick, United Kingdom)* *Surface electronic properties of n- and p-type InN and InGaN alloys*	**Min-Chang Jeong, Sang-Won Lee, Ji-Min Seo, and Jae-Min Myoung** (Yonsei University, Korea) *ZnO film/ZnO nanowire arrays/GaN film Heterojunction Light-Emitting Diodes*	**F. Romano, A.P. Caricato, D. Valerini, T. Tunno** and **M. Martino** (University of Salento, Italy), **C. Quan** and **J. Heo** (Pohang University of Science and Technology) *Binary And Ternary Heavy Metal Oxide Thin Films Deposited by Pulsed Laser Deposition*
12.10pm	**Moon-Ho Ham** (Yonsei University, Korea), **Sukho Yoon**	**Myo Than Htay, Yuji Tani, Yoshio Hashimoto, Kentaro Ito**	**C. Vasiliu** (National Institute for Optoelectronics, Romania), **G.**

	and Yongjo Park (Samsung Advanced Institute of Technology, Korea), **Lifeng Bian and Manfred Ramsteiner** (Paul-Drude-Institut fuer Festkoerperelektronik, Germany) and **Jae-Min Myoung** (Yonsei University, Korea) *Nitride-based spin-polarized light-emitting diode with room-temperature ferromagnetic (Ga,Mn)N*	(Shinshu University, Japan) Synthesis of Optical Quality ZnO Nanowires *Utilizing Ultrasonic Spray Pyrolysis*	**Epurescu** (National Institute for Laser, Plasma and Radiation Physics), **M.Elisa** (National Institute of Glass), **C. E. A. Grigorescu, H. Niciu, R. Pascu, M. Filipescu, M. Dumitru, M. Dinescu, G. Pavelescu** (National Institute for Optoelectronics, Romania) *Optical Properties of Rare Earth-Doped Thin Films Of Phosphate Glasses Prepared By Pulsed Laser Deposition Technique*
12.30pm	**J. Chamings, S.Ahmed, S.J. Sweeney** (University Of Surrey, United Kingdom), **V.A. Odnoblyudov and C.W. Tu** (University of California at San Diego, USA), **K. Volz and W. Stolz** (Phillips University, Germany) *Dilute Nitride Phosphide Photonic Devices*	**S. C. Hung and P. J. Huang** (National Central University, Taiwan) **C.J. Pan** (Chung Yuan Christian University, Taiwan), **G. C. Chi** (National Central University, Taiwan), **C. E. Chan** (Chung Yuan Christian University, Taiwan), and **S. M. Lan** (Institute of Nuclear Energy Research, Taiwan) *Characteristics of ZnO nanostructures grown on p-type GaN and Si by MOCVD*	**K.V. Koughia and S.O. Kasap** (University of Saskatchewan, Canada) *Excitation Diffusion In GeGaSe Glasses Heavily Doped With Er3+*
12.50pm	**Conference Close and Lunch**		
1.30pm	**Excursions**		

Friday 10th August 2007

ICOOPMA 2007

International Conference on Optical, Optoelectronic and Photonic Materials and Applications

ICOOPMA 2007 Poster Presentations

Day 1: Monday 30 July 2007

Next >

Where:	The Octagon, Queens' Building, Queen Mary University of London, Mile End Campus.
Poster Panel:	**Claudia Ambrosch-Draxl,** University of Leoben, Austria **Yasuhiko Arakawa,** University of Tokyo, Japan **Asa Barber,** Queen Mary University of London**,** UK **Jamal Deen**, Mcmaster University, Canada **Paul Hogg**, Queen Mary University of London, UK (**Chair**) **Miguel Levy,** Michigan Technological University, U.S.A **Tanya M. Monro,** University of Adelaide, Australia **Jean-Luc Adam**,UMR CNRS 6226 Sciences de Rennes, France **Harry Ruda**, University of Toronto, Canada **Mark A. Reed,** Yale University, USA **Ashok Vaseashta**, Marshall University, USA

P001 Electroluminescent Properties of Chemically Synthesized Zinc Sulphide Nanocrystals Doped with Manganese: Daisuke Adachi, Takeshi Hama, Toshihiko Toyama and Hiroaki Okamoto (Osaka University, Japan)

P002 Theoretical Study of the Influence of PCBM Nanostructure in Organic Solar Cell Performance: Marta M. D. Ramos and Hélder M. C. Barbosa (University of Minho, Portugal).

P003 Diffusion Process Applied in Fabrication Of Ion-Exchanged Optical Waveguides in Novel Er3+ And Er3+/Yb3+-Doped Silicate Glasses: Blanka Svecova, Jarmila Spirkova and Martin Mika (Institute of Chemical Technology, Czech Republic).

P004 ~2 Mm Tm3+/Yb3+-Doped Tellurite Fibre Laser: Billy Richards, Yuen Tsang, David Binks, Joris Lousteau and Animesh Jha (University of Leeds)

P005 Drop on Demand printing of materials with micrometre accuracy and resolution: Mark Paine, Matthew Alexander, Katherine Smith and John P. W. Stark (Queen Mary, University of London, London, UK)

P006 Peculiarities of the Thermal Activation of Carriers in CdSe/ZnSe QD Structures: L. Borkovska, N. Korsunska and Ye. Venger (V. Lashkaryov Institute of Semiconductor Physics, Ukraine), Yu. Sadofyev and I. Kazakov (P.N. Lebedev Physical Institute, Russia) and T. Kryshtab (Instituto Politecnico Nacional, Mexico).

P007 Crystal Field Analysis of Cr3+ Energy Levels in ZnAl2S4 and ZnGa2O4: M.G. Brik (Institute of Physics, Estonia), N.M. Avram and C.N. Avram (West University of Timisoara, Romania).

P008 Effect of The Odd Intensity Parameters and Optical Properties of Tb3+ Doped Fluoroindate Glasses: A. Flórez (Universidad Industrial de Santander, Colombia), M. Brik (Kwansei Gakuin University, Japan) and C. E. Estupiñán and A. I. Ballesteros (Universidad Industrial de Santander, Colombia)

P009 Morphology and Optical Properties of Zinc Oxide Thin Films Grown On Si (100) by Metal-Organic Chemical Vapour Deposition: S. M. Lan (Institute of Nuclear Energy Research, Taiwan), C. E. Chan W. Y. Uen (Chung-Yuan Christian University, Taiwan), K. J. Chang and S. C.

Hung (National Central University, Taiwan), Z. Y. Li, T. N. Yang and C. C. Chiang (Institute of Nuclear Energy Research, Taiwan), G. C. Chi4 and C. Y. Chang (National Central University, Taiwan).

P010 Zinc Oxide Templates Grown on p-Si (100) Substrates with Various Growth Temperatures by Atmospheric Pressure Metal-Organic Chemical Vaper Deposition: S. C. Hung (National Central University, Taiwan), C. E. Chan (Chung Yuan Christian University, Taiwan), S. M. Lan and C. C. Chiang (Institute of Nuclear Energy Research, Taiwan), G. C. Chi (National Central University, Taiwan).

P011 Erbium Doped Chalcogenide Thin Films Fabricated By Pulsed Laser Deposition: P K Dwivedi, Y. Y. Tsui and R G Decorby (University of Alberta, Canada) C J Haugen (TRLabs, ,Edmonton, AB, Canada) and D Tonchev and S O Kasap (University of Saskatchewan, Canada)

P012 The Influence of CsBr Addition on Optical Properties of Gegas Glass Doped With Er: Z.G. Ivanova (Bulgarian Academy of Sciences, Bulgaria), K.V. Koughia (University of Saskatchewan, Canada), Jong Heo (Pohang Univeristy of Science and Technology, Republic of Korea), D. Tonchev and S.O. Kasap (University of Saskatchewan, Canada)

P013 Luminescence Characterization of Ultrathin MgO Films Of High Crystallinity Prepared By Pulsed Laser Deposition: Eduard Feldbach, Raivo Jaaniso, Margus Kodu, Viktor P. Denks, Aarne Kasikov, Peter Liblik, Aarne Maaroos, Hugo Mändar and Marco Kirm (Institute of Physics, University of Tartu, Estonia).

P014 Films and Crystalline Powder of PbI2 Intercalated With Ammonia and Pyridine: N.Preda, L.Mihut, M.Baibarac and I.Baltog (National Institute for Physics of Materials, Romania) R.Ramer (University of New South Wales, Australia) and C.Andronescu and V.Fruth (Institute of Physical Chemistry, Romania).

P015 Enhancement of Faraday Rotation in A 3d/Garnet/1d Photonic Structure: R. Fujikawa, A. V. Baryshev, A. B. Khanikaev, H. Uchida and M. Inoue (Toyohashi University of Technology, Japan).

P016 Plasmon Assisted Enhancement Of Faraday Rotation in Au/Bi:YIG Nanocomposites: R. Fujikawa, A. V. Baryshev, A. B. Khanikaev, H. Uchida and M. Inoue (Toyohashi University of Technology, Japan)

P017 Effects of Growth Temperature on the Properties of (11-20) ZnO Thin Films on R-Plane Sapphire Substrates By Plasma-Assisted Molecular Beam Epitaxy: Seok Kyu Han (Chungnam National University, Korea), Jae Wook Lee (Korea Advanced Institute of Science and Technology, Korea), Jae Goo Kim, Sang Mo Yang and Dong-Suk Kang and Soon-Ku Hong (Chungnam National University, Korea), Jung-Hoon Song (Kongju National University, Korea), Jeong Yong Lee(Korea Advanced Institute of Science and Technology, Korea), Takafumi Yao (Tohoku University, Japan).

P018 Structural and Luminescent Property of Gallium Chalcogenides GaSe1-XSx Layer Compounds: C. H. Ho and S. T. Wang (National Dong Hwa University, Taiwan), Y. S. Huang and K. K. Tiong (National Taiwan Ocean University, Taiwan)

P019 Growth and Characterization of Well-Aligned Titanium Dioxide Nanocrystals Via Metal Organic Vapour Deposition: C. A. Chen, Y. S. Huang And D. S. Tsai (National Taiwan University of Science and Technology, Taiwan) and K. K. Tiong (National Taiwan Ocean University, Taiwan).

P020 Raman Scattering Study of The Phase Transformation On Nanostructured Titania Prepared via Metal Organic Vapour Deposition: C. A. Chen, Y. S. Huang, W. H. Chung and D. S. Tsai (National Taiwan University of Science and Technology, Taipei 106, Taiwan), K. K. Tiong (National Taiwan Ocean University, Taiwan).

P021 Dilute (In,Ga)(As,N) Thin Films Grown By Molecular Beam Epitaxy On Non-(100) Gaas Substrates: A Raman-Scattering Study: J. Ibáñez, E. Alarcón-Lladó, R. Cuscó, L. Artús (Institut Jaume Almera, Spain), M. Henini (University of Nottingham, United Kingdom), and M. Hopkinson (University of Sheffield, United Kingdom).

P022 Novel Silicate Glasses Doped By RE3+ For M-IR Applications: Stanislava Janáková, Jarmila Špirková and Martin Míka (Institute of Chemical Technology), Jiří Oswald (Czech Academy of Sciences, Czech Republic).

P023 Impedance Imaging for the Interrogation of Biosensor Arrays: Yinglin Zhou, Shihong Jiang, Steffi Krause (Queen Mary, University of London, London, UK) and Jean-Noël Chazalviel (CNRS-Ecole Polytechnique, France)

P024 Thırd-Order Nonlınear Optıcal Characterızatıon and Optıcal Lımıtıng Behavıor Of Pb(Iı), In(Iıı) Chlorıde, Ni(Iı) Metallated 1,4,8,11,15,18,22,25-Octaalkylphthalocyanınes: Asli Karakas (Selçuk University, Turkey) and Ayhan Elmali (Ankara University, Turkey)

P025 Luminescence Properties Of Sol-Gel-Derived TiO2:Sm Powder: V. Kiisk, V. Reedo, O. Sild and I. Sildos (University of Tartu, Estonia)

P026 Multi-Layered TiO2 Nanostructured Films For Dye-Sensitized Solar Cells: Jin-Kook Lee, Bo-Hwa Jeong, Sung-il Jang, Yun-Seon Yeo, Sung-Hae Park and Hyun-Jeong Lee (Pusan National University, South Korea) , Yong-Wook Jang (POLYCEN Co., Ltd, South Korea), Mi-Ra Kim (Pusan National University, South Korea).

P027 1D-Photonic Crystals Based On Amorphous Chalcogenide Sb-Se and Ge-S Thin Films: T. Kohoutek, T. Wagner, J. Orava and M.Hrdlicka (University of Pardubice, Czech Republic), Mil. Vlcek (Czech Academy of Sciences and University of Pardubice, Czech Republic) and M. Frumar (University of Pardubice, Czech Republic).

P028 Characterization of deep levels in semiconductors by time-resolved synchrotron-excited photoconductivity measurements: Igor Konovalov and Liudmila Makhova (Wilhelm-Ostwald-Institut für Physikalische und Theoretische Chemie Universität Leipzig, Germany).

P029 Structural Studies of CsBr-doped Ge-Ga-S Glasses By Raman Spectroscopy: L.Koudelka, J.Šubčík and M.Vlček (University of Pardubice, Czech Republic), M.Jayasimhadri and J.Heo (Pohang University of Science and Technology, South Korea)

P030 Structural And Luminescence Characteristics of Macro Porous Silicon: B. Bulakh, N. Korsunska, L. Khomenkova, T. Stara and Ye. Venger (1V. Lashkaryov Institute of Semiconductor Physics, Ukraine), T. Kryshtab and J. A. Andraca-Adame (Instituto Politecnico Nacional - Escuela Superior de Fisica y Matematicas, Mexico)

P031 Consolidated Silica Glass from Nanoparticles: Thomas G. Mayerhöfer (Friedrich-Schiller Universität Jena, Germany), Zhijian Shen, Ekaterina Leonova and Mattias Edén (Stockholm University, Sweden), Antje Kriltz Friedrich-Schiller Universität Jena, Germany) and Jürgen Popp (Institut für Photonische Technologien e.V., Germany).

P032 Fabrication of sub-wavelength pyramidal and honeycombed structures in solar cells by utilizing nanosphere lithography: H. L. Chen and S. Y. Chuang (National Taiwan University, Taiwan), C. H. Lin (National Nano Device Laboratory, Taiwan) and Y. H. Lin (National Taiwan University, Taiwan).

P033 Non-Hydrolytic Sol-Gel Processed TiO2, A Potential Electrode Material for Unsintered Photoelectrochemical Cells: S.N.B. Hodgson (University of Teesside, UK) and L. Weng (Harbin Institute of Technology, China).

P034 Calculated Optical Transitions in a Silicon Quantum Wire Modulated by a Quantum Dot: X. Zianni and S.I. Themelis (Technological Educational Institution of Chalkida, Greece), and A.G.Nassiopoulou (IMEL, Greece).

P035 Investigation Of Polarisation Dependance of Dynamics in Semiconductor Optical Amplifiers – Influence of Material Strain: S. Philippe and A.L. Bradley Trinity College Dublin, Ireland), F. Surre and P. Landais (Dublin City University, Ireland)

P036 Selective Growth of Well-Aligned Carbon Nanotubes by APCVD: Hung-hsin Chen (Chung Yuan Christian University, Taiwan)**,** Chien-Te Ku (Institute of Nuclear Energy Research, Taiwan), Wu-Yih Uen (Chung Yuan Christian University, Taiwan)**,**, Shan-Ming Lan and Tsun-Neng Yang (Institute of Nuclear Energy Research, Taiwan),, Zhen-Yu Li (Chung Yuan Christian University, Taiwan), Chin-Chen Chiang (Institute of Nuclear Energy Research, Taiwan).

P037 Reversible Photo-Induced Spectral Change of Metal Oxides: Shosuke Mochizuki and Fumito Fujishiro (Nihon University, Japan)

P038 Silicon-Based Electroluminescent Devices Fabricated via Plasma Ion Implantation: Michael P. Bradley, James Mantyka, Marcel Risch and Casper J.T. Steenkamp (University of Saskatchewan, Canada)

P039 Local Bonding Structures of Ge2Sb2Te4, Ge2Sb2Te5, and Ge2Sb2Te7; An EXAFS Study: D.A. Baker and G. Lucovsky (North Carolina State University, Raleigh, USA), P.C. Taylor (Colorado School of Mines, USA) and M.A. Paesler (North Carolina State University, Raleigh, USA) .

P040 Chalcogenide glass thin films and planar waveguides: C.C. Huang, R. E. Simpson, M. Hughes, M. Darby, M. X Hassan, K. Knight, R. W. Eason and D.W. Hewak (University of Southampton, UK).

P041 Noise Modeling of PIN-Photodetector based on HgCdTe for Free Space optical Receiver: P. K. Saxena and P. Chakrabarti (Institute of Technology, Banaras Hindu University, India)

P042 Electrical Characterisation of Next Generation Cold Cathode Flourescent Lamps: S. Sudhakaran (Queen Mary, University of London, UK), David Barratt (Blackburn MicroTech Solutions, UK) and A. K. Ray

P043 The Sol-Gel Synthesis of C12A7 Thin Film: Marzan Zahedi (Queen Mary, University of London, UK), David Barratt (Blackburn MicroTech Solutions, UK) and A. K. Ray

P044 Solidification Driven Extrusion: David Mills (Queen Mary, University of London, UK) and Kurt Kolasinski (West Chester University, USA)

P045 Tough, Semiconducting Polyethylene-Poly(3-hexylthiophene) Bi-Component Systems: Christian Müller (ETH Zürich, Switzerland), Shalom Goffri (University of Cambridge, UK) and Dag W. Breiby, Jens W. Andreasen (Risø National Laboratory, Denmark), Henri D. Chanzy (CNRS, France), René A.J. Janssen (TU Eindhoven, The Netherlands), Martin M. Nielsen, Christopher P. Radano (Degussa RohMax USA, USA), Henning Sirringhaus University of Cambridge), Paul Smith (ETH Zürich), Natalie Stingelin-Stutzmann (Queen Mary, University of London, UK)

P093 The effect of thermal annealing on the n-ZnO /p-GaN structure: H. S. Kim, J. Y. Lee and H. S. Oh (Korea Maritime University, Korea), H. K. Cho and B. H. Kong (Sungkyunkwan University, Korea) and H. S. Lee (Kyungpook National University, Korea).

P094 Geometry effects on quantization potential of self-assembled zinc blende III_V QDots: S.I.Rybchenko, G.Yeap, R.Gupta, I.E.Itskevich, S.K.Haywood (University of Hull, UK)

P095 L-band related interband transitions in InSb/GaSb (001) self-assembled quantum dots: S.I.Rybchenko, R.Gupta, I.E.Itskevich, S.K.Haywood (University of Hull, UK)

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ICOOPMA 2007 Poster Presentations

Day 2: Tuesday 31 July 2007

Where:	The Octagon, Queens' Building, Queen Mary University of London, Mile End Campus.
Poster Panel:	**Claudia Ambrosch-Draxl,** University of Leoben, Austria **Yasuhiko Arakawa,** University of Tokyo, Japan **Asa Barber,** Queen Mary University of London, UK **Jamal Deen**, Mcmaster University, Canada **Paul Hogg**, Queen Mary University of London, UK (**Chair**) **Miguel Levy,** Michigan Technological University, U.S.A **Tanya M. Monro,** University of Adelaide, Australia **Jean-Luc Adam**,UMR CNRS 6226 Sciences de Rennes, France **Harry Ruda**, University of Toronto, Canada **Mark A. Reed,** Yale University, USA **Ashok Vaseashta**, Marshall University, USA

P046 Arsenic-Rich As-Se Amorphous Thin Films Prepared By Pulsed Laser Deposition: P. Němec and M. Frumar (University of Pardubice, Czech Republic).

P047 Stable electron emission of carbon nanotube emitter arrays after constant bias-aging: Ki Seo Kim, Je Hwang Ryu, Chang Suk Lee, Jin Jang, and Kyu Chang Park (Kyung Hee Unioversity, Korea)

P048 Theoretical Study of the Molecular Properties of Organic and Polymeric Materials For Solar Cells: Sofia I. C. Ribeiro, Helena M. G. Correia and Marta M. D. Ramos (University of Minho, Portugal)

P049 DFWM of focused laser beams in a-As2S3 and azobenzene oligomer films: D.Saharov and A.Ozols (Institute of Technical Physics, Latvia).

P050 Characterization of 4I9/2 - 4F3/2 Optical Transitions in Trivalent Nd3+ Ions in Galas Glass: K. Koughia, G. Soundararajan and S. O. Kasap (University of Saskatchewan, Canada), A.Trevor, C. Haugen and R. Decorby (TRLabs and University of Alberta, Canada), N.Ohrui, T, Aoki and C.Fujihashi (Tokyo Polytechnic University, Japan).

P051 Effect of systematic errors in the extraction of optical properties and thickness of a thin film from transmission spectra using a non-collimated beam or a tilted sample: Wee Chong Tan, George Belev, Cyril Koughia, Robert Johanson, Safa Kasap (University of Saskatchewan, Canada).

P052 Optical Properties of a-SiNx:H Thin Films: Wee Chong Tan (University of Saskatchewan, Canada), S. Kobayashi and T. Aoki (Tokyo Polytechnic University, Japan), Robert Johansonand S.O. Kasap (University of Saskatchewan, Canada).

P053 Ambient dependent photoconductivity in MgxZn1-xO thin films: R. Ghosh, S. Mridha, D. Basak (Indian Association for the Cultivation of Science, India)

P054 In-Plane Anisotropic Electrical And Optical Properties Of Gold–Doped Rhenium Disulphide: C. H. Liang, C. H. Chen and K. K. Tiong (National Taiwan Ocean University, Taiwan), D. Dmitry and Y. S. Huang (National Taiwan University of Science and Technology, Taiwan).

P055 Can Semiconductor Lasers Make Good Sensors?: J Coote, S Reddy and S J Sweeney (University of Surrey).

P056 Optically Stimulated Luminescence Measurements on Novel Materials for Radiation Imaging: G. V. M. Williams (MacDiarmid Institute, New Zealand), A. Edgar and C. Dotzler Victoria University, New Zealand).

P057 Amorphous Selenium Photoconductor For Cardiac Imaging Applications: M. Wronski, A. Reznik, G. Decrescenzo, and J. A. Rowlands (Sunnybrook Health Sciences Centre, Canada)

P058 Charge Photogeneration in Amorphous Selenium In The Avalanche Multiplication Regime: A. Reznik (Sunnybrook Health Sciences Centre, Canada), S.D. Baranovskii, O. Rubel and P. Thomas , Philipps University Marburg, Germany), S.O. Kasap c), Y.Ohkawa d) and K. Tanioka (NHK Science & Technical Research Laboratories, Japan) and J.A. Rowlands (Sunnybrook Health Sciences Centre, Canada)

P059 Silicon Photonic Waveguides For Mid- And Long-Wave Infrared Region: P. Y. Yang (University of Surrey, UK), S. Stankovic and J. Crnjanski (University of Belgrade, Serbia) , W. Headley (University of Surrey, UK), E. J. Teo (National University of Singapore, Singapore), G. T. Reed and G. Z. Mashanovich (University of Surrey, UK)

P060 Growth and Characterization of Zinc Oxide Films on (100) Silicon Substrates by Plasma-Assisted Molecular Beam Epitaxy: Sang Mo Yang and Jun-Ho Choi (Chungnam National University, Korea), Jae Wook Lee (Korea Advanced Institute of Science and Technology, Korea), Seok Kyu Han, Dong-Suk Kang, Jae Goo Kim and Soon-Ku Hong (Chungnam National University, Korea), Jeong Yong Lee(Korea Advanced Institute of Science and Technology, Korea), Jung-Hoon Song (Kongju National University, Korea) and Takafumi Yao (Tohoku University, Japan)

P061 Surface state simulation model for photoconductors infrared detectors: S.Kouissa (University of Constantine, Algeria)

P062 Growth and Characterisation of A New Mixed Borate Crystal of the Type (NH4)1-X KX B5 O8: P. Sagayaraj and Joe G.M. Jesudurai (Loyola College, India).

P063 Crystallization and characterization of nonlinear optical L-histidine hydrofluoride (LHHF) single crystals: P. Sagayaraj and J. Madhavan (Loyola College, India).

P064 Optical properties of γ–glycine (GGLY) single crystals:P. Sagayaraj (Loyola College, India) and S. Aruna (Bharathi Women's College, India)

P065 Laser Sources For High Temperature Optoelectronics: I .P. Marko, A. R. Adams and S. J. Sweeney (University of Surrey, UK) and N. D. Whitbread, A. J. Ward, B. Asplin and D. J. Robbins (Bookham Technology, UK).

P066 Phosphor-Free White Light-Emitting Diodes: Sucheta Ahmed, David Lancefield and Stephen J. Sweeney (University of Surrey, UK), Philippe de Mierry, Frank Tinjod and Sébastien Chenot (CNRS-CRHEA, France)

P067 Long Wavelength Dilute Nitride Based Lasers And Detectors: J. Chamings, D. Mcconville, S. J. Sweeney, A.R. Adams (University of Surrey, UK), J.S. Ng, W.M. Soong, M. Hopkinson, J.P.R.David (University of Sheffield, UK) S. Tomic (CCLRC Daresbury Laboratory, UK) and H. Riechert (Qimonda AG, Germany)

P068 High Temperature GeS2 Based Fibres For Chemical Sensing Applications: Clare J Hill, Lihui Wang and Animesh Jha (The University of Leeds, UK)

P069 Optical and Electromagnetic Charaterisation of Antimony Doped BiFeO3 Thin Films: V.Fruth (Institute of Physical Chemistry, Romania), R.Ramer (University of New South Wales, Australia), M.Gartner (Institute of Physical Chemistry, Romania), L.Mitoseriu ("Alexandru Ioan Cuza" University, Romania), N.Lupu (National Institute of Research and Development for Technical Physics, Romania), M.Popa (Institute of Physical Chemistry, Romania), L.Mihut (National Institute for Physics of Materials, Romania) and H.Chiriac (National Institute of Research and Development for Technical Physics, Romania)

P070 Growth and Characterization of Tris thiourea Zinc Cadmium Sulphate (TTZCS): a semi organic nonlinear optical crystal: Jayalakshmi Durairaj (St.Joseph's Engineering College, India), Mauro Tonelli (University of Pisa, Italy) and Kumar Janakiraman (Anna University, India)

P071 Spectroscopic Ellipsometry Study Of Plasma-Polymerised Vinyltriethoxysilane Films: J. Mistrik (Pardubice University, Czech Republic), B. Cechalova, J. Studynka and V. Cech (Brno University of Technology, Brno, Czech Republic)

P072 Effects of Charge Carrier Trapping on Imaging Performances of Lead Oxide X-Ray Imaging Detectors: M. Zahangir Kabir (Concordia University, Canada)

P073 Elastic relaxation of a biperiodic network of buried dislocations: application to the nanosystems: A. Derardja (University of Batna, Algeria)

P074 X-Ray absorption fine structure investigation of Iron and Europium doped Titania photocatalysts: F. Vasiliu, L. Diamandescu, C. M. Teodorescu, and D. Macovei (National Institute of Materials Physics, Romania)

P075 Comparative Study of Terbium-Exchanged Zeolites Functionalized With Alkoxysilanes: Carmen Tiseanu, V. Lorenz- Fonfria, A. Gessner and M. U. Kumke (National Institute for Laser, Plasma and Radiation Physics, Romania).

P076 The Effects of Native And Light Induced Defects in the Optoelectronic Properties of Hydrogenated Amorphous Silicon-Germanium (a-SiGe:H) Alloy Thin Films: E. D. Yavas and M.Gunes (Mugla University, Turkey), J. Klomfass and F. Finger (Institut für Photovoltaik, Germany)

P077 Fabrication of ZnTe light emitting diode on p-ZnMgTe substrate by Al thermal diffusion: Tooru Tanaka, Katsuhiko Saito, Mitsuhiro Nishio, Qixin Guo, and Hiroshi Ogawa1 (Saga University, Japan)

P078 Electrical Properties of g–CuCl thin films: F. O. Lucas, P.J. McNally, S. Daniels (Dublin City University, Ireland) and D.M. Taylor (University of Wales, Bangor, U.K)

P079 Ambipolar Light-Emitting Transistors of organic Single-Crystals: T. Takenobu, T. Takahashi, S. Z. Bisri and Y. Iwasa (Tohoku University, Japan)

P080 Optical Properties and Structure of Ag-As-Se Chalcogenide Glasses: Stehlik S., Wagner T., Krbal M., Bartos M. , Benes L. and Frumar M (University of Pardubice, Czech Republic)

P081 Er3+ Ions in Disordered Calcium Niobium Gallium Garnet Crystals: T. Tsuboi and S. Polosan (Kyoto Sangyo University, Kamigamo, Kyoto 603-8555, Japan), K. Shimamura (National Institute for Materials Science, Japan), H.J. Seo (Pukyong National University, Republic of Korea).

P082 Optical nonlinear silica thin films synthesized by reactive evaporation and processed by thermal-poling: W.T. Li, R. Boswell, M. Samoc, and A. Samoc (The Australian National University, Australia).

P083 In2S3: Ag, An Ideal Buffer Layer for Thin Film Solar Cells: Meril Mathew, C. Sudha Kartha and K. P. Vijayakumar (Cochin University of Science Technology, India).

P084 Thermal diffusion of copper: A different approach for the preparation of CuInS2 / In2S3 *p-n* junction: Meril Mathew , C Sudha Kartha and K P Vijayakumar (Cochin University of Science and Technology, India)

P085 Spark Plasma Sintering To Produce Novel Functional Ceramics: H. Yan, H. Zhang and M. J. Reece (Queen Mary, University of London, UK)

P086 Different carbon counter electrodes for dye sensitized solar cells: Won Jae Lee, Easwaramoorthi Ramasamy, Dong Yoon Lee and Jae Sung Song (Korea Electrotechnology Research Institute, Korea).

P087 Dye sensitized solar cells with novel carbon nanotube counter electrodes: Won Jae Lee, Easwaramoorthi Ramasamy, Dong Yoon Lee and Jae Sung Song (Korea Electrotechnology Research Institute, Korea).

P088 Liquid crystalline phthalocyanine spun thin film for protein adsorption study: Sharmistha Paul, Tamara Basova, Pankaj Vadgama and Asim K. Ray (Queen Mary, University of London, UK).

P089 Investigation of electrodeposited Cd1-xZnxTe thin films for photovoltaic application: N B Chaure, Shweta Chaure, A K Ray (Queen Mary, University of London, UK) and R K Pandey (Bhopal University, India).

P090 Effect of Cd:S ratio on optical properties of CdS quantum dots: Shweta Chaure, N B Chaure, A.K.Ray (Queen Mary, University of London, UK) and R K Pandey (Bhopal University, India).

P091 InAsSb Mutiple Quantum Wells for Mid_Ir Photodetector Applications: O. J. Pitts, D. Lackner, S. Najmi, X. Zhang, P. Sandhu, A. Yang, M. Steger, S. P. Watkins, M. L. W. Thewalt, and K. L. Kavanagh (Simon Fraser University, Canada)

P092 Modeling and Simulation of Heterojunction Photovoltaic Detector Based on $InAs_{0.15}Sb_{0.85}$ for Free Space Optical Communication: P. K. Maurya and P. Chakrabarti(Banaras Hindu University, India)

P096 Modelling of liquid crystal device switching with defects: Richard James, Eero Willman, F. Aníbal Fernández and Sally E. Day (University College, London)