

Monday Jan. 25, 2016		
Room A		
7:00-8:00AM	Breakfast	
Session: Fundamentals and Applications of Porous Ceramics I Chair: DaeYong Jeong		
8:00-8:25AM	A01: Multi-Physics Simulation of Porous Materials in Energy Devices	Michihisa Koyama Kyushu University, Japan
8:25-8:50AM	A02: Ceramic Membranes with Adjustable Pore Size and Surface Functionalization for Controlled Virus Retention	Stephen Kroll University of Bremen, Germany
8:50-9:15AM	A03: Porous MAX phases for high temperature applications	Jesus Gonzalez-Julian Forschungszentrum Jülich GmbH, Germany
9:15-9:40AM	A04: On the challenges of developing high-performance porous ceramic structures	Vanesa Gil Technical University of Denmark, Denmark
9:40-10:05AM	A05: Single Phase α -Alumina Nanoporous Membranes with Tunable Pore Diameters	Sachiko Ono Kogakuin University, Japan
10:05-10:20AM	Session Break	
Session: General I Chair: Lothar Naumann		
10:20-10:45AM	A06: Compressibility and high pressure phase transitions for rare-earth orthovanadates	Wojciech Paszkowicz Institute of Physics, Polish Academy of Sciences, Poland
10:45-11:10AM	A07: Room Temperature Impact Consolidation (RTIC) of Fine Ceramic Particles on Aerosol Deposition Process	Jun Akedo National Institute of Advanced Industrial Science and Technology (AIST), Japan
11:10-11:35AM	A08: Piezoelectric Energy Harvesting through Mechanical Resonance initiated with Stray Magnetic Field	DaeYong Jeong Inha University, Korea
11:35-12:00AM	A09: A Theoretical Model for the Non-Arrhenius Ionic Conductivity of Solid Electrolytes	Masaru Aniya Kumamoto University, Japan
12:00-14:00PM	Lunch Break	

Monday Jan. 25, 2016

Room B

Session: 2D oxide nanosheets

Chair: Michihisa Koyama

14:00-14:25PM	B01: Development of flexible oxide thin films produced by photo-reaction of metal organic compound: Electrical and optical applications	Tetsuo Tsuchiya National Institute of Advanced Industrial Science and Technology (AIST), Japan
14:25-14:50PM	B02: Preparation of Oxide-based Nanosheets from Inorganic Layered Compounds: Preparation, Surface Modification, and Applications	Yoshiyuki Sugahara Waseda University, Japan
14:50-15:15PM	B03: Critical layer for achieving low-resistivity impurity-doped ZnO polycrystalline films with a preferred (0001) orientation by magnetron sputtering	Junichi Nomoto Kochi University of Technology, Japan
15:15-15:30PM	Session Break	
Session: Ultra-high Temperature Ceramics I		
Chair: Tao Suo		
15:30-15:55PM	B04: Time dependent mechanical properties of Ultra High Temperature ZrB ₂ based ceramic composites	Jakob Kuebler Empa, Swiss Federal Laboratories for Materials Science and Technology, Switzerland
15:55-16:20PM	B05: Ultrafast atmospheric-pressure-plasma-jet materials processes for energy harvesting and storage devices	Jian-Zhang Chen National Taiwan University, Taiwan
16:20-16:45PM	B06: The singular plasticity of boron carbide ceramics	Diego Gomez-Garcia University of Seville, Spain
17:30PM	Dinner Social	

Monday Jan. 25, 2016

Room C

Session: Electronics in Ceramics I Chair: Mara Bernardo

14:00-14:25PM	C01: Synthesis and Electrical Properties of Lead-Free (K,Na)(Nb,Ta)O ₃ Thin Films for Piezoelectric Thin-Film Actuators	Wataru Sakamoto Nagoya University, Japan
14:25-14:50PM	C02: Ceramic processing of magnesium diboride for optimised superconducting properties	Claire Dancer University of Warwick, UK
14:50-15:15PM	C03: Ferroelectric and Magnetic Properties of Aurivillius Family Thin Films	Tingting Jia National Institute for Materials Science, Japan
15:15-15:30PM	Session Break	
Session: Electronics in Ceramics II Chair: Claire Dancer		
15:30-15:55PM	C04: Bulk Relaxor Ferroelectric Ceramics as Working Elements in an Electrocaloric Cooling Device	Zdravko Kutnjak Jozef Stefan Institute, Slovenia
15:55-16:20PM	C05: Synthesis, microstructure and properties of BiFeO ₃ -based multiferroic materials	Mara Bernardo POEMMA-CEMDATIC, ETSI Telecomunicacion (UPM), Spain
16:20-16:45PM	C06: Effect of Ferroelectric Order on Electrocaloric Effect	Yang Bai University Of Science and Technology Beijing, China
16:45-17:10PM	C07: Mechanoluminescent Materials with Piezoelectric Crystal Structure	Jun-Cheng Zhang Qingdao University, China
17:30PM	Dinner Social	

Tuesday Jan. 26, 2016		
Room B		
8:00-9:00AM	Breakfast	
Session: General II Chair: Wojciech Paszkowicz		
9:00-9:25AM	B07: Precise Structure Analysis of Materials for Energy and Environment, and New Material Exploration	Masatomo Yashima Tokyo Institute of Technology, Japan
9:25-9:50AM	B08: Transparent fluoride ceramics for laser applications	Michel Mortier Paris Institute of Technology, France
9:50-10:15AM	B09: Synthesis of Ceramics with Controlled Nano- and Micro-Structures by Aqueous Solution Methods	Makoto Kobayashi Tohoku University, Japan
10:15-10:30AM	Session Break	
Session: Carbides and Nitrides for Electrochemistry and Energy Chair: Michel Mortier		
10:30-10:55AM	B10: Nitride Ceramics for Solid State Lighting Applications	Yi Zheng OSRAM SYLVANIA INC. , USA
10:55-11:20AM	B11: Self-Assembled MXene Film with High Gravimetric Capacitance	Xiaohui Wang Institute of Metal Research, CAS, China
11:20-11:45AM	B12: The formation of InN nanodots and density control by PA-MBE via droplet epitaxy technique	Jiun-Yu Chen National Dong Hwa University, Taiwan
11:45-12:10PM	B13: First-principles study of the hydrogen insertion into MX and Mn+1AXn phases	Haimin Ding North China Electric Power University, China
12:30-14:00PM	Lunch Break	
Session: Electronics in Ceramics III Chair: Wataru Sakamoto		
14:00-14:25PM	B14: Structure and Chemical Bonding of AgNbO ₃ , BiFeO ₃ and BiFeO ₃ -PbTiO ₃ Ceramics	Masatomo Yashima Tokyo Institute of Technology, Japan

14:25-14:50PM	B15: Reversible modulation of opto-electric and electro-magnetic properties of transition metal oxides using water-infiltrated glass	Takayoshi Katase Hokkaido University, Japan
14:50-15:15PM	B16: Critical Thickness Effect in Varistor Ceramics	Jianying Li Xi' an Jiaotong University, China
15:15-16:00PM	Poster Session	
Session: Ceramic Materials for Nuclear Power Chair: Masatomo Yashima		
16:00-16:25PM	B17: Elaboration of advance ceramics and sintering processes for nuclear technology and other applications	Albina Orlova Nizhny Novgorod State University, Russia
16:25-16:50PM	B18: Ceramic coatings for hydrogen permeation barrier in advanced energy systems	Takumi Chikada Shizuoka University, Japan
16:50-17:15PM	B19: Ceramics and Glass-Ceramics for Immobilisation of Intermediate- and High-Level Nuclear Waste	E. R. Vance SynrocANSTO, Australia
17:30PM	Dinner Social	

Tuesday Jan. 26, 2016		
Room C		
8:00-9:00AM	Breakfast	
Session: Ceramic Nanostructures I Chair: Jeremiah Abiade		
9:00-9:25AM	C08: Formation mechanism of titanium dioxide flower-like structure through anodisation	Vaia Adamaki University of Bath, UK
9:25-9:50AM	C09: Nanonet of ceramic nanofibers with targeted functionalities	Irina Hussainova Tallinn University of Technology, Estonia
9:50-10:15AM	C10: Monodispersed spherical core-shell type ceramic/polymer hybrid nanoparticles	Noriya Izu National Institute of Advanced Industrial Science and Technology, Japan
10:15-10:30AM	Session Break	
Session: Ceramics nanocomposites Chair: Jakob Kuebler		
10:30 -10:55AM	C11: Self-setting injectable paste composed of hydroxyapatite/collagen bone-like nanocomposite and GPTMS	Masanori Kikuchi Hokkaido University, Japan
10:55-11:20AM	C12: Preparation, structure and luminescence of Eu ³⁺ -doped yttrium-cerium composite oxide powders	Shikao Shi Hebei Normal University, China
11:20-11:45AM	C13: Texture developing and some properties of feeble magnetic ceramics	Yoshio Sakka National Institute for Materials Science, Japan
Session: Fundamentals and Applications of Porous Ceramics II Chair: Jesus Gonzalez-Julian		
11:45-12:10AM	C14: Porosity analysis of porous axial suspension plasma sprayed thermal barrier coatings for gas turbine application	Ashish Ganvir University West, Sweden
12:10-12:25PM	C15: Preparation and properties of macro-porous ceramics derived from particle stabilized emulsions	Jinhong Li China University of Geosciences, China
12:30-14:00PM	Lunch Break	

Session: General III Chair: Lianjun Wang		
14:00-14:25PM	C16: Application of Si ₃ N ₄ /SiC composite for particle detectors in harsh radiation environment	Lothar Naumann Helmholtz-Zentrum Dresden-Rossendorf, Germany
14:25-14:50PM	C17: (Ni _{1-x} Co _x)TiO ₃ - A Sustainable Multiferroic Oxide	Johannes Frantti Finnish Research and Engineering, Finland
14:50-15:15PM	C18: Influence of Different Ni-YSZ Anode Functional Layer Thicknesses on Power Densities in Anode-Supported SOFCs	Isao Kagomiya Nagoya Institute of Technology, Japan
15:15-16:00PM	Poster Session	
Session: General IV Chair: Johannes Frantti		
16:00-16:25PM	C19: Molecular Dynamics Simulation Study on the Lithium Ion Transport of Doped Garnet-Type Solid Electrolytes	Randy Jalem National Institute for Materials Science (NIMS), Japan
16:25-16:50PM	C20: Fabrication of Graphene/Al ₂ O ₃ Nano-Composites	Lianjun Wang Donghua University, China
16:50-17:15PM	C21: Photoluminescence of Inorganic Amorphous Films Containing ns ² -type Emission Center	Hirokazu Masai Kyoto University, Japan
17:30PM	Dinner Social	

Wednesday Jan. 27, 2016		
Room B		
8:00-9:00AM	Breakfast	
Session: Bioceramics and medical applications Chair: Masanori Kikuch		
9:00-9:25AM	B20: Additive manufacturing of calcium phosphate based ceramics for bone tissue engineering	Franz E. Weber University of Zurich, Switzerland
9:25-9:50AM	B21: Bone Regeneration Using Organic-Inorganic Porous Hybrids in Craniotomy	Yuki Shirosaki Kyushu Institute of Technology, Japan
9:50-10:15AM	B22: Electro-active ceramics as a new generation materials for orthopedic implant applications	Ashutosh Kumar Dubey Indian Institute of Technology (BHU), India
10:15-10:30AM	Session Break	
Session: Ultra-high temperature ceramics II Chair: Jakob Kuebler		
10:30 -10:55AM	B23: Joining of UHTC Boride Using Metallic Interlayer	Noritaka Saito Kyushu University, Japan
10:55-11:20AM	B24: Coupling effects of temperature and strain rate on compressive behavior of C/SiC composites	Tao Suo Northwestern Polytechnical University, China
11:20-11:45AM	B25: On the plasticity of boron carbide ceramics	Bibi Malmal Moshtaghion Universidad de Sevilla, Spain
12:10-14:00PM	Lunch Break	
Session: Ceramic Nanostructures II Chair: Vaia Adamaki		
14:25-14:50PM	B26: CO and Soot catalytic oxidation with Ce-Zr-Pr oxides	Samir Bensaid Politecnico di Torino, Italy
14:50-15:15PM	B27: Local Structure Analysis of Sm-Fe and Tb-Fe Systems in Crystallization Process From Amorphous state	Yasuhiro Yoneda Japan Atomic Energy Agency, Japan
15:15-15:30PM	Session break	
Session: Ceramic Nanostructures III Chair: Irina Hussainova		
15:30-15:55PM	B28: A Resol-Assisted Co-Assembly Approach to Crystalline Mesoporous Niobia Spheres	Wei Luo Donghua University, China
15:55-16:20PM	B29: Investigation of the Wetting Characteristics of Cerium Dioxide Thin Films	Jeremiah Abiade University of Illinois at Chicago, USA
17:30PM	Dinner Social	

Wednesday Jan. 27, 2016

Room C

8:00-9:00AM	Breakfast	
Session: Electronics in Ceramics IV Chair: Hana Ursic		
9:00-9:25AM	C22: Magnetic, Electric and Thermal Field Response of Artificial Magneto-Electric Epitaxial Multilayer	Takeshi Yokota Nagoya Institute of Technology, Japan
9:25-9:50AM	C23: Mutual control of magnetization and electric polarization at room temperature in multiferroic Y-type hexaferrite ceramics	Sakyo Hirose Murata Manufacturing Co., Ltd., Japan
9:50-10:15AM	C24: Large Piezoelectric Properties in Textured Lead-Free Bi _{0.5} (Na,K)0.5TiO ₃ -Based Ceramics	Chang Won Ahn University of Ulsan, Korea
10:15-10:30AM	Session Break	
Session: Electronics in ceramics V Chair: Sakyo Hirose		
10:30 -10:55AM	C25: Artificial fabrication and electrical conduction of charged domain-walls in ferroelectric materials	Atsutomo Nakamura Nagoya University, Japan
10:55-11:20AM	C26: Structural disorder stability of mechanochemically derived Pb(Sc _{0.5} Nb _{0.5})O ₃ ceramics	Hana Ursic Jozef Stefan Institute, Slovenia
11:20-11:45AM	C27: Towards tunable magnetoresistance with spin nematicity and electrical boundary conditions	Zhihong Wang Institute of Physics, CAS, China
12:10-14:00PM	Lunch Break	
Session: Electronics in Ceramics VI Chair: Wenfeng Liu		
14:00-14:25PM	C28: Materials genome approach for novel perovskite-type ferroelectrics with high Curie temperature and piezoresponse	Jian Yu Tongji University, China
14:25-14:50PM	C29: Electrochemical detection of nitrite based on modified 3C-SiC nanowires electrode	Xinmei Hou University Of Science and Technology Beijing, China

14:50-15:15PM	C30: The Dielectric Constant of CaCu ₃ Ti ₄ O ₁₂ Ceramics	Changping Yang Hubei University, China
15:15-15:30PM	Session break	
Session: Electronics in ceramics VII Chair: Jian Yu		
15:30-15:55PM	C31: High Piezoelectric Performance from the phase coexisting region	Wenfeng Liu Xi' an Jiaotong University, China
15:55-16:20PM	C32: Effect of nanoscale atomic orderings on functional properties of lead-free ferroelectric ceramics	Abhijit Pramanick City University of Hong Kong, Hong Kong
16:20-16:45PM	C33: Temperature Controlled Electronically in a System of Two Coupled Brick Kilns	Javier Guadarrama Universidad Autonoma del Estado de Mexico, Mexico
17:30PM	Dinner Social	
Jan. 28	One day Excursion	

Tuesday Jan. 26, 2016

15:15-16:00PM

Poster Session

P01	Nanopowders and ceramics for atomic energy, medical, structural and tribological applications	Albina Orlova Nizhny Novgorod State University, Russia
P02	A Model for the Particle Size Dependence of the Ionic Conductivity	Kazuma Hagihara Kumamoto University, Japan
P03	Effect Compensation on Coating Quality for a Material Deposition Process in Nanotechnology	Bo Wun Huang Cheng Shiu University, Taiwan
P04	Effect of nitridation on LiMn _{1.5} Ni _{0.5} O ₄ as cathode material for lithium-ion batteries	Sukeun Yoon Kongju National University, Korea
P05	Morphological variations in the microwave assisted hydrothermal synthesis of ZnO-based materials	Mara Bernardo POEMMA-CEMDATIC, ETSI Telecomunicacion (UPM), Spain
P06	Electrical and Optical Properties of Nickel Thin-films Fabricated by Oblique-angle Deposition	Jaehae Cho Chonbuk National University, Korea
P07	Numerical Simulation of Inter-Particle Aggregation and Breakage in Taylor-Reactor	Dong Hyup Jeon Dongguk University, Korea
P08	Fabrication and Electrical Properties of Ni-Mn-Cu Oxide Thick Film for Uncooled Infrared Detector	Dong-Jin Lee Gyeongsang National University, Korea
P09	Fabrication of SrTi _{1-x} FexO ₃ (x=0, 0.05, 0.1) nanofibers as an anode for Li-ion battery	Attaphol Karaphun KhonKaen University, Thailand
P10	The Origin of Colossal Dielectric Permittivity in MgO/(Nb+In) co-doped TiO ₂ Nanocomposites	Wattana Tuichai KhonKaen University, Thailand
P11	Ca _{1-3x/2} Y _x Cu _{3-y} Zn _y Ti ₄ O ₁₂ Nanocrystalline Powders Synthesized by a Modified Sol-Gel Route: Preparation, Characterization and Their Bulk Colossal Dielectric Properties	Jakkree Boonlakhorn KhonKaen University, Thailand

P12	Largely Enhanced Dielectric Permittivity and Low Loss Tangent in 3-Phase Polymer Matrix Nanocomposites: Ti _{1-x} (In _{1/2} Sb _{1/2}) _x O ₂ -CarbonNanotube/Polyvinylidene Fluoride	Apiwat Boonkuang KhonKaen University, Thailand
P13	(Al _{0.5} Nb _{0.5}) _x Ti _{1-x} O ₂ Nanocrystalline Powders Prepared by a Sol-Gel Method: Preparation, Characterization and Their Bulk Colossal Dielectric Permittivity	Nateporn Thongyong KhonKaen University, Thailand
P14	Greatly Enhanced Dielectric Permittivity in Poly(vinylidene fluoride)-Based Polymeric Composites Induced by Na _{1/3} Ca _{1/3} Bi _{1/3} Cu ₃ Ti ₄ O ₁₂ Nanoparticles	Pornsawan Kum-onsa KhonKaen University, Thailand
P15	Enhanced Dielectric Properties of Novel Na _{1/3} Y _{1/3} Ca _{1/3} Cu ₃ Ti ₄ O ₁₂ Ceramics Prepared by a Modified Sol-Gel Method	Areeya Mooltang KhonKaen University, Thailand
P16	Dielectric and Non-Ohmic Properties of Na _{1/2} Y _{1/2} Cu ₃ Ti ₄ O ₁₂ /Al ₂ O ₃ Nanocomposite Ceramics	Jutapol Jumpatam KhonKaen University, Thailand
P17	Comparison of magnetic properties of L10-FePt films grown by different techniques	Aimei Zhang Hohai University, China