

WIRMS 2013 - DETAILED PROGRAM

TIME	Session Title	Session Chair	Name	Affiliation	NOTES	Title
09:00						
09:30						
09:50						
10:10						
10:30						
11:00						
11:30						
11:50						
12:10						
12:00	COMPUTER SET UP FOR BRUKER OPUS 7 WORKSHOP					
12:30	LUNCH					
1:00	BRUKER OPUS 7 WORKSHOP					
2:50						
3:10						
5:30	END OF WORKSHOP					
3:50						
6:00	WELCOME RECEPTION					
4:40						
5:00						
5:20						

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TIME	Session Title	Session Chair	Speaker Name	Affiliation	NOTES	Title
08:50			Mark Tobin			WELCOME
09:00	Introduction	Mark Tobin	Gwyn Williams	Jefferson Lab, USA	PLENARY	The IR Footpath to WIRMS 2013
09:30	THz Facility Development	Yves-Lauren Mathis	Peter Weightman	Liverpool University, UK	INVITED	The Daresbury ALICE accelerator and research on the ALICE THz and infrared beamlines
10:00			Andrea Perucchi	ELETTRA Synchrotron, Italy		TeraFERMI - The THz beamline of the FERMI Free-Electron-Laser
10:20			Peter Rieger	ANKA KIT, Germany		Simulations of photon intensity distributions to facilitate design of beamlines at accelerator-based IR/THz sources
10:40	MORNING COFFEE					
11:10	Coherent Synchrotron Radiation and FELs	Larry Carr	Gianfelice Cinque	DIAMOND Light Source, UK		Coherent Synchrotron Radiation in bursting low- α and top-up mode at Diamond: a unique source for spectroscopy in the THz gap 5 to 100 cm ⁻¹
11:30			Jean-Blaise Brubach	Synchrotron SOLEIL, France		Broadband THz spectroscopy using Coherent Synchrotron Radiation (CSR): recent results for high resolution molecular physics and condensed matter studies on the AILES Beamline
11:50			Juliane Raasch	KIT, Germany		15 ps temporal resolution of the electric field of Coherent Synchrotron Radiation using a high-Tc YBa ₂ Cu ₃ O _{7-x} real-time detection system
12:10			Brant Billinghurst	Canadian Light Source, Canada		The effect of fill pattern on superradiant synchrotron radiation in the Terahertz region
12:30	LUNCH					
2:00	Cultural Heritage	Ljiljana Puskar	Emeline Pouyet	ESRF, France	INVITED	Cultural Heritage applications at the European Synchrotron Radiation Facility
2:30			David Thurrowgood	National Gallery of Victoria, Australia		Synchrotron Infrared Microscopy and rediscovering a hidden painting by Edgar Degas
2:50			Rosemary Goodall	Melbourne Museum, Australia		Investigation of Historical Dart and Arrow Poisons Using Synchrotron Based Infrared Microscopy and Spectroscopy
3:10			Per Uvdal	MAX IV Lab, Sweden		54-Million years old bio-molecules observed in pigment particles in a fossil fish eye
3:30			Paula Dredge	Art Gallery of New South Wales, Australia		Examination of Ripolin enamel house paint as used by the artist Sidney Nolan, with synchrotron sourced Infrared microscopy and spectroscopy
3:50	AFTERNOON TEA					
4:20	Extreme Conditions	Shin-ichi Kimura	Paul Dumas	Synchrotron SOLEIL, France	INVITED	High Pressure Science using synchrotron infrared microscopy at the SMIS beamline (SOLEIL)
4:50			Hidekazu Okamura	Kobe University		High Pressure Infrared Studies of Strongly Correlated Electron Systems at SPring-8
5:10			Himal Bhatt	Bhabha Atomic Research Centre, India		Optical Conductivity studies on Copper doped Ru1212 at High Pressure
5:30			Biliana Gasharova	ANKA KIT, Germany		Phase transformations in the CaO-SiO ₂ -H ₂ O system: synchrotron IR microscopy at ANKA helps decoding unusual transformation mechanisms

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09:00	Sub-diffraction limit spectroscopy	Gianfelice Cinque	Hans Bechtel	Advanced Light Source, USA	INVITED	Ultra-broadband Infrared Nano-spectroscopy with a Synchrotron Source
09:30			Yuka Ikemoto	SPring-8, Japan		Infrared Near-field spectroscopy by synchrotron radiation source at Spring-8 BL43IR
09:50			Peter Hermann	PTN, Germany		High-resolution imaging and nano-FTIR spectroscopy by using a broadband synchrotron radiation source
10:10			Sergiu Amarie	Neaspec, Germany	INDUSTRY	Introducing nano-FTIR - imaging and spectroscopy at 10nm spatial resolution
10:30	MORNING COFFEE					
11:00	IR Microscopy - Facility Developments	Mike Martin	Carol Hirschmugl	University of Wisconsin, Madison, USA	INVITED	Three dimensional spectral imaging with synchrotron FTIR spectro-micro-tomography
11:30			Shin-ichi Kimura	UVSOR Facility, Japan		Infrared micro-spectral imaging using a linear array detector at UVSOR-III
11:50			Raul Freitas	LNLS synchrotron, Brazil		Synchrotron-based a-SNOM IR endstation at the LNLS: beamline installation and commissioning details
12:10			Yves-Laurent Mathis	ANKA KIT, Germany		Status of the Infrared Microscopy station at ANKA
12:30			Ibraheem Yousef	SESAME Synchrotron, Jordan		An Infrared Synchrotron Radiation beamline EMIRA at the Third Generation Light Source SESAME
12:50	LUNCH					
2:20	Biomedical Applications 1	Pimm Vongsivut	Yao-Chang Lee	NSRRC, Taiwan	INVITED	An innovative study of electrostatically-assisted Wax Physisorption Kinetics for Grading Oral Cavity Cancer using Synchrotron-based FT-IR Imaging
2:50			Lisa Vaccari	ELETTRA synchrotron, Italy		IRMS and Flow Cytometry: uniqueness and complementarity of these techniques for live cell analysis
3:10			Phil Heraud	Monash University, Australia		Synchrotron FTIR spectroscopy discriminates very early differentiation stages in living human stem cells
3:30	AFTERNOON TEA					
4:00	Biomedical Applications 2	Carolyn Dillon	Donna Whelan	Monash University, Australia		Detecting Cell Cycle Related Changes to the Concentration and Conformation of DNA in Single Live Cells at the Australian Synchrotron.
4:20			Mark Hackett	University of Saskatchewan, Canada		A "Stroke of Insight": Coupling Synchrotron Infrared Light, Wide-Field Focal Plane Array Detectors and Stroke Research
4:40			Keith Bambery	Australian Synchrotron, Australia		Evaluating the resonant Mie scattering extended multiplicative signal correction algorithm (RMieS-EMSC) on synchrotron FTIR spectra of single cells.
5:00			Bayden Wood	Monash University, Australia		Synchrotron FTIR spectroscopy of malaria infected erythrocytes

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09:00	Atmospheric and Environmental Science	Brant Billinghurst	Evan Robertson	La Trobe University, Australia	INVITED	Aerosol nanoparticles and the Far-side of IR spectroscopy
09:30			Don McNaughton	Monash University, Australia		Synchrotron high-resolution FTIR spectroscopy sorts out the ground state and low wavenumber modes of ketenimine.
09:50			Johanna Howes	University of Technology Sydney, Australia		Assessing metabolic variation of endosymbiotic and cultured <i>Symbiodinium microadriaticum</i> using Synchrotron imaging FTIR spectroscopy
10:10			Ewen Silvester	La Trobe University, Australia		Investigation of fungal decomposition of leaf lignin using synchrotron infrared microspectroscopy
10:30			Michel Nieuwoudt	University of Auckland, New Zealand		Imaging the Chemical environments of individual Fluid Inclusions using Synchrotron Fourier Transform Infrared microscopy
10:50	MORNING COFFEE					
11:20	Far-IR Condensed Phase	Dominique Appadoo	Jean-Blaise Brubach	Synchrotron SOLEIL, France	INVITED	Recent results on material research using the AILES Beamline
11:50			Larry Carr	NSLS Brookhaven, USA		Photo-induced spectroscopy of GaAs in a magnetic field: time-resolved circular dichroism
12:10			Petra Hellwig	University of Strasbourg, France		Hydrogen bonds and protonation reactions in membrane proteins: a far infrared spectroscopic approach
12:30			Gernot Hoehne	Bruker Optik, Germany	INDUSTRY	Instrumental Developments in Molecular Spectroscopy: New Components, Accessories and Technologies
12:50	LUNCH					
1:50	Materials Applications	Andrea Perucchi	Bill van Bronswijk	Curtin University, Australia		Detection of Water in Radiation damaged zircon using Synchrotron FTIR-ATR
2:10			Alexey Kondyurin	University of Sydney, Australia		Synchrotron IR imaging of protein coating on vascular stents
2:30			Song Ha Nguyen	Swinburne University of Technology, Australia		Correlation between the proportion of epicuticular waxes and wettability among various species of dragonfly wing
2:50			Mark Frogley	DIAMOND Light Source, UK		Infrared Microanalysis of Molecular Deformations in Graphene Oxide Based Materials During Nanomechanical Tensile Tests
3:10	Time Resolved Studies	Danielle Martin	Ulrich Schade	Helmholtz-Zentrum Berlin, BESSY II, Germany		A Féry Prism based Mid-IR Spectrometer with μ s Time Resolution in Single-Shot Mode
3:30			Ferenc Borondics	Canadian Light Source, Canada		Electrochemical reaction kinetics followed by FTIR spectromicroscopy - Approaching the diffraction limit

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09:00						
09:30	TRAVEL TO SYNCHROTRON					
12:00	POSSIBLE WELCOME TALK AT SYNCHROTRON					
12:15	LIGHT LUNCH					
1:00	TOUR OF THE AUSTRALIAN SYNCHROTRON					
3:00	POSSIBLE BUS DEPARTS SYNCHROTRON					