

DAE-BRNS Theme Meeting on Ultrafast Science-2018 (UFS-2018)

October 22-24, 2018

Convention Centre, Raja Ramanna Centre for Advanced
Technology, Indore (M.P.)

PROGRAMME SCHEDULE



Day-1, Monday, October, 22, 2018

Time	Program	
8:30-9:30	Registration	
9:30-11:00	Inaugural session: Presided over by Dr. P.A. Naik, Director, RRCAT	
	Keynote Address: Prof. Kankan Bhattacharya	
	Inauguration of exhibition by Prof. Kankan Bahttacharya	
Directors Tea (11:00-11:30)		
Technical Session-1		
Chairperson - Dr. K. Bhattacharya, IISER, Bhopal		
11:30-12:15	PL-1	Plenary Lecture by
		Prof. Narayana Rao, UoH, Hyderabad
		1D Photonic Crystal: Cavity Enhancements in Nonlinear Absorption and Photoluminescence of BaTiO ₃ and Slow Light Demonstration at the Band Edges
12:15-12:45	IT-1	Dr. H.N. Ghosh, INST, Mohali
		Ultrafast Exciton-Plasmon Dynamics in Semiconductor-Metal and Semiconductor-Janus Hetero-Structures
12:45-13:15	IT-2	Dr. A. Datta, IIT-Bombay, Mumbai
		Ultrafast processes in solvent mixtures and nanomaterials
Lunch-13:15-14:15		

Technical Session-2**Chairperson - Dr. P.A.Naik, RRCAT**

14:15-14:45	IT-3	Dr. M. Krishnamurthy, TIFR, Hyderabad
		Acceleration of neutral atoms in laser produced plasmas
14:45-15:15	IT-4	Dr. J.A. Chakera, RRCAT, Indore
		Ultrashort xuv/x-ray generation and its applications
15:15-15:45	IT-5	Dr. S. V. Rao, UoH, Hyderabad
		Femtosecond Laser Processing and Applications: New Avenues

Tea-15:45-16:00**16:00-16:40****Technical Presentations****Technical Session-3****Chairperson- Dr. U. Bovensiepen, University of Duisberg-Essen, Germany**

16:40-17:10	IT-6	Dr. S. S. Prabhu, TIFR, Mumbai
		Tera Hertz (THz) Sources and Detectors Using Modified Bulk, Surface and Antenna Designs
17:10-17:40	IT-7	Dr. R. N. Kini, IISER, Thiruvananthapuram
		Charge Density Wave in spin ladder compound $\text{Sr}_{14}\text{Cu}_{24}\text{O}_{41}$ studied using Terahertz spectroscopy
17:40-18:10	IT-8	Dr. Sayan Bhattacharyya, CAFM, IISER-Kolkata, Mohanpur
		Solar Cells by Quantum Dots

Dinner-19:30 Onwards

Day-2, Tuesday, October, 23, 2018

Technical Session-4

Chairperson- Dr. D. Narayana Rao, UoH, Hyderabad

9:30-10:15	PL-2	Plenary Lecture by
		Prof. U. Bovensiepen, Uni. of Duisberg-Essen, Germany
		Energy dissipation dynamics in strongly correlated electron systems driven out of equilibrium
10:15-10:45	IT-9	Dr. A. Barman, SNBNCBS, Kolkata
		Ultrafast Spin Orbitronics
10:45-11:15	IT-10	Dr. J. Jayabalan, RRCAT, Indore
		Ultrafast Charge Transport in Hybrid Nanomaterials

Tea-11:15-11:45

Technical Session-5

Chairperson- Dr. A. K. Kar, Heriot Watt University, UK

11:45-12:15	IT-11	Dr. D. K. Palit, UM DAE-CBS, Mumbai
		Ultrafast Dynamics of Hydrogen Bond: Time-Resolved Infrared Spectroscopic Study
12:15-12:45	IT-12	Dr. Pratik Sen, IIT-Kanpur, Kanpur
		Photo-induced Electron and Proton Transfer Reaction in Marcus Inverted Region
12:45-13:15	IT-13	A Samantha, UoH, Hyderabad
		Ultrafast Charge Carrier Dynamics and Photoluminescence of All-Inorganic Perovskite and Perovskite-Related Materials

Lunch-13:15-14:15

Technical Session-6		
Poster Session		
14:15-16:00		Poster Presentation and Tea
16:05-16:45		Technical Presentation
Technical Session-7		
Session-7: Chairperson- Shri S.V. Nakhe, RRCAT, Indore		
16:45-17:15	1T-14	Dr. P. K. Datta, IIT-Kharagpur, Kharagpur
		Probing Exciton Dynamics in Transition Metal Dichalcogenides Through Broadband Transient Absorption Spectroscopy
17:15-17:45	IT-15	Dr. K. K. Pant, RRCAT, Indore
		An infra-red FEL based user facility for materials research
17:30-18:00	IT-16	Dr. P.K. Mukhopadhyay, RRCAT, Indore
		Generation and Amplification of Dissipative Solitons in Fiber Laser
18:00-18:30	Tea	
18:30-20:00	Cultural Programme	
20:00 onwards	Dinner	

Day-3, Wednesday, October, 24, 2018

Technical Session-8

Chairperson- Dr. P.B.Bisht, IIT-Madras, Chennai

9:15-10:00	PL-3	Plenary Lecture by
		Dr. A. K. Kar, Heriot Watt University, UK
		Integrated Photonic Manufacturing Enabled by Ultrafast Laser Technology
10:00-10:30	IT-17	Dr. Manoj Kumar Bhuyan, CSIR-CSIO, Chandigarh
		Nano-fabrication and Ultrafast Dynamics of Silica Glass Excited by Bessel Laser Beams
10:30-11:00	IT-18	Dr. Gopal Dixit, IIT-Bombay, Mumbai
		Probing Defects via High-Harmonic Generation from Solids

Tea-11:00-11:30

Technical Session-9

Chairperson- Dr. D. K. Palit, UM DAE-CBS, Mumbai

11:30-12:00	IT-19	Dr. Jahur Alam Mondal, BARC, Mumbai
		Laser Spectroscopy at "Molecular" and "Macroscopic" Interfaces
12:00-12:30	IT-20	Dr. A. K. Chaudhary, ACHREM, UoH, Hyderabad
		Evaluation of some organic crystals for efficient THz generation and its Application in spectroscopy of High Energy Materials
12:30-13:00	Concluding Session: Presided over by Dr. P.A. Naik, Director, RRCAT	

Lunch-13:00-14:30