VII International Conference on Sustainable Energy & Environmental Challenges (16th-18th December 2022) Technical Schedule at a Glance

		$16^{ m th}$ December 2022				
	12:00-01:00 PM	Lunch				
	Venue	Conference Room-1 (ABLT1)	Conference Room-2 (ABLT2)	Conference Room-3 (ABLT3)	Conference Room-4 (ABLT4)	
Day-1	01:00-02:50 PM	Session A-1: Advanced Engine Technologies	Session B-1: Air Pollution Monitoring	Session C-1: Anaerobic Digestion	ISEES Awardees Presentation	
	02:50-03:15 PM	Tea Break				
	03:15-04:00 PM	Plenary Talk by Dr. SSV Ramakumar, Director (R&D), Indian Oil				
ı	04:00-05:50 PM	Session A-2: Combustion and Flames	Session B-2: Air Pollution Control	Session C-2: Biodegradation of Toxic Chemicals		
	05:50-06:00 PM	Tea Break				
	06:00-07:30 PM	Inaugural, Award and Book Release Function				
	07:30 PM Onwards			erence Banquet		
			17 th December 20			
	09:00-09:45 AM	Plenary Talk by Dr. Ajay Kumar , Former Union Defense Secretary, MoD GoI				
	09:45-10:15 AM			Tea Break		
	10:15 AM-12:15 PM	Session A-3: Energy and Exergy	Session B-3: Desalination and Wastewater Treatment	Session C-3: Environmental Bioengineering	Session B-9: Pollution and Climate Change: Challenges and Priorities.	
2	12:15-01:30 PM	Lunch and Poster Session				
Day-2	01:30-03:30 PM	Session A-4: Alternative Transportation Fuels and Materials	Session B-4: Emerging Environmental Contaminants	Session C-4: Sustainable Processing of Biomass	Session C-9: Human Health & Environmental Sustainability	
	03.30-04.00 PM	Tea Break				
	04:00-06:00 PM	Session A-5: Sprays and Atomization	Session B-5: Solid Waste: Challenges and Mitigation	Session C-5: Solid Waste Management	Session C-10: Sustainable Food & Agri Biotechnology	
	06:00-07:00 PM	General Body Meeting of ISEES (For ISEES Members only)				
	07:30 PM Onwards			ner (By invitation only)		
			18 th December 20	22		
	09:00-11:00 AM	Session A-6: Modelling and simulations	Session B-6: Renewable Energy Technologies	Session C-6: Bioremediation	Session C-11: Biofuels and Biorefineries-II	
	11:00-11:30 AM	Tea				
Day-3	11:30 AM-01:00 PM	Session A-7: Engine Emissions and Control	Session B-7: Cleaner Technologies for Pollution Mitigation	Session C-7: Microbial Processes	Session B-10: Energy and Environment	
Da	01:00-02:00 PM	Lunch				
	02.00-04:00 PM	Session A-8: Coal & Biomass Gasification	Session B-8: Environmental Challenges Mitigation	Session C-8: Biofuels and Biorefineries-I		
	04:00-05:00 PM	Valedictory & Best Paper Presentation Awards, Chief Guest: Dr. Suvro Kamal Dutta, Former Media and Parliamentary Advisor to the Defence Minister				
	05:00 PM onwards		High Tea and	Closure of the Conference		

^{*}Keynote Speaker: 25+5 min, Invited Speaker: 15+5 min, Contributed Speaker: 8+2 min, all timing includes Q&A Session

VII International Conference on Sustainable Energy & Environmental Challenges (16th-18th December 2022) Detailed Technical Schedule

	es Presentation (Session Chair: TBD) (V	enue: Abl 14, 11me: 01:00-02:50 FM, Date: 10 December 2022)
01:00-01:10 PM	Best Master Thesis: Ayush Tripathi, IIT Kanpur	Dimethyl Ether Fuelled Single Cylinder Compression Ignition Engine Prototype Development and Experimental Evaluation
01:10-01:20 PM	Best Master Thesis: Aaishi Ashirbad, IIT Kanpur	Laser Plasma Assisted Combustion of Gasoline Direct Injected Spray in a Constant Volume Combustion Chamber
01:20-01:30 PM	Best Master Thesis: Deepak Kumar, IIT Kanpur	Comparative Total Cost of Ownership Analysis of Two and Four Wheelers Battery Electric Vehicles and Internal Combustion Engine Powertrain Vehicles
01:30-01:40 PM	Best Master: Jitendra Choudhary*, IISER Bhopal	Modelling of Thermal and Hybrid Advanced Oxidation Reaction Kinetics for Degradation of Organic Pollutants
01:40-01:50 PM	Best PhD Thesis: Dr. Karishma Maheshwari, MNIT Jaipur	Experimental Studies on Treatment of Ro Reject & Dye Contaminated Water by Capacitive Deionization Through Development of Biomass Derived Activated Carbon Composite Material
01:50-02:00 PM	Best PhD Thesis: Dr. Rohit Kumar, IIT Bombay	Measurement of Laminar Burning Velocity of Surrogate Fuels at Elevated temperatures with Kinetic Analysis
02:00-02:10 PM	Best PhD Thesis: Dr. Avnish Kumar, CSIR-IIP, Dehradun	Catalytic Oxidative Conversion of Lignin to Value-Added Chemicals
02:10-02:20 PM	Best PhD Thesis: Dr. Sarthak Nag, The University of Tokyo	Mechanistic insights into nanobubble dynamics through in-situ liquid-phase electron microscopy
02:20-02:30 PM	YSA: Dr. Anshul Yadav, CSMCRI, Bhavnagar	Membrane distillation process for high saline and wastewater treatment
02:30-02:40 PM	YSA: Dr. M. Krishnamoorthi, IIT Kanpur	Gasoline Compression Ignition (GCI) engine performance with G70 over the full operating range
02:40-02:50 PM	YSA: Dr. Manabendra Saharia	Physics- and Data-Driven Modeling for Sustainable Water Management
* Video presentation	n made available by Awardees.	
	vanced Engine Technologies (Session C	hair: Prof. P A Laxminarayan, Sympsons) (Venue: ABLT1, Time: 01:00-02:50 PM, Date: 16 th December 2022)
01:00-01:30 PM	Keynote: Dr. D. Uma Maheshwar GE Aerospace	GE Aerospace – Sustainability Strategy and Technologies
01:30-01:50 PM	Invited: Prof Jacek Hunicz, Lublin University of Technology, Poland	Waste Polymer Pyrolytic Oil Blends as Valuable Fuels for Modern Compression Ignition Engine
01:50-02:00 PM	Vikram Kumar, Avinash Kumar Agarwal	SEEC2022_058: Effect of Injection Timing on The Performance and Emissions from Dual-Fuel Engine
02:00-02:10 PM	Ankur Tripathi, Bhargav Saikia, RR Sahoo, AP Singh	SEEC2022_080: Reactivity Controlled Compression Ignition Engine: - As Solution for Emissions Reduction Leading to Alternative Fuel
02:10-02:20 PM	Bhargav Saikia, Ankur Tripathi, AP Singh	SEEC2022_083: Gasoline Compression Ignition for Simultaneous Reduction of Oxides of N2 And PM
02:20-02:30 PM	Shanti Mehra, Avinash Kumar Agarwal,	SEEC2022_081: Applicability of Dimethyl Ether (DME) As A Replacement for Conventional Diesel Fuel in a Tractor Engine
	Hardikk Valera, Vikram Kumar	
02:30-02:40 PM	Hardikk Valera, Vikram Kumar Tomesh Kumar Sahu, Pravesh Chandra Shukla	SEEC2022_124: Gaseous and Particulate Emissions Investigation of Higher Alcohol Blends in A Modified CI Engine
02:30-02:40 PM 02:40-02:50 PM	Tomesh Kumar Sahu, Pravesh Chandra	
02:40-02:50 PM Session B-1: Air	Tomesh Kumar Sahu, Pravesh Chandra Shukla Saurabh Yadav, Binita Pathak Pollution Monitoring (Session Chair: I	SEEC2022_124: Gaseous and Particulate Emissions Investigation of Higher Alcohol Blends in A Modified CI Engine SEEC2022_188: Characterization of A Dental Spray Using High-Speed Shadow Imaging to Examine the Spray Morphology Dr. Kirpa Ram, IESD BHU) (Venue: ABLT2, Time: 01:00-02:50 PM, Date: 16th December 2022)
02:40-02:50 PM	Tomesh Kumar Sahu, Pravesh Chandra Shukla Saurabh Yadav, Binita Pathak	SEEC2022_124: Gaseous and Particulate Emissions Investigation of Higher Alcohol Blends in A Modified CI Engine SEEC2022_188: Characterization of A Dental Spray Using High-Speed Shadow Imaging to Examine the Spray Morphology Dr. Kirpa Ram, IESD BHU) (Venue: ABLT2, Time: 01:00-02:50 PM, Date: 16 th December 2022) Sources And Climate Forcing of Aerosol Brown Carbon in The Eastern Indo-Gangetic Plain
02:40-02:50 PM Session B-1: Air	Tomesh Kumar Sahu, Pravesh Chandra Shukla Saurabh Yadav, Binita Pathak Pollution Monitoring (Session Chair: I Keynote: Dr.Sayantan Sarkar, IIT Mandi Invited: Dr. Arnab Sarkar, IIT (BHU) Varanasi	SEEC2022_124: Gaseous and Particulate Emissions Investigation of Higher Alcohol Blends in A Modified CI Engine SEEC2022_188: Characterization of A Dental Spray Using High-Speed Shadow Imaging to Examine the Spray Morphology Dr. Kirpa Ram, IESD BHU) (Venue: ABLT2, Time: 01:00-02:50 PM, Date: 16th December 2022)
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	Pranav Agarwal, Gaurav Sarode, Piyush Kokate, Anirban Middey, Roshan Wathore	SEEC2022_144: Design of Cost Effective Aq Data Acquisition Module for Urban Environment
02:40-02:50 PM	Anushri Vaidya, Hemant Bherwani, Rajesh Biniwale	SEEC2022_115: Connecting Midpoint Impacts to Endpoint Impacts: A Case Study of Building Infrastructure from LCA Approach
Session C-1: Ana	aerobic Digestion (Session Chair: Dr. A	nna Marouskova, Institute of Technology and Business in České Budějovice, Czech Republic) (Venue:
ABLT3, Time: 01	1:00-02:50 PM, Date: 16th December 2022	
01:00-01:20 PM	Invited: Dr. Josef Maroušek, Institute of Technology and Business, Czech Republic	Valorization of Biogas Fermentation Residues
01:20-01:40 PM	Invited: Dr. V Vivekanand, Malaviya National Institute of Technology, Jaipur	Solid-State Anaerobic Digestion of Agricultural Stubble and Its Simultaneous Treatment for Improved Methanogenesis
01:40-02:00 PM	Invited: Dr. Grzegorz Piechota, Gpchem Laboratory of Biogas Research and Analysis, Poland	Natural Adsorbents in The Process of Biogas Upgrading to Biomethane Quality
02:00-02:20 PM	Invited: Dr. Abha Kumari, Amity Institute of Biotechnology, Noida	Strategic Potential of Flower Waste as A Feedstock for Biogas Production
02:20-02:30 PM	Pushpita Das, Dr. Lepakshi Barbora, Prof. Vijayanand S. Moholkar,	SEEC2022_123: Biodesulfurization of Recalcitrant Organo-Sulfur Compounds in Model Oil by Rhodococcus Rhodochrous (MTCC 3552)
02:30-02:40 PM	J Santhosh, Dr. S Venkata Mohan	SEEC2022_126: Biohythane (Bio-H-CNG) Production from Food Waste in Continuous Mode Operation
03:15-04:00 PM	Plena	ry Talk by Dr. SSV Ramakumar, Director (R&D), Indian Oil, Date: 16th December 2022
		Title of the Talk: Future fuels under Net Zero Scenario
Session A-2: Cor	mbustion and Flames (Session Chair: D	r. D. Uma Maheshwar, GE Aerospace) (Venue: ABLT1, Time: 04:00-05:50 PM, Date: 16th December 2022)
	Keynote: Prof. Michal Petru, Technical	Approach of Development of The Lightweight Structures for Modular Platform for Autonomous Chassis of Specialized Electric
04:00-04:30 PM	University of Liberec	Vehicles for Freight and Equipment Transportation
04:30-04:50 PM	Invited: Dr. Paramvir Singh, NIT Agartala	Effects of Aromatics in Fuel on Emissions
04:50-05:00 PM	Pragya Berwal, Sudarshan Kumar	SEEC2022_093: Effect of Ammonia Cracking on The Laminar Burning Velocity of Methane-Air Mixtures At Elevated Temperature
	Vijay Shinde, Sudarshan Kumar, Amardeep	SEEC2022_094: Measurements of Laminar Burning Velocity of Ethane-Air Mixtures at Elevated Temperatures
05:00-05:10 PM		
05:00-05:10 PM 05:10-05:20 PM	Fulzele Amardeep Fulzele, Subhankar Mohapatra,	SEEC2022_119: Measurements of Laminar Burning Velocity of N-Dodecane/Air Mixture at Elevated Temperature
	Fulzele	SEEC2022_119: Measurements of Laminar Burning Velocity of N-Dodecane/Air Mixture at Elevated Temperature SEEC2022_120: Thermogravimetric Analysis of Petroleum Pitch in An Inert Atmosphere
05:10-05:20 PM	Fulzele Amardeep Fulzele, Subhankar Mohapatra, Sudarshan Kumar Khokan Sahoo, Neeraj Kumbhakarna,	
05:10-05:20 PM 05:20-05:30 PM	Fulzele Amardeep Fulzele, Subhankar Mohapatra, Sudarshan Kumar Khokan Sahoo, Neeraj Kumbhakarna, Sudarshan Kumar Mohammad Kalamuddin Ansari, Saran	SEEC2022_120: Thermogravimetric Analysis of Petroleum Pitch in An Inert Atmosphere
05:10-05:20 PM 05:20-05:30 PM 05:30-05:40 PM 05:40-05:50 PM	Fulzele Amardeep Fulzele, Subhankar Mohapatra, Sudarshan Kumar Khokan Sahoo, Neeraj Kumbhakarna, Sudarshan Kumar Mohammad Kalamuddin Ansari, Saran Solagar, Dr. Sudarshan KumarMudit Sood Kumar Saurabh, Rudrodip Majumdar	SEEC2022_120: Thermogravimetric Analysis of Petroleum Pitch in An Inert Atmosphere SEEC2022_097: Effect of Hydrogen Addition on Emissions in Flameless Combustion with Liquid Fuel
05:10-05:20 PM 05:20-05:30 PM 05:30-05:40 PM 05:40-05:50 PM	Fulzele Amardeep Fulzele, Subhankar Mohapatra, Sudarshan Kumar Khokan Sahoo, Neeraj Kumbhakarna, Sudarshan Kumar Mohammad Kalamuddin Ansari, Saran Solagar, Dr. Sudarshan KumarMudit Sood Kumar Saurabh, Rudrodip Majumdar Pollution Control (Session Chair: Prof Keynote: Dr. Anjan Ray, CSIR-Indian	SEEC2022_120: Thermogravimetric Analysis of Petroleum Pitch in An Inert Atmosphere SEEC2022_097: Effect of Hydrogen Addition on Emissions in Flameless Combustion with Liquid Fuel SEEC2022_072: Projection of Two-Wheeler Vehicle Fleet in India Using Road Density Per Capita for Accurate Emission Estimatio
05:10-05:20 PM 05:20-05:30 PM 05:30-05:40 PM 05:40-05:50 PM Session B-2: Air	Fulzele Amardeep Fulzele, Subhankar Mohapatra, Sudarshan Kumar Khokan Sahoo, Neeraj Kumbhakarna, Sudarshan Kumar Mohammad Kalamuddin Ansari, Saran Solagar, Dr. Sudarshan KumarMudit Sood Kumar Saurabh, Rudrodip Majumdar Pollution Control (Session Chair: Prof Keynote: Dr. Anjan Ray, CSIR-Indian Institute of Petroleum Dehradun Invited: Prof. Swarnendu Sen, Jadavpur	SEEC2022_120: Thermogravimetric Analysis of Petroleum Pitch in An Inert Atmosphere SEEC2022_097: Effect of Hydrogen Addition on Emissions in Flameless Combustion with Liquid Fuel SEEC2022_072: Projection of Two-Wheeler Vehicle Fleet in India Using Road Density Per Capita for Accurate Emission Estimation A.B. Gupta, MNIT Jaipur) (Venue: ABLT2, Time: 04:00-05:50 PM, Date: 16 th December 2022)
05:10-05:20 PM 05:20-05:30 PM 05:30-05:40 PM 05:40-05:50 PM Session B-2: Air 04:00-04:30 PM 04:30-04:50 PM	Fulzele Amardeep Fulzele, Subhankar Mohapatra, Sudarshan Kumar Khokan Sahoo, Neeraj Kumbhakarna, Sudarshan Kumar Mohammad Kalamuddin Ansari, Saran Solagar, Dr. Sudarshan KumarMudit Sood Kumar Saurabh, Rudrodip Majumdar Pollution Control (Session Chair: Prof Keynote: Dr. Anjan Ray, CSIR-Indian Institute of Petroleum Dehradun Invited: Prof. Swarnendu Sen, Jadavpur University	SEEC2022_120: Thermogravimetric Analysis of Petroleum Pitch in An Inert Atmosphere SEEC2022_097: Effect of Hydrogen Addition on Emissions in Flameless Combustion with Liquid Fuel SEEC2022_072: Projection of Two-Wheeler Vehicle Fleet in India Using Road Density Per Capita for Accurate Emission Estimation A.B. Gupta, MNIT Jaipur) (Venue: ABLT2, Time: 04:00-05:50 PM, Date: 16 th December 2022) Decentralized Approaches to Greenhouse Gases and Pollutant Emissions Mitigation Mitigation of Air Pollution-Challenges and Strategies
05:10-05:20 PM 05:20-05:30 PM 05:30-05:40 PM 05:40-05:50 PM Session B-2: Air 04:00-04:30 PM 04:30-04:50 PM 04:50-05:10 PM	Fulzele Amardeep Fulzele, Subhankar Mohapatra, Sudarshan Kumar Khokan Sahoo, Neeraj Kumbhakarna, Sudarshan Kumar Mohammad Kalamuddin Ansari, Saran Solagar, Dr. Sudarshan KumarMudit Sood Kumar Saurabh, Rudrodip Majumdar Pollution Control (Session Chair: Prof Keynote: Dr. Anjan Ray, CSIR-Indian Institute of Petroleum Dehradun Invited: Prof. Swarnendu Sen, Jadavpur University Invited: Dr. Harish C Phuleria, IIT Bombay	SEEC2022_120: Thermogravimetric Analysis of Petroleum Pitch in An Inert Atmosphere SEEC2022_097: Effect of Hydrogen Addition on Emissions in Flameless Combustion with Liquid Fuel SEEC2022_072: Projection of Two-Wheeler Vehicle Fleet in India Using Road Density Per Capita for Accurate Emission Estimatio A.B. Gupta, MNIT Jaipur) (Venue: ABLT2, Time: 04:00-05:50 PM, Date: 16 th December 2022) Decentralized Approaches to Greenhouse Gases and Pollutant Emissions Mitigation Mitigation of Air Pollution-Challenges and Strategies Developing Vehicular Fleet Emission Factors and Prediction of Super-Emitters Through Real-World Studies
05:10-05:20 PM 05:20-05:30 PM 05:30-05:40 PM 05:40-05:50 PM Session B-2: Air 04:00-04:30 PM	Fulzele Amardeep Fulzele, Subhankar Mohapatra, Sudarshan Kumar Khokan Sahoo, Neeraj Kumbhakarna, Sudarshan Kumar Mohammad Kalamuddin Ansari, Saran Solagar, Dr. Sudarshan KumarMudit Sood Kumar Saurabh, Rudrodip Majumdar Pollution Control (Session Chair: Prof Keynote: Dr. Anjan Ray, CSIR-Indian Institute of Petroleum Dehradun Invited: Prof. Swarnendu Sen, Jadavpur University	SEEC2022_120: Thermogravimetric Analysis of Petroleum Pitch in An Inert Atmosphere SEEC2022_097: Effect of Hydrogen Addition on Emissions in Flameless Combustion with Liquid Fuel SEEC2022_072: Projection of Two-Wheeler Vehicle Fleet in India Using Road Density Per Capita for Accurate Emission Estimation A.B. Gupta, MNIT Jaipur) (Venue: ABLT2, Time: 04:00-05:50 PM, Date: 16 th December 2022) Decentralized Approaches to Greenhouse Gases and Pollutant Emissions Mitigation Mitigation of Air Pollution-Challenges and Strategies

04:00-04:20 PM	Invited: Dr. Vivek K Gaur, Ulsan National Institute of Science and Technology, Republic of Korea	Engineering Escherichia Coli for Production of Polyhydroxy propionate Homopolymer
04:20-04:40 PM	Invited: Dr. Nidhi Pareek, Central University of Rajasthan, Kishangarh, Ajmer	Combinatorial Process Development for Rationalized Recycling of Nutrients for Environment Clean-Up and Waste-Management
04:40-05:00 PM	Invited: Dr. Jaydeep Bhattacharya, School of Biotechnology, JNU, New Delhi	Anisotropic nano structures for detection and degradation of toxic chemical and biotic contaminants
05:00-05:10 PM	Dharmendra Singh Ken, Alok Sinha	SEEC2022_125: Electrochemical Advanced Oxidation of Cod and Ammonical Nitrogen from Laboratory-Prepared Coke-Oven Wastewater
05:10-05:20 PM	Azhagu Saravana Babu Packirisamy, Vajiha Aafrin Basheer, Sai Nandhini Ravi, Sugumari Vallinayagam, Sukumar Muthusamy	SEEC2022_131: Potential Therapeutic Application of Polyphenols from Juice Industry Waste: A Novel Approach On Waste To Wealth
05:20-05:30 PM	Sushmita Tiwari, Ramakrishnan Parthasarathi	SEEC2022_077: Biopolymer Based Composite Membrane: Demethoxylated Lignin Based Porous Film for Heavy Metal Ion Filtration
09:00-09:45 AM	Plenary	Talk by Dr. Ajay Kumar, Former Union Defense Secretary, MoD GoI, Date: 17th December 2022 Title of the Talk: Defense and Security Challenges for India in future
Session A-3: Enc December 2022)		chintya Mukhopadhyay, Jadavpur University) (Venue: ABLT1, Time: 10:15 AM-12:15 PM, Date: 17th
10:15-10:45 AM	Keynote: Prof. P A Laxminarayan, Sympsons	Energy Storage Methods
10:45-11:05 AM	Invited: Mr. Ayush Pant, FEV	Investigations of Emission Reduction Potential of Diesel-Methanol Blends in A HD-Diesel Engine
11:05-11:25 AM	Invited: Dr Saket Verma, BITS Pilani	Comparative Exergy Analysis for the Utilization of Alternative Fuels in Dual Fuel Engines
11:25-11:35 AM	Bipin G. Vyas	SEEC2022_167: Energy, Exergy Analysis, And Optimizations of Paddle Wheel Operated Portable Model for Enhanced Brine Evaporation
11:35 AM-11:45 AM	Srijit Biswas, Avinash Kumar Agarwal	SEEC2022_055: Parametric Optimization of the CNG/Ethanol-Induced RCCI Profiles in Biodiesel Combustion Through a Robust Design Space Foray
11:45-11:55 AM	Ankur Kalwar, Avinash Kumar Agarwal	SEEC2022_062: Emissions Assessment from M15 Fuelled BSVI SI Engine
Session B-3: Des December 2022)		Session Chair: Prof. Alok Sinha, HT (ISM) Dhanbad) (Venue: ABLT2, Time: 10:15 AM-12:15 PM, Date: 17 th
10:15-10:45 AM	Keynote: Prof. A.B. Gupta, MNIT Jaipur	Energy Consumption and Cost Optimization in Community Ro Plants (CROPs) for Rural Drinking Water Supplies
10:45-11:05 AM	Invited: Prof. Munish Chandel, IIT Bombay	Sustainable Urban Water System: Water-Energy-Greenhouse Gas Nexus
11:05-11:25 AM	Invited: Dr. Archana Sarkar, National Institute of Hydrology, Roorkee	Water Security in A Changing Climate: Challenges and Way forward with Special Emphasis to Indian Water Resources
11:25-11:45 AM	Invited: Prof. Bhabani K Satapathy, IIT Delhi	Sustainable electrospun mats as microplastic-free control release fertilizer systems
11:45-11:55 AM	Kirti Rajvanshi, Muktesh Bhatt, Munish Kumar Upadhyay, Johan Goemets, Paul Campling, Abhas Singh	SEEC2022_185: Impact of Treated Wastewater Agricultural Reuse on Groundwater Quality: A Case Study in Kanpur, India
11:55 AM-12:05 PM	Utkarsh Misra, Nandini Dixit, Swatantra Pratap Singh	SEEC2022_078: Optimized Laser-Induced Graphene Based Surfaces for Desalination and Wastewater Treatment
12:05-12:15 PM	Komal Saini, Amrita Kumari, Abhisek Sahoo, Kamal Kishore Pant, Thallada Bhaskar	SEEC2022_085: Hierarchical Lignin Carbon Using Eggshell as Activating Agent for Wastewater Treatment
		hair: V Vivekanand, Malaviya National Institute of Technology, Jaipur) (Venue: ABLT3, Time: 10:15 AM-
12:15 PM, Date:	17 th December 2022)	
10:15-10:45 AM	Keynote: Dr. Indu Shekhar Thakur, Amity University, Gurugram	Biological Looping Mechanisms for Decarbonization of Carbon Dioxide for Production of Biofuel and Biomaterials by Microorganism
10:45-11:05 AM	Invited: Dr. Keshab Mondal, Vidyasagar University, Midnapur	Fungal Laccase-Mediated Detoxification of Laboratory Dyes
11:05-11:25 AM	Invited: Dr. Akhilesh Tiwari, Indian Institute of Information Technology, Prayagraj	Condensation of Atmospheric Water Vapour Its Feasibility as Active Potable Source and Physicochemical Analysis

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11:25-11:45 AM	Invited: Dr. Preeti Chaturvedi, CSIR-Indian	Effective Elimination of Toxic Azo Dyes Using Biochar-Microbial Composite Hybrid Technology			
11.45 11.55 AM	Institute of Toxicology Research, Lucknow	SEEC2022_074: Patterns of Antimicrobial Resistance in The Major Waterways of Chennai			
11:45-11:55 AM 11:55 AM-12:05	Thara M V, Indumati M Nambi Arpita Das, Dr. Samuel Lalthazuala Rokhum	SEEC2022_106: Microwave Assisted Synthesis of Glycerol Carbonate from Glycerol with Dimethyl Carbonate Transesterification			
PM	Arpita Das, Dr. Samuei Laithazuaia Kokhum	Using Terminalia Arjuna Bark Calcined Ash as Catalyst			
	ownstive Transportation Evels and Mat				
December 2022)	Session A-4: Alternative Transportation Fuels and Materials (Session Chair: Prof. HSN Murthy, IIT Madras) (Venue: ABLT1, Time: 01:30-03:30 PM, Date: 17th				
	Keynote: Prof Achintya Mukhopadhyay,	Active and Passive Techniques for Mitigation of Thermal Runaway in Lithium-Ion Batteries			
01:30-02:00 PM	Jadavpur University	Active and I assive Techniques for Midgadon of Thermal Runaway in Element-ion Datteries			
02:00-02:20 PM	Invited: Prof Dilip Sharma, NIT Jaipur	Feasibility of HHO Fueled CI Engines			
	Invited: Ms. Prakrati Sethi, Methanol	Methanol; The Future-Proof Fuel			
02:20-02:40 PM	Institute				
02:40-03:00 PM	Invited: Prof Shailendra Sinha, Lucknow	Effect of Nano particles as additives in biodiesel in CI engine			
03:00-03:20 PM	Invited: Prof Srinibas Karmakar, IIT KGP	Combustion Characteristics of Alternative Aviation Fuels			
03:20-03:30 PM	Ashish Nayyar, Chandan Kumar	SEEC2022_075: Experimental Analysis of Blended Fuel with EGR on Agriculture Based Diesel Engine			
Session B-4: Em	erging Environmental Contaminants (S	Session Chair: Prof. Swarnendu Sen, Jadavpur University) (Venue: ABLT2, Time: 01:30-03:30 PM, Date: 17th			
December 2022)					
01:30-01:50 PM	Invited: Dr. Ramesh Dharavath H N, IIT (ISM) Dhanbad	Optimal Allocation of Surface Water and Groundwater Resources for Crop Production			
01:50-02:10 PM	Invited: Dr. Ambika S, IIT Hyderabad	Photocatalytic Membrane for The Treatment of Emerging Contaminants in Agricultural Run-Off			
02:10-02:30 PM	Invited: Dr. Bijay P. Tripathi, IIT Delhi	Nanostructured Responsive Microgel Membranes for Separation and Purification Applications			
02:30-02:40 PM	Nishant Kumar, Shravan Kumar Singh, Nikhil Chander	SEEC2022_127: Performance Comparison of Vertical Bifacial Solar PV Module in East-West and North-South Facing Configuration in Summer Season at An East-Central Indian Location			
02:40-02:50 PM	Najmul Haque Barbhuiya, Utkarsh Misra, Bhavana Kanwar, Swatantra P. Singh	SEEC2022_071: Advanced Oxidation Process in Combination with Electroconductive Membranes for Removing Emerging Contaminant			
02:50-03:00 PM	Priyansha Gupta,Mahua Saha, Suneel	SEEC2022_090: Vertical Distribution and Characterization of Microplastics in The Sediment Core Samples from The Eastern Arabian			
02.00 00.00 1 111	Vasimalla, Chayanika Rathore	Sea			
03:00-03:10 PM	Aniket Desai, Mandar Nanajkar	SEEC2022_092: Risk Assessment of Plastic Additive (Dehp) On Pearl Spot (Etroplus Suratensis)			
03:10-03:20 PM	Subhashini, Dr. Tarak Mondal	SEEC2022_176: Catalytic Pyrolysis Of Plastic Waste Over Synthesized Hzsm-5 To Obtain Fuel Grade Hydrocarbons			
	stainable Processing of Biomass (Sessio Date: 17 th December 2022)	n Chair: Akhilesh Tiwari, Indian Institute Of Information Technology, Prayagraj) (Venue: ABLT3, Time:			
01:30-03:30 FM,	Invited: Dr. Thallada Bhaskar, CSIR-Indian	Role of Feedstock and Process			
01:30-01:50 PM	Institute of Petroleum, Dehradun	Role of Peeuslock and Process			
01:50-02:10 PM	Invited: Dr. Bhuwan B Mishra, CIAB Mohali	Valorisation of Spent Aromatic Waste to Platform Chemicals			
	Invited: Dr. Ashish N. Sawarkar, MNIT	A Case Study of Finger Millet Straw			
02:10-02:30 PM	Allahabad, Prayagraj				
00.00 00 50 00.5	Invited: Dr. Baskar Gurunathan, St.	Production of Biodiesel from Food Waste Using a Citrus Fruit Peel Biochar Catalyst			
02:30-02:50 PM	Joseph's College of Engineering, Chennai				
02:50-03:00 PM	Mahendra Tiwari, Vinu R.	SEEC2022_073: Resource and Energy Recovery Through Microwave Assisted Co-Pyrolysis of Rice Straw Pellets and Multi-Layered Packaging Waste			
03:00-03:10 PM	Tarini Prasad Sahoo, Shreya Sadukha,	SEEC2022_110: Pre-Treated Biomass of Chlorella Variabilis for The Adsorptive Removal of Water Colorant: Phase Transfer And			
	Ramalingam Dineshkumar, Gurunathan	Thermodynamic Modelling			
	Baskar, Madhava Anil Kumar				
03:10-03:20 PM	Ranaprathap Katakojwa, Dr. S Venkata Mohan	SEEC2022_118: Biorefining of Surplus Agri-Waste Biomass Through Hydro-Catalyzed Valorisation for Energy-Dense Chemicals And Fuels			
Session A-5: Spr	rays and Atomization (Session Chair: Pr	rof Srinibas Karmakar, IIT Kharagpur) (Venue: ABLT1, Time: 04:00-06:00 PM, Date: 17 th December 2022)			
04:00-04:20 PM	Invited: Dr. Yogeshwar Nath Mishra, University of Gothenburg	SLIPI-Based Techniques for 2D and 3D Imaging of Sprays and Combustion Species			
04:20-04:40 PM	Invited: Dr. Chaitanya Kumar Rao, IIT Kanpur	Application of Liquid Fuel Atomization for Medical Diagnostics			
04:40-05:00 PM	Invited: Dr. Venugopal, IIT Bhubaneswar	Pulsed Jets for Flow Control and Mixing			
04.40-00.00 I M	invited. Dr. venugopai, iri Dhubaneswar	1 who was tot 1 to was control and mixing			

05:00-05:20 PM	Invited: Dr. Rajesh Kumar Prasad, UIET Kanpur	Development of Laser Ignited Hydrogen Fueled Supercharged Engine
05:20-05:30 PM	Utkarsha Sonawane, Avinash Kumar Agarwal	SEEC2022_053: Experimental Study on Spray Characteristics of Diesel and Diethyl Ether Blends Under Split Injection Strategy
05:30-05:40 PM	Ashutosh Jena, Avinash Kumar Agarwal	SEEC2022_066: Investigation of Spray Wall Impingement of Gasoline and Methanol Using Port Fuel Injector Under Crossflow Condition
05:40-05:50 PM	Sabyasachi Mondal, Sourav Sarkar, Achintya Mukhopadhyay, Swarnendu Sen	SEEC2022_133: Investigation on Downstream Mixing Behavior Due to Fuel Injection from Bluff Body Embedded Fuel Port
05:50-06:00 PM	Rahul Kumar Singh, Avinash Kumar Agarwal	SEEC2022_063: Impact of Methanol Addition into Gasoline on BS-VI Port Fueled Si Engine's Combustion and Performance Characteristics
Session B-5: Sol	id Waste: Challenges and Mitigation (So	ession Chair: Prof. Munish Chandel, IIT Bombay) (Venue: ABLT2, Time: 04:00-06:00 PM, Date: 17 th December
2022)		
04:00-04:30 PM	Keynote: Prof. Alok Sinha, IIT (ISM) Dhanbad	Economic Evaluation of Anaerobic Hybrid Membrane Bioreactor (AnHMBR) Treating Leachate at Mesophilic Temperature
04:30-04:50 PM	Invited: Prof. Priya Chandran, NIT Calicut	Some exemplary initiatives at NIT Calicut on Solid Waste Management
04:50-05:10 PM	Invited: Dr. Manoj Kumar Tiwari, IIT Kharagpur	Waste To Wealth: Circular Economy in Solid Waste Management
05:10-05:20 PM	Shivani Singh, Dr. Preeti Chaturvedi Bhargava	SEEC2022_111: Effect of Seasonal Variations on Dissemination of Args in Community Landfill Sites
05:20-05:30 PM	Diwakar Kumar Singh, Anurag Garg	SEEC2022_134: Mitigation of Ecological Risk Due to Presence of Heavy Metals in Sewage Sludge Through Thermal Hydrolysis
05:30-05:40 PM	Hemant Thakur, Atul Dhar, Satvasheel Powar	SEEC2022_61: Anaerobic Co-Digestion of Food Waste and Primary Sewage Sludge Towards Bio-Methane Production: A Comparative Analysis
05:40-05:50 PM	Roshan Vilasrao Mankhair, Munish Kumar Chandel	SEEC2022_161: Estimating Resource Recovery Potential of Legacy Waste Excavated from An Indian Dumpsite
05:50-06:00 PM	Rohit, Munish K. Chandel	SEEC2022_163: Modeling and Evaluating a Small-Scale Solar Pyrolysis System for Treating Municipal Solid Waste Using A Lumped Approach
Session C-5: Sol	id Waste Management (Session Chair: I	Or. Ashish N. Sawarkar, Motilal Nehru National Institute of Technology Allahabad, Prayagraj) (Venue:
ABLT3, Time: 04	4:00-06:00 PM, Date: 17th December 2022	
04:00-04:30 PM	Keynote: Dr. Sunil Kumar Khare, Indian Institute of Technology Delhi, New Delhi	Assessment And Evaluation of Microplastic Particles from Gorai Beach of Arabian Sea
04:30-04:50 PM	Invited: Dr. Sunita Varjani, Gujarat Pollution Control Board, Gandhinagar	Common Effluent Treatment Facility for Treatment of Industrial Wastewater: Limitations And Perspectives
04:50-05:10 PM	Invited: Dr. Vinod K. Garg, Central University of Punjab, Bathinda	Vermicomposting Technology for Non-Toxic Biodegradable Wastes
05:10-05:30 PM	Invited: Dr. Manoj K. Sharma, Jawaharlal Nehru University, New Delhi	Multipurpose Sorghum Feedstock for Biofuel Production: A Sustainable Solution
05:30-05:40 PM	Phurailatpam Sujata Devi, Meena Khwairakpam	SEEC2022_101: The Abundance and Diversity of Invertebrates in Vegetable Waste During the Pile Composting
05:40-05:50 PM	Nishant Ranjan, Sandeep Kumar	SEEC2022_132: Plastic and Agro Wastes Co-Gasification Using Aspen Plus: A Restricted Equilibrium Model
	•	: Prof Dilip Sharma, NIT Jaipur) (Venue: ABLT1, Time: 09:00-11:00 AM, Date: 18th December 2022)
09:00-09:30 AM	Keynote: Prof Raja Benerjee, IIT Hyderabad	Combustion of Ammonia as A Carbon-Neutral Fuel
09:30-09:50 AM	Invited: Dr. Chetan Kumar Patel, IIT Patna	Effect of exhaust gas recirculation composition on soot in ECN spray A conditions
09:50-10:10 AM	Invited: Dr. Rajesh Mishra, Czech Republic	Numerical Modeling and Experimental Analysis of Light-Weight Composite Structures for Automotive Applications
10:10-10:30 AM	Invited: Dr. Anirudha Ambekar, IIT Goa	Alternative Fuels for Aviation
10:30-10:40 AM	Chandan Kumar, Mukesh Kumar, Umesh Kumar Das, K. B. Rana, Ashish Nayyar	SEEC2022_068: Experimental and Numerical Study of Diesel-Diethyl Ether-2-Methoxy Ethyl Ether Blends in Ci Engines
10:40-10:50 AM	Rajeeb Kumar Upadhyay, Pushpendra K Vishwakarma, Kirti Bhushan Mishra	SEEC2022_102: Numerical Investigation on Thermal Response of a Separator
10:50-11:00 AM	Priyaranjan Jena, Reetu Raj, Deepak Kumar Singh, Jeewan Vachan Tirkey	SEEC2022_147: Mathematical Simulation of Si Engine Performance Using Sewage Sludge Derived Producer Gas with Methane Blend

Session B-6: Ren	newable Energy Technologies (Session	Chair: Dr. Satvasheel Ramesh Powar) (Venue: ABLT2, Time: 09:00-11:00 AM, Date: 18th December 2022)
09:00-09:30 AM	Keynote: Prof. Sudipta De, Jadavpur University	'Is Optimized Distributed Hybrid Renewable Systems a Future Sustainable Energy Solution for India?'
09:30-09:50 AM	Invited: Dr. Shihabudheen M. Maliyekkal, IIT Tirupati	Nanotechnology-Enabled Point-of-Use Sustainable Water Treatment Systems
09:50-10:10 AM	Invited: Dr. Om Prakash Singh, IIT (BHU) Varanasi	Solar Energy: Opportunity for Design Innovations
10:10-10:30 AM	Invited: Dr. Balkrisna Mehta, IIT Bhilai	Cooling of Solar PV Panels for Enhanced Efficiency
10:30-10:40 AM	Prajakta Ramteke, Asmita S. Jadhav Sunit K. Singh and Nitin K. Labhsetwar	SEEC2022_109: Aluminium-Iron Oxide Based Adsorbent for Effective Selenium Remediation Form Drinking Water: Batch and Column Adsorption Studies
10:40-10:50 AM	Kapil Pareek, Jayesh Sharma	SEEC2022_069: Non-Contact Testing Using Infrared Thermography in Renewable Energy Sector
10:50-11:00 AM	Anubhav Kumar, Bijay P. Tripathi	SEEC2022_087: A Neutral PH Aqueous Organic Redox-Flow Battery for Renewable Energy Storage and Management
Session C-6: Bio 18 th December 2	(022)	Chaube, CSIR-Indian Institute of Integrative Medicines, Jammu) (Venue: ABLT3, Time: 09:00-11:00 AM, Date:
09:00-09:20 AM	Invited: Dr. Pratyoosh Shukla, Banaras Hindu University, Varanasi	Integrated Approaches for Microbial Bioremediation: Future Scope and Applications
09:20-09:40 AM	Invited: Dr. Balendu Shekhar Giri, Indian Institute of Technology, Guwahati	Biochar-Based Catalysts for The Abatement of Toxic Pollutants from Water Via Advanced Oxidation Processes
09:40-10:00 AM	Invited: Dr. Kashyap Dubey, Jawaharlal Nehru University, New Delhi	How to Treat Cancer Hospital Aqueous Waste?
10:00-10:20 AM	Invited: Dr. Priyangshu M Sarma, Innotech Interventions Pvt Ltd, Guwahati, India	Integrated Bio-Electrochemical System for Treatment of Produced Water: Concept to Commercialization
10:20-10:30 AM	Jyoti, Meena Khwairakpam	SEEC2022_096: Disease Suppressiveness in Tomato Plants Post Vegetable Waste Compost and Vermicompost Application.
10:30-10:40 AM	Boda Ravi Kiran, Dr. S. Venkata Mohan	SEEC2022_145: Photosystems and Pigment Profiling of Tetradesmus Sp. Symiict4 in In Response To High Light Irradiance
Session A-7: Eng	gine Emissions and Control (Session Ch	air: Prof Amitava Dutta, Jadavpur University) (Venue: ABLT1, Time: 11:30 AM-01:00 PM, Date: 18th
December 2022)		
11:30 AM-12:00 PM	Keynote: Prof. HSN Murthy	Insitu-hydrogen generation from aluminum water combustion
12:00-12:20 PM	Invited: Prof Kirti Bhushan Mishra, IIT Roorkee	Implication in measurement techniques for vehicular emission
12:20-12:30 PM	Dr. Suman Dey, Akhilendra Pratap Singh, Madhujit Deb, Pankaj Kumar Das	SEEC2022_150: Effect of Nanoparticle Additives in Performance-Emission Characteristics Of Higher Biodiesel Blends In A Single Cylinder Diesel Engine
12:30-12:40 PM	M. Krishnamoorthi, Avinash Kumar Agarwal	SEEC2022_056: Emissions Performance of A Gasoline Compression Ignition Engine At Idle And Low-Load Conditions
12:40-12:50 PM	Harmanpreet Singh, Sandeep Kumar, Saroj Kumar Mohapatra	SEEC2022_135: Investigation of The Characteristic Parameters of A Producer Gas Fired Dual Fuel Engine
12:50-01:00 PM	Shashank Shekhar, Avinash Kumar Agarwal	SEEC2022_157: Prototype Development of Methanol (MD95) Powered Compression Ignition Engine
Session B-7: Clear	ner Technologies for Pollution Mitigation (S	ession Chair: Dr. Shihabudheen M. Maliyekkal) (Venue: ABLT2, Time: 11:30 AM-01:00 PM, Date: 18 th
December 2022)		
11:30 AM-12:00 PM	Keynote: Prof. Shantanu Bhattacharya, IIT Kanpur	A Novel AOP Based Effluent Treatment Methodology: Perspectives of Working in An Industrial Setup
12:00-12:20 PM	Invited: Dr. Sandeep Kumar, IIT Bombay	Biomass Gasification - Sustainable Technology for Waste to Energy
12:20-12:40 PM	Invited: Dr. Parmod Kumar, IIT Mandi	Performance Enhancement of Methanol Reforming Reactor Utilizing Engine Exhaust Heat for Hydrogen Generation
12:40-12:50 PM	Sumona Koley, Siddhant Dash, Ajay S. Kalamdhad, Meena Khwairakpam	SEEC2022_128: Advanced Oxidation Processes: An Approach Towards the Removal of Disinfection By-Products' Precursor
12:50-01:00 PM	Kirtiman Singh, Shantanu Bhattacharya	SEEC2022_155: Design and Development of Improved Wastewater Treatment Plant Using Advanced Oxidation Process
Session C-7: Mic 18 th December 2		resh Kumar Dubey, Banaras Hindu University, Varanasi) (Venue: ABLT3, Time: 11:30 AM-01:00 PM, Date:
11:30 AM-12:00 PM	Keynote: Dr. Ramakrishnan Parthasarathi, CSIR-Indian Institute of Toxicology Research, Lucknow	Deriving Adverse Outcome Pathway Framework for Environmental Persistent Chemicals Through Computational Approaches

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12:00-12:20 PM	Invited: Dr. Nagendra Thakur, Sikkim University, Tadong	Comparative Study of Microbial Diversity and Antibiotic Resistance Profile at Various Temperature Gradients in The Vicinity Of High-Altitude Himalayas
12:20-12:40 PM	Invited: Dr. Archana Tiwari, Amity Institute of Biotechnology, Noida	Impact of Carbon Sources on Enhancing Lipid Productivity in Marine Diatoms
12:40-12:50 PM	Sathya Narayanan V, Nandakumar Arumugam, Jagadeeswaran K S, Pritam raj, Bharathiraja B, Mugesh S	SEEC2022_116: Process Development for The Enhanced Vitamin-B12 Synthesis from A Novel Microorganism
12:50-01:00 PM	Shikha Singh, Kamlesh Singh Yadav	SEEC2022_156: Enzymatic Transformation of Rutin to Quercetin and Rutinose
Session A-8: Coa	al & Biomass Gasification (Session Chai	ir: Prof Raja Benerjee, IIT Hyderabad) (Venue: ABLT1, Time: 02:00-04:00 PM, Date: 18th December 2022)
02:00-02:20 PM	Invited: Prof Jeewan V Tirkey, IIT BHU	Gasification of waste biomass and application to IC engine
02:20-02:40 PM	Invited: Dr Tushar Sharma, RGIPT Amethi	Utilisation of Carbon Dioxide for Oilfield Applications
02:40-03:00 PM	Invited: Prof. Satyajit Gupta, IIT Bhilai	2G Bioethanol Production from Organic Waste: An Overview of The Pre-Treatment Process and Case Studies
03:00-03:10 PM	Shruti Vikram, Sandeep Kumar	SEEC2022_112: Sensitivity Analysis of Biomass Gasification for Syngas Generation Under Varying Reactive Media
03:10-03:20 PM	Edin Michael, Santosh Kumar Sriramoju, Saptarshi Majumdar, Debaprasad Shee, Raja Banerjee	SEEC2022_169: Droplet combustion study of reclaimed coal water slurry
03:20-03:30 PM	Reetu Raj; Deepak Kumar Singh; Jeewan Vachan Tirkey	SEEC2022_146: Producer Gas Derived from Co-Gasification of Low-Grade Coal and Waste Mahua Biomass: Engine Application and Optimization
03:30-03:40 PM	Anurag Mishra, Sayak Banerjee, Raja Banerjee	SEEC2022_170: Optimization of Operating Parameters for Biomass Gasification in A Fixed-Bed Downdraft Gasifier
03:40-03:50 PM	Saumitra Thakur, Saket Verma, Dev Anand Gupta	SEEC2022_143: Effect of Ethanol Blending in A Gasoline-Fueled Si Engine Based on Exergy Analysis
03:50-04:00 PM	Rajneesh Kumar Yadav, Arun Pattanshetti and R Santhosh	SEEC2022_179: Experimental and Numerical Study of Biogas/Air Flames in A Non-Premixed Atmospheric Coaxial Combustor
Session B-8: Env	vironmental Challenges Mitigation (Ses	ssion Chair: Dr. Manoj Kumar Tiwari, IIT Kharagpur) (Venue: ABLT2, Time: 02:00-04:00 PM, Date: 18th
December 2022)		
02:00-02:20 PM	Invited: Dr. Dhiraj V Patil, IIT Dharwad	On The United Nations Sustainable Development Goal 7: Affordable and Clean Energy
02:20-02:30 PM	Pramod Kumar; Tabish Nawaz; Swatantra Pratap Singh	SEEC2022_86: Evaluation and Optimization of Electrocoagulation Process for Drill Site Wastewater Treatment
02:30-02:40 PM	Ankit Kumar, Meena Khwairakpam	SEEC2022_129: Vermifiltration: A Decentralized Treatment System for Low Strength Domestic Wastewater Treatment
02:40-02:50 PM	Muktesh Bhatt, Kirti Rajvanshi, Munish Kumar Upadhyay, Johan Gemoets, Paul Campling, Abhas Singh	SEEC2022_186: An Impact Assessment of Agricultural Soil Irrigated with Treated Tannery Wastewater
02:50-03:00 PM	Rashmi Ranjan, Swatantra Pratap Singh	SEEC2022_158: Fabrication of Thin Film Composite Membrane for Desalination: Effect of Parameters On Membrane Performance
03:00-03:10 PM	Syed Arwa A. Balkhi, Shaik Mahamad Allabakshi, P S N S R Srikar, Reetesh Kumar Gangwar, Shihabudheen M. Maliyekkal	SEEC2022_172: Atmospheric Pressure Non-Thermal Plasma: A Chemical-Free Approach for Antibiotics Degradation in Wastewater
03:10-03:20 PM	Rupam Nandan, Rashmi Ranjan, Swatantra Pratap Singh	SEEC2022_159: Lig Based Polyamide Reverse Osmosis Membrane for Water Purification and Desalination
03:20-03:30 PM	Abins Aziz, Bijily Balakrishnan, M. Nityadharan, And Shihabudheen M. Maliyekkal	SEEC2022_136: Calcium-Doped Chitosan-Go Nanocomposite Film with Enhanced Tensile Strength and Flexibility
03:30-03:40 PM	Sanjay Singh, Ayushi Khare, Sanjeev Chaudhari	SEEC2022_99: Mechanistic Aspects of Temperature Effect on Fluoride Uptake by Un-Calciend Synthetic Hydroxyapatite
03:40-03:50 PM	Shaik Mahamad Allabakshi, P S N S R Srikar, Reetesh Kumar Gangwar, Shihabudheen M. Maliyekkal	SEEC2022_175: Energy Efficient Degradation of Dye in Wastewater by A Novel Photo-Plasma Reactor
03:50-04:00 PM	Yogendra Singh Solanki, Aparna Upadhyay, Soumen Maity, Bharti Jasrotia	SEEC2022_153: Fluoride contamination mapping in groundwater and development of community based defluoridation unit: A case study of district Sonbhadra, Uttar Pradesh, India

Session C-8: Biofuels and Biorefineries (Session Chair: Grzegorz Piechota, Gpchem Laboratory of Biogas Research and Analysis, Poland) (Venue: ABLT3, Time:				
02:00-04:00 PM, Date: 18th December 2022)				
02:00-02:20 PM	Invited: Dr. Samuel L Rokhum, National	Sustainable Production of Biodiesel Using Functional Material as A Heterogeneous Catalyst		
	Institute of Technology, Silchar			
02:20-02:40 PM	Invited: Dr. Ashokkumar Veeramuthu	A biorefinery approach for high value-added bioproduct (astaxanthin) from algae and residue for biochar synthesis and metallic iron		
	SIMATS, Saveetha University, Chennai	production		
02:40-03:00 PM	Invited: Dr. Asha Chaubey, CSIR-Indian	Rare Streptomyces Spp. From NW Himalayas and Their Therapeutic Applications		
02.40-09.00 I M	Institute of Integrative Medicines, Jammu			
03:00-03:20 PM	Invited: Dr. Dipesh S Patle, Motilal Nehru	Simultaneous Optimization of Economic, Environmental, And Safety Criteria for Algal Biodiesel Process Retrofitted Using Dividing		
03.00-03.20 I M	National Institute of Technology Allahabad	Wall Column and Multistage Vapor Recompression for Sustainable Development		
03:20-03:30 PM	Tamilarasan K, Aswin Sidhaarth Kr	SEEC2022_051: Biohydrogen Production from Macroalgae Via Sonic-Biosurfactant Disintegration - An Energy-Efficient Approach		
03:30-03:40 PM	Indrajeet Yadav, Sanjay Kumar	SEEC2022_180: Photosynthetic Production of Isoprene by Genetically Engineered Cyanobacteria for Biofuel Application		
03:40-03:50 PM	Sourav Khanra, Anuradha, Muthu Kumar	SEEC2022_088: Deep Eutectic Solvents for The Pretreatment of Lignocellulose Feedstocks As Bio Refinery Process		
	Sampath			
04:05-04:25 PM	Valedictory address by Dr. S	Suvro Kamal Dutta, Former Media and Parliamentary Advisor to the Defence Minister, Date: 18th December 2022		
04.05-04:25 FM		Title of the Talk: G20 under the leadership of India the roadway ahead		

Parallel Session of Track-B And Track-C

		and Priorities. (Session Chair: Dr. Harish Phuleria, IIT Bombay) (Venue: ABLT4, Time: 10:15 AM-12:15 PM,
Date: 17th Decem		
10:15-10:35 AM	Invited: Mr. Niraj Sah, FEV India Pvt Ltd	Current Trends in Hydrogen Internal Combustion Engine
10:35-10:55 AM	Invited: Dr. Kirpa Ram, IESD BHU	Chemistry As a Sustainable Solution to Curb Environmental Pollution: Challenges and Way Forward
10:55-11:05 AM	Ravindra Singh, Alok Sinha	SEEC2022_139: Phthalate Pollution in The Aqueous Environment and Their Removal Technologies.
11:05-11:15 AM	Ashish Kumar, Najmul Haque Barbhuiya, Swatantra Pratap Singh	SEEC2022_076: Magnéli Phase Doped Laser-Induced Graphene Surfaces with Enhanced Electrochemical Activity for Environmental Remediation
11:15-11:25 AM	Kartik Srivastava, Rr Sahoo	SEEC2022_154: Thermoelectric Generators for Waste Heat Utilization: Means to Reduce Fossil Fuel Consumption and Produce Electricity
11:25-11:35 AM	Anshul Yadav	SEEC2022_166: UV-Cleaning PVDF-CO-HFP Tio2 Incorporated Membranes for Effective Removal of Dyes from Textile Industry Wastewater
11:35-11:45 AM	Raj Vardhan Patel, Anshul Yadav	SEEC2022_165: Experimental Study and Numerical Optimization for Removal of Methyl Orange Using Polytetrafluoroethylene Membrane in Vacuum Membrane Distillation Process
11:45-11:55 AM	Shivani Singh, Dr. Rahul Dev	SEEC2022_171: Design and Assessment of Solar Photovoltaic System: A Case Study
11:55 AM-12:05 PM	Shweta Rawat, Sanjay Kumar	SEEC2022_178: Investigations on Thermochemical Conversion of Wastewater Grown Microalgae Residue to Assess Bioenergy Potential
12:05-12:15 PM	Ayush Singh, Roshan Vilasrao Mankhair, Munish Kumar Chandel	SEEC2022_183: Determining Material Recovery Potential of Dumpsites in A Developing Country
Session C-9: Hu	man Health & Environmental Sustaina	bility (Session Chair: Dr. Kamlesh Choure, AKS University, Satna) (Venue: ABLT4, Time: 01:30-03:30 PM,
Date: 17th Decem		
01:30-01:50 PM	Invited: Dr. Jay Shankar Singh, Babasaheb Bhimrao Ambedkar University, Lucknow	Microbial Services in Energy and Environmental Sustainability
01:50-02:10 PM	Invited: Dr. Suresh Kumar Dubey, Banaras Hindu University, Varanasi	Cellulose Degradation Using Bacteria Isolated from Agro-Ecosystem
02:10-02:30 PM	Invited: Dr. Prabhanshu Tripathi, CSIR- IITR Lucknow	Artificial Sweetener Induced Modulation of Gut Microbiota Compromises Intestinal Barrier Functions
02:30-02:50 PM	Invited: Dr. Budhi Sagar Tiwari, Institute of Advanced Research, Gandhinagar, India	Requirement of Active Chloroplast for The Salinity Induced and Photo-Modulated Programmed Cell Death in Rice
02:50-03:00 PM	Yamini Javvadi, Dr S Venakata Mohan	SEEC2022_108: Deciphering the Dynamics Patterns of Microbial Antibiotic Resistance Genes (Args) Through Long-Term Wastewater Based Epidemiological Study

03:00-03:10 PM	Sai Nandhini R, Mugesh S, Ajay G, Sathya Narayanan V, Bharathiraja B	SEEC2022_117: Effect of Cofactor Engineering On 3-Hp Synthesis from Glycerol Using Recombinant Escherichia Coli
03:10-03:20 PM	Pallavi Shukla, Dr. Aradhana Mishra, Priya	SEEC2022_070: Potential of Herbal Nanoemulsion for Disruption of Methicillin Resistant Staphylococcus Aureus
	Verma, Ashutosh Tripathi, Ved Prakash Giri,	
	Navinit Kumar, Vinita Tiwari	
		Session Chair: Dr. R Parveen Kumar, Arunai Engineering College, Tiruvannamalai) (Venue: ABLT4, Time:
04:00-06:00 PM,	Date: 17 th December 2022)	
04:00-04:20 PM	Invited: Dr. Aradhana Mishra, National	Biotransformation of the Phytopathogen Fusarium Sp. Regarding Substrate Utilization Pattern by The Intervention of Biocontrol
	Botanical Research Institute, Lucknow Invited: Dr. Dev Mani Pandey, Birla	Pbe-8 During Wilt Disease in Tomato Impact of Soil Acidity Stress in Rice: A Computational and Molecular Approach
04:20-04:40 PM	Institute of Technology, Mesra, Ranchi	Impact of Son Actuaty Stress in Rice. A Computational and Molecular Approach
04 40 07 00 DM	Invited: Dr. Vinod Sangwan, CCS Haryana	Potential of Biofortified Crop Varieties Towards Food Quality and Sustainable Agriculture
04:40-05:00 PM	Agricultural University, Hisar	
05:00-05:20 PM	Invited: Dr. Sapna Sharma, Shri Ram	Phytochemicals Modulate Membrane Integrity in Metabolic Disorders
00.00 00.20 11.1	Swaroop Memorial University, Lucknow	
05:20-05:40 PM	Invited: Dr. Kamlesh Choure, AKS University, Satna	Role of Microbial Consortia for Making Quality Compost to Reduce the Load of Spent Mushroom Substrate
	Kumar Saurabh, Rudrodip Majumdar	SEEC2022_098: Conceptualizing Integrated Life-Cycle Management for Sustainable and Optimal Utilization of Used Cooking Oil
05:40:05:50 PM	Trainer Saurasii, Trainer Iriajainear	(UCO)
05:50-06:00 PM	Karan Kumar, Vijayanand S. Moholkar	SEEC2022_149: Unravelling the Genomic Differences Between Solventogenic Species Clostridium Acetobutylicum Atcc824 and
		Clostridium Pasteurianum Atcc6013
		:: Prof. Indu Shekhar Thakur, Amity University, Gurugrama) (Venue: ABLT4, Time: 09:00-11:00 AM, Date:
18 th December 2		
	Invited: Dr. Ajay Kumar Pandey,	Integrated Biorefinery Process Design for Co-Production of Bioethanol and Biogas Using Molasses and Lignocellulosic Biomass
09:00-09:20 AM	Chhatrapati Shahu Ji Maharaj University,	
	Kanpur: Invited: Prof. R. Praveen Kumar, Arunai	Current Trends and Progress of Heterogenous Nano Catalysts for The Production of Biodiesel from Microalgae
09:20-09:40 AM	Engineering College, Tiruvannamalai	Current Trends and Frogress of Heterogenous Nano Catalysts for The Froduction of Biodiesei from Microalgae
09:40-10:00 AM	Invited: Dr. N Stalin, Anna University	Enhancement of Bioreactor Activities by Operating Parameters Optimization Methods in Biofuel Production
	Invited: Dr. Anjana Pandey, Motilal Nehru	Algal Feedstock as Potential Biowaste for Mitigation of Organic Carbon and Generation of Bioenergy and Useful Products: A Solution
10:00-10:20 AM	National Institute of Technology Allahabad,	for Circular Bio Economy
	Prayagraj	
10:20-10:30 AM	Kankana Saikia, Samuel Lalthazuala	SEEC2022_105: Transesterification of Jatropha Curcas Oil for The Sustainable Production of Biodiesel by A Sulphonated Cellulose
	Rokhum	Derived Catalyst
10:30-10:40 AM	Viksit Singh Padam, Kancharana Venkata, Krishna Chaitanya	SEEC2022_067: Production of Biodiesel Using Microalgae
Session R-10. En		Prof. Sudipta De, Jadavpur University) (Venue: ABLT4, Time: 11:30 AM-01:00 PM, Date: 18th December 2022)
11:30 -11:40 AM	Shweta Singh, Atul Dhar, Satvasheel Powar	SEEC2022_187: Cradle to Gate Life Cycle Assessment of Mono-Crystalline Silicon Technology Considering Manufacturing in India
11:40-11:50 AM	Kunwar Abhishek Singh, Manoj Kumar	SEEC2022_138: Analyzing Long-Term Surface Water Changes In Uttar Pradesh Utilizing Google Earth Engine
11.50 AM 10.00	Tiwari Jitendra Panchiwala, Dilip Swami, B. R.	SEEC2022_190: A Review on Salt Yield Improvement Techniques and Applicability of Heat Exchangers: In the Context of The Salt
11:50 AM-12:00 noon	Andharia	Production Salt Yield Improvement Techniques and Applicability of Heat Exchangers: In the Context of The Salt
12:00-12:10 PM	Shweta Chaubey, Anshul Yadav, Vinod K	SEEC2022_160: Antifouling and Antibacterial Properties of Curcumin-Enriched Surfactant Nanoparticles Modified Polysulfone
	Shahi	Membranes
12:10-12:20 PM	Ankita Singh, Onkar Singh	SEEC2022_184: Parametric Study of SOFC-HAT-ORC Based Combined Power System
12:20-12:30 PM	Dev Anand Gupta, Saket Verma, Saumitra	SEEC2022_107: Exergy Analysis Based Optimization Technique Applied to A Spark Ignition Engine
	Thakur	
12:30-12:40 PM	Vasudev D. Chaudhari, D Deshmukh	SEEC2022_148: High compression ratio and extended load operation of gasoline-diesel and methanol-diesel fueled reactivity-
		controlled compression ignition (RCCI) engine