

Time (Hrs.)	Day 1: 28 <sup>th</sup> September 2023 (Thursday)
08:15 – 09:00	Registration
09:15 – 10:30	Inaugural Function
10:30 – 11:00	Exhibition Inauguration & Tea Break
11:00 – 13:30	Technical Session – 1 Session Chair:
11:00 – 11:45 PL1	Inventing the Future with Materials: ‘The Backbone of Modern Technology & Innovation <i>Dr. Navin Manjooran, Senior Vice President, ASM International, USA &amp; Solve-global, USA</i>
11:45 – 12:30 PL2	Thermal Process Prototyping & Spin-off Heat Treatment Technologies <i>N. Gopinath, Dr Vivek Singhal, Fluidtherm Technology, Chennai, India</i>
12:30 – 13:00 KL1	Large Area Graphene Based Metallic Surface is the choice for long term service life to metallic substrates. <i>Dr. Tapan Rout, Tata Steel, India</i>
13:00 – 13:30 KL2	A successful collaborative endeavor between ISRO & CUMI: Technology Absorption, Standardization & Space Qualification Process of 3-layer (Cr-Cu-Au) Metallized 99.6% Alumina Substrate for MIC Fabrication <i>Dr. Santanu Mandal, CUMI Murugappa, Chennai, India</i>
13:30 – 14:30	Lunch Break
14:30 – 16:45	Technical Session - 2 Session Chair:
14:30 – 15:15 PL3	The Extrinsic Features of Thermal Spray Microstructures that Provide Architectural Ingenuity <i>Prof. Christopher C. Berndt, Swinburne University, Australia</i>
15:15 – 15:45 KL3	Holistic Approach for Welding and Additive Manufacturing- Role of Materials & Technologies <i>Prof. S. Marya and Prof. J.Y. Hascoet, Ecole Centrale de Nantes, Nantes Cedex, France</i>

15:45 – 16:15 KL4	Xitiz Technology on Vacuum Heat Treatment through high performing, highly efficient and cost-effective solution for Hardening, Tempering, Annealing, Brazing, Solution Annealing, Stress Relieving and Low-Pressure Carburising through High Pressure Gas Quenching/Oil Quenching Through Horizontal and Vertical Furnaces <i>Manoranjan Patra, Xitiz Technomech LLP, USA</i>		
16:15 – 16:45 KL5	Modern Approach to the Quality Control of HT Processes Based on CQI-9 Requirements <i>Damian Bratcher, Super Systems Inc., USA</i>		
16:45 – 17:00	<b>Tea Break</b>		
17:00 – 18:00	<b>Technical Session – 3 (Invited Presentations)</b>		
	<b>HALL – A</b>	<b>HALL - B</b>	<b>HALL - C</b>
	<b>Technical Session 3A</b> <b>Session Chair:</b> To be decided	<b>Technical Session 3B</b> <b>Session Chair:</b> To be decided	<b>Technical Session 3C</b> <b>Session Chair:</b> To be decided
17:00 – 17:15	<b>IL-01:</b> Advance technology in low viscosity & shorter vapour phase quenching oils to control distortion in critical automotive parts <i>Atul Kamble, Hardcastle Petrofer Pvt. Ltd.</i>	<b>IL-05:</b> IPSEN Controlled Atmosphere Gas Carburising & Nitriding Technology <i>Partha Guharoy, Ipsen Technologies Pvt Ltd</i>	<b>IL-09:</b> Development of a Diffusion Bonding Press for manufacture of Stainless Steel 304 Plates used in Printed Circuit Heat Exchangers <i>Shubham Vishwakarma, Vijay Biradar, Pramod Kumar, Nagarjun Sakhamuri, Prameela Hind High Vacuum Company Pvt. Ltd.</i>
17:15 – 17:30	<b>IL-02:</b> Effect of Induction Hardening on the Durability of Nodular Iron Rear Spring Support Brackets <i>Mrunali S., Ashok Leyland Technical Centre</i>	<b>IL-06:</b> Recent trends in coating and surface modifications used in the off-highway industry. <i>Manish Gokhale, John Deere India Private Limited</i>	<b>IL-10:</b> Development of Wear Resistant Metal Matrix Composite by Hot Isostatic Process for High Pressure Grinding Application <i>Biju Karakkunnummal, FL Smidth</i>
17:30 – 17:45	<b>IL-03:</b> Energy efficiency in Heat Treatment Processes <i>Rudrarup Sengupta and Omprakash D, KANTHAL Alleima India Private Limited</i>	<b>IL-07:</b> High Temperature ceramic coating for Automotive Engine component <i>K Krishnamoorthy, Ashok Leyland Technical Centre</i>	<b>IL-11:</b> Powder Metallurgy Processing and Tribological Behaviour of Titanium Alloys for Biomedical Implant Applications <i>Rakesh Kumar Gautam, Rupesh Kumar, IIT BHU, Varanasi</i>

17:45 – 18:00	<b>IL-04:</b> Optimization of Induction Hardening & Tempering Heat Treatment using Self-Tempering to achieve cost reduction and energy conservation <i>Manish Gokhale, John Deere India Private Limited</i>	<b>IL-08:</b> Comparison of cold metal transfer and plasma transferred arc welding process for deposition of Stellite21 hard facing <i>Srinivasa R. Bakshi, Rajeev G.P. and Kamaraj M</i>	<b>IL-12:</b> Room Temperature Formability of Ultrafine Grained Materials <i>Suman Deb, IIT Bhubaneswar</i>
18:00 – 19:00	<b>Visit to Poster Session &amp; Exhibition</b>		
19:00 – 20:00	<b>Cultural Program</b>		
20:00 – 21:30	<b>Networking Dinner</b>		

<b>Day 2: 29<sup>th</sup> September 2023 (Friday)</b>	
<b>9:00 – 11:00</b>	<b>Technical Session – 4</b> <b>Session Chair:</b> To be decided
09:00 – 09:45 PL4	Case Hardening by Low Pressure Carburizing for Automotive and Aerospace industry <i>Kamil Siedlecki, Adam Adamek, SECO/WARWICK Group, Poland</i>
09:45 – 10:30 PL5	Diamond Coatings for Technological Applications <i>Prof. M.S. Ramachandra Rao, IIT Madras</i>
10:30 – 11:00 KL6	Base Oils and its Trends – For Modern Heat Treatment Applications <i>Elanchezhian. K., Savita Oil Technologies Limited, Mumbai, India</i>
<b>11:00 – 11:30</b>	<b>Visit to Exhibition &amp; Tea Break</b>
<b>11:30 – 13:30</b>	<b>Technical Session – 5</b> <b>Session Chair:</b> To be decided
11:30 – 12:00 KL7	Economic & Ecological Impact and Advantages of Plasma-based Surface Treatments <i>Martin Strutzenberger, Rubig Group, Austria</i>
12:00 – 12:30 KL8	Tools and Dies heat treatment in vacuum furnaces <i>Adam Adamek, SECO/WARWICK Group, Poland</i>
12:30 – 13:00 KL9	Low-Temperature Surface Hardening of Stainless Steel & Titanium <i>T.S. Hummelshøj, Expanite A/S, Denmark</i>

13:00 – 13:30 KL10	Heat treatment of additively manufactured tool steel and selected Titanium alloys <i>Prof. M. Pellizzari, University of Trento, Italy</i>		
13:30 – 14:30	<b>Lunch Break</b>		
14:30 – 16:00	<b>Technical Session – 6 (Invited Presentations)</b>		
	<b>HALL – A</b>	<b>HALL - B</b>	<b>HALL - C</b>
	<b>Technical Session 6A</b> <b>Session Chair:</b> To be decided	<b>Technical Session 6B</b> <b>Session Chair:</b> To be decided	<b>Technical Session 6C</b> <b>Session Chair:</b> To be decided
14:30 – 14:45	<b>IL-13:</b> Synergetic effect of process parameters and heat treatment on microstructure and mechanical properties of LPBF Processed MS300: Fabrication of Porous Structures <i>Harsh Soni and B.N. Sahoo, SVNIT Surat</i>	<b>IL-19:</b> Systematic Approach to Corrosion Protection <i>Soumyodeep Bhattacharya and Ravi Jaiswal, Zavenir Daubert India Private Limited</i>	<b>IL-25:</b> Development of indigenous high-hardness Armour Steel for ballistic protection <i>Sumit Rautela, Raghvendra Singh Chauhan, and Aarif Kamal, Jindal Stainless Limited</i>
14:45 – 15:00	<b>IL-14:</b> Electrical assisted forming and heat treatment <i>K. Hariharan, IIT Madras</i>	<b>IL-20:</b> Face centered cubic (fcc) titanium: Not an artifact in titanium / aluminum multilayer thin films <i>Ramaseshan, IGCAR Kalpakkam</i>	<b>IL-26:</b> New Approach towards solving NVH issues - Automotive Brake Friction Materials <i>Balaji Srinevasan and N. Balasubramanian, Rane Brake Lining Ltd.</i>
15:00 – 15:15	<b>IL-15:</b> Digitization and Data Analysis in Foundries – Predictive and Prescriptive Quality <i>Daniel Panny, UPC Marathon, USA</i>	<b>IL-21:</b> Application of novel nanoceramic coatings and in-situ surface modification methodologies to improve abrasive properties of alumina-based materials <i>N.S. Karthiselva, CUMI Murugappa</i>	<b>IL-27:</b> Thermal Processing related failures of Engineering Components <i>R.R. Bhat, Advisor - Aerospace, Menon and Menon Limited, Kolhapur</i>
15:15 – 15:30	<b>IL-16:</b> Novel heat treatment to improve temper embrittlement resistance of martensitic stainless steels	<b>IL-22:</b> Tribological properties of ceramic solid lubricants based anti-seize paste for high temperature applications- an economical	<b>IL-28:</b> Failure analysis of Instrumented Relief Valve (IRV) elbow joint of Power Station <i>Raman Saini, Suraj kumar, B N Rath,</i>

	<i>Bharat B. Panigrahi, Kirtiratan Godbole and C. R. Das, IIT Hyderabad</i>	alternative solution to molybdenum disulphide anti-seize pastes <i>Shubrajit Bhaumik, Amrita School of Engineering, Amrita Vishwa Vidyapeetham, Chennai</i>	<i>Nitin Kumawat, and P.P. Nanekar, Bhabha Atomic Research Centre, Mumbai</i>
15:30 – 15:45	<b>IL-17:</b> Effect of varying tempering temperatures on the microstructure and mechanical properties of low alloy steels <i>Ananthu Prasan and Nithin Raj P, Peekay Steels</i>	<b>IL-23:</b> Applications of Pulse-plasma Nitriding technology <i>V. Venkat, PVA Industrial Vacuum Systems GmbH</i>	<b>IL-29:</b> Development of high-performance age hardenable ultrafine grained AA6063/SiC nanocomposite sheets using a novel hybrid manufacturing. <i>Omkar Bemblage, IIT Dharwad</i>
15:45 – 16:00	<b>IL-18:</b> Vacuum heat treatment for Aerospace <i>Kamil Siedlecki, Seco/Warwick S.A. Swiebodzin, Poland</i>	<b>IL-24:</b> Transforming commercial heat treatment with Industry 4.0 <i>Rahul Masurekar, Ace Carbo Nitriders, Bangalore</i>	<b>IL-30:</b> A physical metallurgy study on AZ91/Ti surface composite developed through Friction stir processing for improving fatigue performance <i>Jose Immanuel, Indian Institute of Technology Bhilai, Raipur</i>
<b>16:00 - 16:20</b>	<b>Tea Break</b>		
<b>16:20 – 17:00</b>	<b>Technical Session – 7 (Contributed Presentations)</b>		
	<b>HALL – A</b>	<b>HALL - B</b>	<b>HALL - C</b>
	<b>Technical Session – 7A</b> <b>Session Chair:</b> To be decided	<b>Technical Session – 7B</b> <b>Session Chair:</b>	<b>Technical Session – 7C</b> <b>Session Chair:</b> To be decided
16:20 – 16:30	<b>CL-01:</b> Metallography - An indispensable tool in heat treatment quality <i>C. Renganathan, Chennai Metco Pvt. Ltd.</i>	<b>CL-05:</b> Residual Stress in Engineering Materials <i>Anand Joshi, Caterpillar India Pvt. Ltd.</i>	<b>CL-09:</b> Alternate material in place of EN353 for the production of gear box components <i>K Krishnamoorthy, Ashok Leyland Technical Centre</i>
16:30 – 16:40	<b>CL-02:</b> Optimization of Process and Heat-treatment Parameters on Metallurgical and Mechanical	<b>CL-06:</b> Study on the effects of acid passivation on hot corrosion resistance of hyper duplex stainless	<b>CL-10:</b> Material Selection through Artificial Intelligence in Automotive industry

	Characteristics of Aluminum Alloys: A Critical Study & Review <i>M. Jagannatham, S.A. Vimalathithan and V. Padmanabhan, Wheels India Ltd.</i>	steel <i>Nithin Raj P, Peekay Steels</i>	<i>Shanmugam S, Balaji VP, Diviya S, Karthi S, Kavitha R, and Mohankumar A, ZF Commercial Vehicle Control System India Limited</i>
16:40 – 16:50	<b>CL-03:</b> Heat treatment sequence and surface treatment effect in wheel bolt for improving fatigue life <i>Dhandapani P, Ragothaman Balakrishnan, Vijayaraj B, and Vijaysankar G, Mahindra and Mahindra ltd, Chennai</i>	<b>CL-07:</b> Optimization of the turning parameters of Multi-Axial Compressed AA-6061 Alloy using Taguchi Technique <i>A.K. Padap, A.P. Yadav, P.K. Yadav, and N. Kumar, BIET Jhansi, and C.I.P.E.T. Lucknow</i>	<b>CL-11:</b> Additive Manufacturing for Automotive Application – Case Study: Intercooler prototype <i>Muthupandy A., ZF Commercial Vehicle Control System India Limited</i>
16:50 – 17:00	<b>CL-04:</b> <i>To be decided.</i>	<b>CL-08:</b> Modeling of cold spray flow dynamics and particle acceleration and deformation of pure aluminum for the repair of aircraft structures <i>Rajendra Kumar R T P, Jayabal K, Kamaraj M and Srinivasa Rao Bakshi, IIITD&amp;M Kancheepuram, IIT Madras</i>	<b>CL-12:</b> Effect of tungsten content on liquid phase sintered W-Ni-Co tungsten heavy alloys <i>U. Ravi Kiran, J. Mahesh, S. Rajesh, J. Jhasi, P.K. Jena, and G. Prabhu, Defence Metallurgical Research Laboratory, Hyderabad</i>
<b>17:00 – 18:30</b>	<b>Technical Session – 8</b> <b>Session Chair:</b> To be decided		
17:00 – 17:30 KL11	Carburizing in a de-carburizing world <i>Gerald Hiller, ECM Furnaces, France</i>		
17:30 – 18:00 KL12	Bridging the Gap between Batch & Continuous Heat Treatment Furnaces <i>N Gopinath, Girish Chintawar, Fluidtherm Technology, Chennai, India</i>		
18:00 – 18:30 KL13	Improving Resistance to type IV cracking of P91 Steel Weld Joints by Modifying Initial Microstructure employing Heat treatment and/or TMT Processes Prior to Welding <i>M. Vasudevan, Indira Gandhi Centre for Atomic Research, Kalpakkam, India</i>		

<b>18.30 – 19.30</b>	<b>Visit to Exhibition and Poster Session</b>
<b>19.30 – 21.30</b>	<b>Dinner</b>

<b>Day 3: 30<sup>th</sup> September 2023 (Saturday)</b>			
<b>9:00 – 10:30</b>	<b>Technical Session – 9</b> <span style="float: right;"><b>Session Chair:</b> To be decided</span>		
09:00 – 09:30 KL14	Recent trends in Induction Heating <i>R.V. Chari, Cesar Cases and Pablo Arce, GH Induction, Chennai, India &amp; GH Electrotermia, S.A.U., Spain</i>		
09:30 – 10:00 KL15	Experimental Investigation of Laser Nitriding and Combined Texturing of Wire-Arc Additively Manufactured NiTi Shape Memory Alloy for Biomedical Applications <i>Dr. I.A. Palani, IIT Indore, India</i>		
10:00 – 10:30 KL16	Specialty Steels for Strategic Applications <i>Dr. R. Balamuralikrishnan, Defence Metallurgical Research Laboratory, Hyderabad, India</i>		
<b>10:30 – 11:00</b>	<b>Visit to Exhibition &amp; Tea Break</b>		
<b>11:00 – 12:15</b>	<b>Technical Session – 10</b>		
	<b>HALL – A</b>	<b>HALL - B</b>	<b>HALL - C</b>
	<b>Technical Session 10A</b> <b>Session Chair:</b> To be decided	<b>Technical Session 10B</b> <b>Session Chair:</b> To be decided	<b>Technical Session 10C</b> <b>Session Chair:</b> To be decided
11:00 – 11:15	<b>IL-31:</b> Nano-scale precipitate evolution, localization and phase transformations in Ni alloyed Fe-Mn-Al-C steel – Role of Heat Treatment <i>K. G. Pradeep, IIT Madras</i>	<b>IL-36:</b> Development of hardfacing technology for surfacing of nuclear power plant components <i>Hemant Kumar, C.R. Das, and M. Vasudevan, IGCAR Kalpakkam</i>	<b>IL-41:</b> Bead Geometry and Microstructural Properties of AZ31 Magnesium Alloy Deposited By Cold Metal Transfer Welding <i>Suresh Goka, Manjaiah M, National Institute of Technology Warangal</i>
11:15 – 11:30	<b>IL-32:</b> Effect of Solution Heat Treatment on Surface Modification of Single-Crystal <i>Nandam Srinivas, Defence Research and Development</i>	<b>IL-37:</b> Surface Treatment of Heat Sink Fins made of Aluminium alloy used for Thermal Management of Travelling Wave Tube Amplifiers <i>Himanshu Shukla and Sharad Shukla,</i>	<b>IL-42:</b> Novel modeling strategy to understand the deformation behaviour of cryo- manufactured materials <i>Srinivas Behera, NIT Rourkela</i>

	<i>Organization</i>	<i>ISRO Ahmedabad</i>	
11:30 – 11:45	<b>IL-33:</b> Heat Treatment of Aluminium Pressure Die Casting: Challenges and Opportunities <i>T.V.L. Narasimha Rao and S.L. Pramod, Sundaram Clayton Ltd.</i>	<b>IL-38:</b> Development of CVD Pyrolytic Graphite Coating for High Temperature Pyroprocessing Application - A Study on Molten Salts Corrosion <i>E. Vetrivendan, Hareesh Rongali, B. Madhura and S. Ningshen, IGCAR Kalpakkam</i>	<b>IL-43:</b> Effect of heat treatment on mechanical properties of LPBF processed gradient IN718 alloy <i>D. Kesavan, IIT Palakkad</i>
11:45 – 12:00	<b>IL-34:</b> Heat treatment in electroplating for enhanced performance properties <i>Kiran Sharanappa and Rohen Bhatnagar, Atotech India</i>	<b>IL-39:</b> Grain boundary relaxation and its effect on hardness and corrosion behavior of nanocrystalline Ni-P <i>Srikant Gollapudi, IIT Bhubaneswar</i>	<b>IL-44:</b> Study of Microstructure and Mechanical Properties of TIG Welded 304–316L Dissimilar Steel Joint <i>Prashant Pandey and S.B. Mishra, MNNIT, Allahabad</i>
12:00 – 12:15	<b>IL-35:</b> Influence of Post-Weld Heat Treatments on the Strength and Toughness characteristics of 12 mm thick Maraging steel C-250 fabricated via Laser Hybrid Welding <i>Bibin Jose, Manikandan Manoharan, and Arivazhagan Natarajan, Vellore Institute of Technology, Vellore</i>	<b>IL-40:</b> Development of Copper and Nickel based Coatings on Reinforcements and Composite Surfaces for Functional Applications <i>T.P.D. Rajan, Akhil M.G., Jerin K. Pancreicious, Sujith Vijayan, Bashida V.B. and Visakh M, CSIR-National Institute for Interdisciplinary Science and Technology, Trivandrum</i>	<b>IL-45:</b> Effect of the addition of Si <sub>3</sub> N <sub>4</sub> on the microstructure, mechanical properties and wear resistance of sintering of TiCN based cermets <i>V. Vetri Vel and Balasivanandha Prabu Shanmugavel, College of Engineering Guindy, Anna University</i>
12:15 – 13:15	<b>Technical Session – 11 (Contributed Presentations)</b>		
	<b>HALL - A</b>	<b>HALL - B</b>	<b>HALL - C</b>
	<b>Technical Session 11A Session Chair:</b>	<b>Technical Session 11B Session Chair:</b>	<b>Technical Session 11C Session Chair:</b>
12:15 – 12:25	<b>CL-13:</b> Influence of Heat treatment Process Disruptions to	<b>CL-19:</b> Comparative Analysis of Fretting Wear Resistance in Inconel	<b>CL-25:</b> Green steel a step towards Carbon Neutrality: A Review

	Catastrophic failures in Automotive Transmission <i>V Varun, V Sivakumar, G Vijay Sankar and V Senthilkumaran, Mahindra and Mahindra Ltd, Chennai</i>	718 Fabricated via L-PBF and Wrought Processes at Elevated Temperatures. <i>C.H. Sathisha, D. Kesavan, M.R. Sridhar, Y. Arivu, and S. Pramod, GE Aerospace Research, Bangalore, IIT Palakkad, and GE Vernova Research, Bangalore</i>	<i>Mohit Madavi, ZF Commercial Vehicle Control System India Limited</i>
12:25 – 12:35	<b>CL-14:</b> Study of Gear Distortion due to Heat Treatment <i>Senthilkumar Balu, ZF Wind Power, Coimbatore</i>	<b>CL-20:</b> Correlation of Torsional Fatigue strength with IGO depth generated during Carburizing <i>Bhalchandra Bhadak, Trishita Roy, and Nikhil Deo, Eaton India Innovation Center</i>	<b>CL-26:</b> Case study - Environmental assisted spring failure in commercial vehicle <i>Manivannan K.R., ZF Commercial Vehicle Control System India Limited</i>
12:35 – 12:45	<b>CL-15:</b> Elimination of ERW tube surface imperfection by modified heat treatment process <i>Venugopal Azhagarsamy, ZF Commercial Vehicle Control System India Limited</i>	<b>CL-21:</b> Fatigue analysis of Gas Nitrided AISI H13 Die Steel <i>Tarang Shinde, V.B. Maner, A.S. Shivade, A.B. Atpadkar, S.K. Raut, P.P. Nimbalkar, and M.L. Rathod, Yashoda Technical Campus, Maharashtra</i>	<b>CL-27:</b> Computational Thermodynamics and Thermo-Kinetics for Alloy design, Process Optimization and Characterization <i>K Guruvidyathri, University of Hyderabad</i>
12:45 – 12:55	<b>CL-16:</b> Innovative Heat Treatment solution with No-Man Operation of Batch type Furnace for High Throughput Production <i>Taif Hussain, Aichelin Unitherm Heat Treatment Systems India Pvt. Ltd</i>	<b>CL-22:</b> Pitting Corrosion in Exhaust Gas Recirculation system and its relation to the Fuel quality <i>Rakesh Mahendiran and Suresh Pulluru, Renault Nissan Technology &amp; Business Centre India Pvt Ltd</i>	<b>CL-28:</b> Effect of Quenching Medium on Mechanical Properties of W-Ni-Co Tungsten Heavy Alloy <i>Pradipta Kumar Jena, K Jagadeeshwar, and G Prabhu, Defence Metallurgical Research Laboratory, Hyderabad</i>
12:55 – 13:05	<b>CL-17:</b> Core Strength Enhancement of Gears and Shafts by use of High-Performance	<b>CL-23:</b> Influence of surface modifications on the emissivity of AISI 304L stainless steel	<b>CL-29:</b> Indigenous Development of Cannon Liner Steel: Lab to Industry Scale

	Quench Oil <i>Sivakumar G.K., Ramesh P., and Krishnamoorthy K., Ashok Leyland Technical Centre</i>	<i>Jhansi Kokkilagadda, Uday Kumar, IIT Madras</i>	<i>Ashok K, Snehashish Tripaty, Murugesan A P, Gopi K Mandal, Vikas C Srivastava, R R Singh, IIT Hyderabad</i>
13:05 – 13:15	<b>CL-18:</b> Validation of heat treatment technique employed for simulating microstructures of the heat-affected zones of P91 steel weld joint <i>K. Mariappan, Vani Shankar, A. Nagesha and M. Vasudevan, IGCAR Kalpakkam</i>	<b>CL-24:</b> Tribological studies of Fluoroelastomers used in ISI vehicle of PFBR <i>N.L. Parthasarathi, IGCAR Kalpakkam</i>	<b>CL-30:</b> Improvement in Wear Resistance properties of Austempered Ductile Iron (ADI) after Microalloying <i>D Parameswaran and Khushboo Rakha, Mahindra and Mahindra – Swaraj Division and Indian Institute of Technology Ropar</i>
<b>13:15 – 14:00</b>	<b>Lunch Break</b>		
<b>14:00 – 15:30</b>	<b>Technical Session – 12</b> <b>Session Chair:</b> To be decided		
14:00 – 14:30 KL17	Heat Treatment Optimization of Mechanical Properties in Additively manufactured Aluminum, Nickel and Cobalt based Superalloys for Gas Turbine Applications <i>Dr. Dheepa Srinivasan, Pratt &amp; Whitney R&amp;D Center United Technologies Corp., Bengaluru, India</i>		
14:30 – 15:00 KL18	Technical challenges and solutions to the complete thru-process temperature monitoring of key heat treatment applications combining heating and quench phases. <i>Jason Dervish, PhoenixTM Ltd, United Kingdom</i>		
15:00 – 15:30 KL19	Indigenization efforts towards the development of plasma sprayable powders and coatings for aerospace, energy and biomedical applications <i>Dr. S.T. Aruna, National Aerospace Laboratory, Bengaluru, India</i>		
<b>15:30 – 15:45</b>	<b>Tea Break</b>		
<b>15:45 – 16:45</b>	<b>Technical Session – 13</b> <b>Session Chair:</b> To be decided		
15:45 – 16:15 KL20	Corrosion Protection by Thermal Spray Coating for Oil and Gas Refinery Application <i>Dr. Urvesh Vala, L&amp;T Energy Hydrocarbon Engineering Ltd., Vadodara, India</i>		
16:15 – 16:45 KL21	Heat Treatment of Materials and Components for Space Applications <i>Dr. S.V.S. Narayana Murty, Liquid Propulsions System Centre, Trivandrum, India</i>		

<b>17:00 – 17:45</b>	<b>Valedictory Function</b>
<b>17:45 hrs</b>	<b>High Tea - Good Bye !</b>

**PL – Plenary Lecture; KL- Keynote Lecture; IL- Invited Lecture; CL-Contributory Lecture; P-Poster**

### **POSTER SESSION DETAILS**

<b>Poster Code</b>	<b>Poster Details</b>
<b>P01</b>	Microstructure and microhardness of heat-treated Alloy 625 fabricated by laser powder bed fusion <i>Dinesh Babu, VIT Vellore</i>
<b>P02</b>	Influence of Heat Treatment Cycles on the Work Hardening Behavior of Selective Laser Melted Ti6Al4V ELI Alloy <i>M. D. Sukre, and Anil Meena, IIT Madras</i>
<b>P03</b>	Characteristics of martensite-austenite island decomposition during two-step tempering treatment and its effect on mechanical properties in Mn-Ni-Mo steels <i>Rahul Ranjan, and Anil Meena, IIT Madras</i>
<b>P04</b>	Corrosion behaviour of oxide coatings synthesized with superheated steam over Maraging Steel in acidic environment <i>Arun Nair, Amal Jyothi College of Engineering</i>
<b>P05</b>	Fretting wear behaviour of AA2524T3 alloy <i>Rajendra Kumar R T P, Jayabal K, Kamaraj M, and Srinivasa Rao Bakshi, IIITD&amp;M Kancheepuram and IIT Madras</i>
<b>P06</b>	Numerical characterization of Particle Velocity in Aluminium Cold spray Coating <i>Ram Mukilan C, Rajendra Kumar RTP, Jayabal K, Kamaraj M, and Srinivasa Rao Bakshi, IIITD&amp;M Kancheepuram and IIT Madras</i>
<b>P07</b>	A Review on Application of Thermal Spray Coatings for Protection of Boiler Steels against Erosion-Corrosion Wear <i>Abhay Shankar Yadav, Motilal Nehru National Institute of Technology Allahabad</i>
<b>P08</b>	Modeling of Wetting Behavior of Developed Electrode Coating by Using Artificial Neural Network Approach <i>S. Mishra, IIT Jodhpur</i>

<b>P09</b>	Erosion Corrosion Resistance Performance Evaluation of the HVOF Sprayed Cr <sub>3</sub> C <sub>2</sub> -NiCr Coated AISI 304 Stainless Steel <i>K. Arunkumar, D. Sathiskumar, N. Kumaravel, L. Prithivraj, and N. Sivalingam, SRG Engineering College, Aniyapuram, Namakkal</i>
<b>P10</b>	Evaluating the Thermal Cyclic and Shock Performance of Multi-Layered Thermal Barrier Coatings <i>Renuka Y, and Anderson A, Sathyabama Institute of Science and Technology, Chennai</i>
<b>P11</b>	Surface engineered rare earth metal ion incorporated titanium substrate for orthopedic application. <i>S. Manju Bharathi and N. Rajendran, Anna University, CEG Campus</i>
<b>P12</b>	Investigation of the emittance properties of multilayer insulation used in cryogenic applications. <i>Uday Kumar, ITER-India, Institute for Plasma Research</i>
<b>P13</b>	Fabrication of nanostructure surface on titanium for orthopaedic applications <i>Ayisha Nachiya S.A.F, and N. Rajendran, Anna University, CEG Campus</i>
<b>P14</b>	Numerical Modeling of a tailored Stir Casting method for the Development of Globular Grains after Solidification <i>Nilesh Kumar, IIT Madras</i>
<b>P15</b>	Achieving Repeatability and Stability in Laser Color Marking of Stainless Steel AISI 304: Insights into Focal Length and Marking Position Significance <i>Ankit Awasthi, IIT Bombay</i>
<b>P16</b>	A Novel Approach to Overcome Casting Based Challenges in Magnesium Alloys <i>Vidya Tiwari and S.K. Panigrahi, IIT Madras</i>
<b>P17</b>	Characterization of Ni-13%WC8Co microwave clad on AISI-316 steel <i>Manavendra Mishra, S. B. Mishra, and D.K. Shukla, Motilal Nehru National Institute of Technology</i>
<b>P18</b>	Electroformed Copper Pillar structures on Additively Manufactured Template: Modeling and Validation <i>Prince Kumar Rai, IIT Jodhpur</i>
<b>P19</b>	Prediction and Modeling of Wetting Behavior of Formulated SMAW Electrode Coating Fluxes <i>A. Kumar, IIT Jodhpur</i>
<b>P20</b>	Tribological investigation of gas tungsten arc welded dissimilar joint of sDSS 2507/N50 steel <i>Anup Kumar Maurya, IIT Jodhpur</i>
<b>P21</b>	Dry Sliding Wear Study of Cao Reinforced Magnesium Matrix Nanocomposites <i>Shahul Hamid Khan, IIITD&amp;M - Kancheepuram</i>
<b>P22</b>	Influence of CaO Nanoparticles on Fretting Wear Characteristics of Mg Nanocomposites <i>Kartheesan S, Shahul Hamid Khan, and Kamaraj M, IIITD&amp;M Kancheepuram</i>

<b>P23</b>	Electrochemical Behavior of Gallium decorated Titania nanotube arrays <i>P. Muniyan &amp; N. Rajendran, Anna University, CEG Campus</i>
<b>P24</b>	Fabrication of bio-inspired gadolinium doped pedot on nanostructured titanium implants for orthopaedic applications <i>V. Sudhisha and N Rajendran, Anna University, CEG Campus</i>
<b>P25</b>	Polyaniline incorporated zirconium as osteoinductive implant material for orthopedic application. <i>A. Dharshini and N. Rajendran, Anna University, CEG Campus</i>
<b>P26</b>	Surface behavior of Tungsten nanoparticles doped TNTs and its electrochemical performances. <i>P. Cheranmadevi and N. Rajendran, Anna University, CEG Campus</i>
<b>P27</b>	Forging of Alumina Nano-Particle Reinforced Aluminium Based Metal Matrix Composites <i>Ravikumar K.S., Maharaja Institute of Technology Mysore</i>
<b>P28</b>	Modeling of Physicochemical, Thermophysical and wettability Characteristics of $\text{Al}_2\text{O}_3\text{-SiO}_2\text{-CaO-Na}_3\text{AlF}_6$ Based SMAW Coating <i>Alok Gupta, IIT Jodhpur</i>
<b>P29</b>	Effect of Laser Shock Peening on Microstructure and Corrosion Properties of AA 2014-T6 Aluminium Alloy <i>Chandan Kumar, and Manoj Kumar Reddy Perla, NIT Surathkal</i>
<b>P30</b>	Corrosion behaviour of electrochemically surface engineered zirconium alloys <i>Sushmi Shree G and Rajendran N, Anna University, CEG Campus</i>
<b>P31</b>	Development of high bond strength Al/Cu bimetallic sheets by an innovative hybrid manufacturing process <i>B. Prathyusha, Indian Institute of Technology Madras</i>
<b>P32</b>	Phase-field Modeling of Crystal Grain Growth <i>Maruthuparthasarathy. K, IIT Hyderabad</i>
<b>P33</b>	Effect of sub $\beta$ -transus treatment on microstructure and mechanical properties of LPBF method of Ti-6Al-4V alloy <i>S. Usha Rani, D. Kesavan, and M. Kamaraj, IIT Madras and IIT Palakkad</i>
<b>P34</b>	Experimental investigation of hot corrosion characteristics on bimetallic welds in a molten salt environment <i>Vijay Kumar, IIT Jodhpur</i>
<b>P35</b>	Development of Low-Cost Abrasive Flow Finishing Media using Waste Coal Fly-Ash, its Characterization and Performance Evaluation <i>Irfan Ahmad Ansari, IIT Kanpur</i>
<b>P36</b>	Kinetics of microstructural changes in P92 steel due to isothermal heat treatment <i>Mantosh Mandal, B. Aashranth, Dipti Samantaray, and M. Vasudevan, IGCAR Kalpakkam</i>

<b>P37</b>	Effect of recrystallisation and grain growth on the tensile strength and impact toughness of Laser Powder Bed Fusion processed Inconel 718 alloy <i>Pramod S. and Kesavan D, IIT Palakkad</i>
<b>P38</b>	Effect of Nanoparticles on Wear resistance of SS304 Metal Matrix Nanocomposite <i>A. Ravi Kumar, K. Velmurugan, V.S.K. Venkatachalapathy, A. Thiagarajan, A.B. Sainnath, and M. Baranidharanan, Sri Manakula Vinayagar Engineering College, Puducherry</i>
<b>P39</b>	Electrophoretic Deposition Method To modify 316L implants with doped bioceramics <i>R. Vignesh, S. Varshini, R. Abirami, R. Sasikumar, K.M. Veerabadran and T. M. Sridhar, University of Madras and Madras Institute of Technology</i>
<b>P40</b>	Surface Engineering of Medical grade 316L SS by nano-YSZ and PCL-nano TCP coatings for biomedical applications <i>S. Anu, K. Kala, S. Jabastin, M. Sundara Ganeasan, J. Priyankad, and S. Mohandoss, Rajalakshmi Engineering College, Saveetha School of Engineering, Saveetha Institute of Medical and Technical Sciences, Saveetha University, University of Madras, and Guru Nanak College</i>
<b>P41</b>	Effect of Reinforcement and Grain Refinement on Ageing Kinetics of ultrafine grained AA6061/Ti Particulate Surface Composite Developed through Friction Stir Processing <i>Ilyas Hussain and Jose Emmanuel, IIT Bhilai</i>
<b>P42</b>	Fabrication of FeCoNiMoW multi-component alloy coatings through electrodeposition technique <i>Koduru Venkatesh and V. Karthik, National Institute of Technology Tiruchirappalli</i>

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