

# RSD-2019: Oral Presentation Schedule

Saturday, 30<sup>th</sup> March 2019

## SESSION - 1 (SMD)

Sr. No.	Room No.	Session Chairs	Time-slot	Student Name	Title of the presentation
1	L-11	Vivek Singh & Hrushikesh Chavan	11:30 – 11:45	Rajesh Yadav	Vibrations of thin conical shells via gradient elasticity
2			11:45- 12:00	Ankur Dwivedi	Study of piezo-embedded negative mass metamaterial using generalized Bloch theorem for energy harvesting system
3			12:00 – 12:15	Aningi Mokhalingam	Comparing quantum and molecular models for graphene at large deformation
4			12:15 – 12:30	Sankalp Tiwari	Basis functions for interpolating residual stresses
5		(Faculty) Dr. Chandraprakash Chindam	12:30 – 12:45	Anshul Agrawal	Large deformation of thin circular rings in contact between rigid plates.
6		12:45 – 01:00	Arun Agrawal	Fracture Characterization of inhomogeneous solid using approximating polynomial eigenstrain	
7		01:00 - 01:15	Amit Kumar Rai	Vibration of circular plate subjected to moving point load	
8		01:15 - 01:30	Rashid Zafar Ansari	Effects of surface elasticity in ultra soft solids	

## SESSION - 2 (FTS)

Sr. No.	Room No.	Session Chairs	Time-slot	Student Name	Title of the presentation
9	L-12	Akanksha Gupta & Prashant Arya	11:30 – 11:45	Pradeep Singh	Experimental investigation illustrating the effects of surface roughness on leading edge separation
10			11:45- 12:00	Arihant Bhandari	Voltage fading in Li-MnO <sub>2</sub> battery
11			12:00 – 12:15	Sanjeev Kumar Ghai	On applications of the stochastic multiple mapping conditioning approach to turbulent nonpremixed and premixed combustion
12			12:15 – 12:30	Prem Bhukkal	Design and Development of a Loop Heat Pipe for Avionics Application
13		(Faculty) Dr. Aditya Saurabh	12:30 – 12:45	Manmeet Singh	Thermodynamic advantage of modular heat storage system in concentrated solar power plants
14		12:45 – 01:00	Shubham Katiyar	LES of transitional flow over a C-D compressor blade	
15		01:00 - 01:15	Ram K Shah	Control and Manipulation of Flows involving Magnetic Nano-fluids	

## SESSION - 3 (MFS+FTS)

Sr. No.	Room No.	Session Chairs	Time-slot	Student Name	Title of the presentation
16	L-13	Chayanit Nigaltia & Anjali Dwivedi	11:30 – 11:45	Divyansh Patel	Large area micro-texturing on free-form surfaces using flexible-electrode based through-mask electrochemical machining
17			11:45- 12:00	Kashfull Orra	On-line monitoring of machine tool vibration using magneto-rheological damper in turning process
18			12:00 – 12:15	Sunny Singhania	Stability of guided circular sawing
19		(Faculty) Dr. Pranav Joshi	12:15 – 12:30	Anjali Dwivedi	Enhancement of film cooling effectiveness by introduction of mist
20		12:30 – 12:45	Gopinath Sahu	Thermal Management of High Heat Flux LEDs	
21		12:45 – 01:00	Puneet Jindal	Design of thermal management system based on temperature-dependent heat generation in high power Li-ion batteries	

# RSD-2019: Poster Presentation Schedule

**2:30 - 4:30 PM**

**Saturday, 30<sup>th</sup> March 2019**

**FTS**

Poster No.	Student Name	Title of the Poster
1	Danish Abbas	A Numerical Study Of Performance Of Vertical Axis Wind Turbine Using Cambered And Plain Flap Airfoil
2	Deependra Deep	3D Transient Heat Transfer Analysis Of Energy Piles For Space Heating And Cooling Application For Indian Buildings
3	Dharmendra Kumar Chaubey	Aero-Thermal Design Optimization Of Centrifugal Compressor Using Multi-Objective Genetic Algorithm
4	Ravinder Singh	Study Of Heat Transfer Enhancement Using Combined Protrusions And Ribs In A Stationary Two - Pass Rectangular Duct
5	Saurav Gairola	Correlation Of Partial Shading And Conditions Of Operation To The Performance Of Pv Panels
6	Abhishek Chandran	Simulation And Experimental Study Of Droplet Trajectory In Multiple Nozzle Electro spray
7	Bandgar Abhishek Yashwant	Experimental Study Of Oscillatory Flow In Deformed Vasculatures
8	Banoth Sravan Kumar	Computational Analysis Of Thermal Runaway In Lithium-Ion Batteries
9	Chayanit Nigaltia	Numerical Investigation Of Switching Of A Jet Generated By A Foil Pitching In Still Fluid
10	Protyaya Halder	Modeling And Simulation Of Lean Premixed Combustion In Gas Turbine Combustors
11	Rakesh Juyal	Modelling And Simulation Of Coupled Heat And Solute Transport In Casting Processes
12	Chitwan Khajuria	A Numerical Investigation Of Forced Convection In Ga-Cu Nanofluid In A Circular Tube
13	Deepanshu	Numerical Study Of Flow Past An Elliptical Cylinder Near Free Surface
14	Gaurav Phore	Effect Of Geometry On Lithium-Oxygen Battery Using Lattice Boltzmann Simulation
15	Pranaya Keshari Nahak	Investigation Of Mild Combustion Using Adelaide Jet In Hot Coflow Burner
16	Pankaj Kumar	Cycling Behaviour Of Lithium-Oxygen Battery Under Different Operating Conditions
17	Ranmode Vaibhav Prakash	Modeling Discharge Behaviour Of Na-Air Flow Battery
18	Sharun Kuhar	Linear Stability Analysis Of Two-Dimensional Flow Past A Square Cylinder At Different Blockage Ratios
19	Naman Agarwal	Estimation Of Energy Potentiality Of Solar Power Tower For Uneven Terrain
20	Somesh Kumar	Effect Of Salinity On The Recovery Of Methane Gas From Its Hydrates Via Depressurization
21	Faizal	Simulation Of Gas Hydrate Dissociation Via Depressurization In Openfoam
22	Kisalaya Mishra	Numerical Simulation Of Methane-Lox Combustion
23	Prakhar Pratap	Numerical Simulation Validation Of Dbd Plasma Actuator
24	Nalla Ramu	Numerical Simulation Of Mixed Convection Of Nanofluids Over In-Line Electronic Chips Embedded In One Wall Of A Vertical Rectangular Channel
25	Abhinav Bhanawat	Effect Of Surface Inclination On Steam Condensation Heat Transfer In The Presence Of Air
26	Shakti Yadav	LES Based Spray Model For Primary Atomisation Using Stochastic Methods
27	Shikhar	Eulerian-Lagrangian Method For Three-Dimensional Simulation Of Fluidized Bed Biomass Gasification
28	Ajay Vallabh	A Numerical Investigation Of Heat Transfer Enhancement In Natural Convection Of Newtonian And Non-Newtonian Nanofluids In A Square Enclosure
29	Suraj	Numerical Simulations Of Biomass Gasification In Fluidised Beds Based On Multiphase-Particle In Cell Approach
30	Manoj Kumar	Numerical Simulation Of Flow Past A Cylinder Of Different Aspect Ratio Over Free Surface

## SMD

Poster No.	Student Name	Title of the Poster
31	Navaneeth N	Instabilities Of Thin Walled Cylindrical Shells Under Torsional Loading
32	Arpit Verma	Optimization Based Synthesis Of Passive Prosthetic Knee For Trans-Femoral Prosthesis Using Planar Polycentric Mechanisms
33	Ishu Aggarwal	Molecular Dynamics Study On The Welding Of Thermoplastics
34	Vineet Yadav	Modelling And Simulation Of Pressure Impulse Generator
35	Gaurav Rajendra Aher	Motion Planning Of Underactuated Manipulators
36	Praveen Kumar	Role Of Friction In The Stability Of Guided Circular Sawing
37	Neeraj Pal	Walking Pattern Generation Of A Humanoid Robot
38	Kumar Gaurav	Granular Flow On Rotating Nonspherical Central Body
39	Anshid Nuhman P	Dynamics And Machining Stability Of Angular Milling Heads
40	Pankaj Kumar	Development And Simulation Of A Semi-Automatic Pistol
41	Sonkul Nikhil Avinash	Deep Learning Protocol For Contion Monitoring And Fault Identification In A Rotor-Bearing System From Raw Time-Domain Data
42	Shivam Singla	An Untuned Whirling Pendulum Stabilizer
43	Pawaskar Koustubh Nitin	Failure Modeling Of Aluminium Nitride Using Johnson Holmquist Beissel Model With Phase Transition
44	Gaurav Agrawal	Experimental Dynamic Analysis Of A Thin Circular Plate Subjected To Moving Point Load
45	Rohit Gupta	Are Plant Stems Structurally Optimal?

## MFS

Poster No.	Student Name	Title of the Poster
46	B Sai Bharat Kumar	Experimental Investigation On Effect Of Build Orientation On Microstructure And Tensile Behaviour Of Samples Fabricated Through Slm
47	Varun Kathpalia	Tribological Analysis Of Laser Additively Manufactured Tribaloy-700
48	Danaram Jakhar	Development Of Next Generation Damped Grooving Tools
49	Yashwant Kumar Nama	Robocasting Of 45S5 Bioglass Scaffolds For Bone Tissue Engineering
50	Amit Kumar Smarty	Investigation Of Characteristics Effect Of Marangoni Convection On Weld Pool
51	Joshi Brahmesh Vinayak	System Dynamics Analysis Of Car Battery Supply Chain
52	Sarthak Vashisht	Active Vibration Control Of Machine Tool Chatter
53	Somesh Patel	First Principle Analysis And Charge Transport Study Of Borocarbonitride Structures
54	Hardeep Singh	Theoretical And Experimental Investigations In Nanofinishing Of Hemispherical Cup.
55	Mahavir Singh	Thin Wall Micromachining Using Wire-Edm & Micro-Texturing On Cylindrical Surfaces Using Micro-Edm Process
56	Vyom Sharma	Theoretical And Experimental Investigations Into Wire Electrochemical Micromachining (Wire-Ecmm) Process

## RA

Poster No.	Student Name	Title of the Poster
57	Amruta Sekhar Panda	Learning Dynamic Model Of Robot Manipulator Using Neural Networks
58	Lokendra Choudhary	Design Of Pneumatic Actuated Compliant Hand Exoskeleton For Rehabilitation
59	Rohit Sonker	Trajectory Following Using Model Predictive Control And Neural Networks