

International Conference on Computational Mathematics and its Applications (CMA 2019), November 12-14, 2019

DAY 1 (November 12, 2019)		
7:30-9:00	Breakfast (Venue: First Floor, Carbon Building) Registration (Venue: 1D-105)	
9:00-9:35	Inauguration Venue: 1D-105	
9:35-10:05	High Tea Venue: First Floor, Carbon Building	
10:15-11:00	Keynote Talk 1: Soft Truth, Soft Consequence and Soft Computing Speaker: Mihir Kumar Chakraborty, Jadavpur University, Kolkata Venue: 1D-105	
11:00-11:45	Keynote Talk 2: Rough set theory: Some key notions Speaker: Mohua Banerjee, IIT Kanpur Venue: 1D-105	
11:45-12:00	Tea break	
12:00-12:45	Keynote Talk 3: Randomization-Based Deep and Shallow Neural Networks Speaker: P. N. Suganthan, NTU Singapore Venue: 1D-105	
12:45-13:15	Invited Talk 1: Towards building a human-like chatbot: Inducing courteousness and affects in AI enabled conversational systems Speaker: Asif Ekbal, IIT Patna Venue: 1D-105	Invited Talk 2: Fractional Filters and Its Application in Image Denoising Speaker: R. K. Pandey, IIT (BHU) Varanasi Venue: 1E-104
13:15-14:30	Lunch Venue: First Floor, Carbon building	
14:30-15:00	Invited Talk 3: Challenges and applications of machine learning algorithms in the analysis of medical images Speaker: Alexei Manso Correa Machado, Pontifical Catholic University of Minas Gerais, Brazil Venue: 1D-105	Invited Talk 4: Enumeration of Certain Vector Sequences of Large Period over Finite Fields Speaker: Sartaj Ul Hasan, Assistant Professor, IIT Jammu Venue: 1E-104

<p>15:00-15:30</p>	<p>Invited Talk 5: Computer aided diagnosis of Epilepsy Speaker: R. B. Pachori, IIT Indore Venue: 1D-105</p>	<p>Invited Talk 6: On controllability Results of Volterra Integro Dynamic System on Time Scales Speaker: Muslim Malik, IIT Mandi Venue: 1E-104</p>
<p>15:30-15:45</p>	<p>Tea break</p>	
<p>15:45-16:15</p>	<p>Invited Talk 7: Wavelet based digital image watermarking: Techniques and applications Speaker: Amit K. Singh, NIT Patna Venue: 1D-105</p>	
<p>16:15-17:30</p>	<p>Oral Presentation Day 1</p>	

DAY 2 (November 13, 2019)

7:30-9:00	Breakfast (Venue: First Floor, Carbon Building)	
	Registration (Venue: 1D-105)	
9:00 - 9:45	Keynote Talk 4: Homogenization of optimal control problems in some complex domains Speaker: A. K. Nandakumaran, IISc Bangalore Venue: 1D-105	
9:45-10:30	Keynote Talk 5: Momentum ray transforms -- Inversion and range characterization Speaker: Venky Krishnan, TIFR Bangalore Venue: 1D-105	
10:30-11:00	Invited Talk 8: Testing concept drifts on data streams using machine learning Speaker: Sonali Agarwal, IIIT Allahabad Venue: 1D-105	Invited Talk 9: A phase Change Problem with variable thermal conductivity by Spectral Collocation and spectral Tau methods Speaker: Dr. Rajeev, IIT BHU Venue: 1E-104
11:00-11:15	Tea break	
11:15-12:00	Keynote Talk 6: Machine Vision and Encrypted Domain Processing: A Mathematical Approach Speaker: Balasubramanian Raman, IIT Roorkee Venue: 1D-105	
12:00-12:30	Invited Talk 10: Machine Learning in Cyber Security Speaker: Vinti Agarwal, NTNU Norway Venue: 1D-105	Invited Talk 11: Approximating the fixed points on nonlinear mappings with an application Speaker: Javid Ali, AMU Aligarh. Venue: 1E-104
12:30-14:00	Lunch Venue: Carbon building	
14:00-14:30	Invited Talk 12: Genetic Algorithm Based Approach for Integration of Multiple Parameters for Cluster Heads Selection Speaker: H M Pandey, Edge Hill University, UK Venue: 1D-105	
14:30-15:00	Invited Talk 13: IP/Patent for Academia Speaker: Sanjeev Sinha, CEO & Co-founder Parintek Innovations Inc. Venue: 1D-105	
15:00-15:15	Tea break	
15:15-17:00	Oral Presentation Day 2	

DAY 3 (November 14, 2019)

7:30-9:00	Breakfast (Venue: First Floor, Carbon Building) Registration (Venue: 1D-105)	
9:00 - 9:45	Keynote Talk 7: Deep Generative Adversarial Networks (GANs) and Their Application to Class Imbalanced Learning Speaker: Swagatam Das, ISI Kolkata Venue: 1D-105	
9:45-10:30	Keynote Talk 8: Structure of Entropy Solutions of Balance Laws in One Space Dimension Speaker: Adimurthi A, TIFR Bangalore Venue: 1D-105	
10:30-11:00	Invited Talk 14: Large Scale Learning Speaker: Reshma Rastogi, SAU New Delhi Venue: 1D-105	Invited Talk 15: Solutions of some nonlinear partial differential equations Speaker: Ch.Srinivasa Rao, IIT Madras Venue: 1E-104
11:00-11:15	Tea break	
11:15-11:45	Invited Talk 16: Unsupervised Techniques for Search Result Clustering and Summarization Speaker: Sriparna Saha, IIT Patna Venue: 1D-105	Invited Talk 17: Discontinuous Flux Based Solvers for Euler Gas Dynamics in absence of Pressure Speaker: Aekta Aggarwal, IIM Indore Venue: 1E-104
11:45-12:45	Closing Ceremony* Venue: 1D-105	
12:45-14:30	Lunch Venue: First floor, Carbon building	

*Includes distribution of certificates

Oral presentation 1:

Time	Venue: 1D-105	Venue: 1E-104	Venue: 1E-201
16:15-16:25	<p>Speaker: Anuj Kumar Sirohi Title: Neural Network Potential For Restricted Primitive Affiliation: JNU, New Delhi, India.</p>	<p>Speaker: Joginder Singh Title: An Improved Robust Domain Decomposition Method For Singularly Perturbed Parabolic Reaction-diffusion Systems Affiliation: IIT (BHU), Varanasi, India.</p>	<p>Speaker: Nikhil Sriwastav Title: Numerical solution of second order three point singular boundary value problem using Legendre wavelet operational matrix method Affiliation: MMMUT, Gorakhpur, India</p>
16:25-16:35	<p>Speaker: Avijit Bhattacharjee Title: A Survey of the Evolution of Deep Convolutional Neural Networks. Affiliation: IIT Indore, Indore, India</p>	<p>Speaker: Kotapally Harish Kumar Title: Wavelet Based Numerical Algorithm For Simulation Of Time Dependent Three Dimensional (3D) Benjamin-bona-mahony-Burgers And Sobolev Equations Affiliation: IIT Roorkee, Roorkee, India.</p>	<p>Speaker: Praveen Goyal Title: Plant Disease Prediction System Affiliation: REC, Banda, India.</p>
16:35-16:45	<p>Speaker: Mohammed Wasid Title: Improving Recommender Systems with Side Information Affiliation: GEC, Bharatpur, India.</p>	<p>Speaker: Saroj Rani Title: A Note On Hamming Weights Of Irreducible Constacyclic Codes Over Finite Field Affiliation: S.A. Jain (PG) College, Ambala, India.</p>	<p>Speaker: Aditi Garg Title: Agriculture energy efficiency measurement using Fuzzy Data Envelopment Analysis Affiliation: SGSITS, Indore, India</p>
16:45-16:55	<p>Speaker: Umar Badr Shafeeque Title: IoT Enabled Smart Solid Waste Management System for Rural Areas Affiliation: REC, Banda, India</p>	<p>Speaker: Vipin Kumar Title: On Controllability of Integro Dynamic System on Time Scales with Impulsive Conditions Affiliation: IIT Mandi, Mandi, India.</p>	<p>Speaker: B.Chandra Mohan,T.Krishna Chaitanya, T.Tirupal Title: A Comparison Of CNN Classification Vs Image Moment Feature Based Classification For Mpeg-7 Dataset Affiliation: BEC, Bapatla, India.</p>
16:55-17:05	<p>Speaker: Hemlata Pal Title: Frequency Spectral Analysis Of Eeg For Epileptic Seizure Detection Using ANN. Affiliation: DAVV, Indore, India.</p>	<p>Speaker: Akanksha Verma Title: Numerical Solution Of Bagle-torvik Equations Using Chebyshev Artificial Neural Network Method. Affiliation: MNNIT Allahabad, Prayagraj, India.</p>	<p>Speaker: Pragya Shukla Title: Spectral Properties of Strongly Carleman Pseudo Differential Operators associated with Integral Transform. Affiliation: IIT (BHU), Varanasi, India.</p>
17:05-17:15	<p>Speaker: Ashraf Haroon Rashid</p>	<p>Speaker: Akash Bhavsar</p>	<p>Speaker: Vineeta Singh Patel</p>

	<p>Title: The diagnosis of Alzheimer's disease through deep transfer learning: A review. Affiliation: IIT Indore, Indore, India.</p>	<p>Title: Mathematical Modeling and Optimization of Thermal Instability thermo chemical cyclic systems. Affiliation: Madhav University, Rajasthan, India.</p>	<p>Title: A Rough Set Model Based on Possible World Semantics of Epistemic Logic. Affiliation: IIT Indore, Indore, India.</p>
17:15-17:25	<p>Speaker: M. A. Ganaie Title: An ensemble of RVFL network with least squares twin support vector machines Affiliation: IIT Indore, Indore, India.</p>	<p>Speaker: Rajesh Dhayal Title: Approximate Controllability for a Class of Fractional Stochastic Differential Equation with Non-instantaneous Impulses Affiliation: IIT Mandi, Mandi, India.</p>	<p>Speaker: A. K. Malik Title: A Survey on Decision Tree Based Ensemble Methods Affiliation: IIT Indore, Indore, India.</p>

Oral Presentation 2:

Time	Venue: 1D-105	Venue: 1E-104	Venue: 1E-201
15:15-15:25	<p>Speaker: Ananya Dwivedi Title: Optimal Control Analysis of a Dengue Model. Affiliation: MMMUT Gorakhpur, India.</p>	<p>Speaker: Md Hasanuzzaman Title: Relation-Theoretic Fixed Point Results For Multi-Valued (θ, \square) contractions with an application. Affiliation: AMU, Aligarh, India.</p>	<p>Speaker: Reetu Bhattacharjee, Mihir Kumar Chakraborty, Lopamudra Choudhury Title: Diagram system Vennio1. Affiliation: Jadavpur University, Kolkata, India.</p>
15:25-15:35	<p>Speaker: Purva Rajwade Title: On Nano Forms Of Weakly Open Fuzzy Sets. Affiliation: DAVV, Indore, India.</p>	<p>Speaker: Hayel Nasr Saleh Farhan Title: Some \square-Fixed point results for (F, \square, \square)-contractive type mappings with applications. Affiliation: AMU, Aligarh, India</p>	<p>Speaker: Sunny Kumar Title: Mathematical model for dynamics of chemically power micro/nano robots. Affiliation: MANIT, Bhopal, India.</p>
15:35-15:45	<p>Speaker: Bharat Richhariya Title: Machine Learning Techniques For The Early Diagnosis Of Alzheimer's Disease Affiliation: IIT Indore, Indore, India..</p>	<p>Speaker: Dr. Himanshu Rathore Title: Quantity discount policy model for deteriorating items with two-warehousing. Affiliation: MUJ, Jaipur, India.</p>	<p>Speaker: Mohammad Asim Title: Extended rectangular M_r metric spaces and fixed point results. Affiliation: AMU, Aligarh, India</p>
15:45-15:55	<p>Speaker: Sanjay Kumar Sonbhadra Title: An Application of Ensemble Models and Deep Learning in Predictive Analytics. Affiliation: IIT Allahabad, Prayagraj, India.</p>	<p>Speaker: Umesh Title: Numerical Solution Of Singular Boundary Value Problems Using Advanced Adomian Decomposition Method.</p>	<p>Speaker: Jay Singh Maurya Title: Continuous Wavelet Transform Of Schwartz Tempered Distributions In $S'(\square^n)$ Affiliation: IIT (BHU),</p>

		Affiliation: MNNIT Allahabad, Prayagraj, India.	Varanasi, India.
15:55-16:05	Speaker: Narinder Singh Punn Title: Generate Driving Quality Score Using Smartphone's Accelerometer Sensor. Affiliation: IIT Allahabad, Prayagraj, India.	Speaker: Faem Ali Title: A new iterative scheme to approximating fixed points and the solution of delay differential equation. Affiliation: AMU, Aligarh, India.	Speaker: Sonia Dhama Title: Existence and Uniqueness of Weighted Pseudo Almost Automorphic Solution for Sobolev-type Differential Equations on Time Scales. Affiliation: IIT Mandi, Mandi, India.
16:05-16:15	Speaker: Sumanjit Chakraborty Title: A ML Approach to Predict Solar-Geophysical Indices from Ionospheric TEC over Central India Affiliation: IIT Indore, Indore, India.	Speaker: Shejal Gupta Title: Markovian Feedback Bulk Queueing Model With Retention Of Reneged Customers. Affiliation: DAVV, Indore, India.	Speaker: Mohd Jubair Title: Approximating Fixed Points Of Nonexpansive Mappings Via F Iterative Scheme. Affiliation: AMU, Aligarh, India.
16:15-16:25	Speaker: Rajesh Kumar Mishra Title: Optimization and analysis of inventory model of substitutable and complementary items with cost of substitution. Affiliation: MMMUT, Gorakhpur, India.	Speaker: Shekhar Singh Negi Title: Analyzing an oscillatory result of a nonlinear differential equation on time scale. Affiliation: IIT Mandi, Mandi, India.	Speaker: Dr Manoj Dubey Title: $\rho(\rho)$ Integral Function and its properties. Affiliation: IES-IPS Academy, Indore, India.
16:25-16:35	Speaker: Nidhi Sharma Title: Networks of Queue- A survey on Theory, Methodology and Algorithms of Booking Tickets. Affiliation: DAVV, Indore, India.	Speaker: Nidhi Bhandari Title: An efficient approach to text mining using graph theoretical techniques. Affiliation: DAVV, Indore, India.	Speaker: Yogesh Shukla Title: Hyper Geometric Solution Of Temperature Distribution Problem With Variable Conductivity. Affiliation: JUG, Gwalior, India
16:35-16:45	Speaker: Sanjay Kumar Sonbhadra Title: Email Classification via Intention-Based Segmentation. Affiliation: IIT Allahabad, Prayagraj, India.	Speaker: Amit Kumar Verma Title: Mathematical Analysis of Immiscible Micropolar and Newtonian Fluid Flow Through Concentric Porous Cylinders. Affiliation: MNNIT Allahabad, Prayagraj, India.	Speaker: Arti Devi Title: Exact solution using Lie group theoretic method for the cylindrical shock waves in a self-gravitating ideal gas with axial magnetic field. Affiliation: MNNIT Allahabad, Prayagraj, India.