ICMIB- 2025
(4th April-2025 to 6th April-2025)
Dept. of CSE, Parala Maharaja Engineering College, Berhampur, Odisha, India
(Schedule)

4th April-2025 (Preconference Tutorial Session)
(10.00 AM- 11.30 AM) **Tutorial Talk-1** **Tutorial Speaker: Prof. Ajit Kumar Sahoo, KIIT University** **Title of the tutorial:** Wi-Fi signal fundamentals, tools used for Wi-Fi sensing, methods used for analysing the signals and some live demonstrations **Google Meet Link: https://meet.google.com/cns-bugh-xtk** **(Venue: Auditorium, Ground Floor)**
(11.30 AM- 11.45 AM) **High-Tea Break**
(11.45 AM- 01.15 PM) **Tutorial Talk-2** **Tutorial Speaker: Dr. P. Sruthi, University of Hyderabad** **Title of the tutorial:** Wi-Fi Sensing: Principles, Deployment and Applications **Google Meet Link: https://meet.google.com/cns-bugh-xtk** **(Venue: Auditorium, Ground Floor)**
(01.15 PM- 02.30 PM) **Lunch Break**
(02.30 PM- 04.00 PM) **Tutorial Talk-3** **Tutorial Speaker: Prof. Ramesh Kumar Sahoo, IGIT Sarang** **Title of the tutorial:** Wi-Fi Sensing Applications: Hands-on Practice **Google Meet Link: https://meet.google.com/cns-bugh-xtk** **(Venue: Auditorium, Ground Floor)**

5th April-2025 (Conference Day-1)
(09.30 AM- 10.15 AM) **Keynote Talk-1** **Keynote Speaker: Prof. Nitin Vaidya, Georgetown University** **Title of the talk**:- Fault-Tolerant Distributed Optimization and Learning **Session Chair: Prof. Tapas Kumar Panigrahi, PMEC, Berhampur** **Google Meet Link: https://meet.google.com/cns-bugh-xtk** **(Venue: Auditorium, Ground Floor)**
(10.15 AM- 11.15 AM) **Inaugural Session** **Google Meet Link: https://meet.google.com/cns-bugh-xtk**
(11.15 AM- 11.30 AM) **High-Tea Break**
(11.30 AM – 12.15 PM) **Keynote Talk-2** **Keynote Speaker: Prof. Ram Bilas Pachori, IIT Indore** **Title of the talk**:- Multichannel signal processing enabled machine learning methods for medical applications **Session Chair: Prof. Bhagabat Panda, PMEC, Berhampur** **Google Meet Link: https://meet.google.com/cns-bugh-xtk** **(Venue: Auditorium, Ground Floor)**
(12.15 PM- 01.30 PM) **Lunch Break**

<table>
<tr><td colspan="4">(01.30 PM- 03.30 PM)
(Parallel Technical Sessions)</td></tr>
<tr>
<td>Technical Session-1
(Session Chairs)
Prof. Rajendra Prasad Nayak, GCEK, Bhawanipatna
Prof. Kalyan Kumar Jena, PMEC, Berhampur
Google Meet Link:
https://meet.google.com/pfx-kdgv-hbu
(Venue: Room No. 429, 3rd Floor)
(Paper IDs:- 13, 88, 288, 297, 303, 305, 311)</td>
<td>Technical Session-2
(Session Chairs)
Prof. Subasish Mohapatra, OUTR, Bhubaneswar
Prof. Chittaranjan Mallick, PMEC, Berhampur
Google Meet Link:
https://meet.google.com/cns-bugh-xtk
(Venue: Auditorium, Ground Floor)
(Paper IDs:- 29, 112, 131, 245, 358, 367, 375)</td>
<td>Technical Session-3
(Session Chairs)
Prof. Brojo Kishore Mishra, NIST University, Berhampur
Prof. Ritanjali Behera, PMEC, Berhampur
Google Meet Link:
https://meet.google.com/wba-qedv-wjp
(Venue: COE Cyber security, 4th Floor)
(Paper IDs:- 258, 259, 260, 290, 319, 327, 354)</td>
<td>Technical Session-4
(Session Chairs)
Prof. Santosh Kumar Majhi, Guru Ghasidas Vishwavidyalaya, Bilaspur
Prof. Dinesh Kumar Dash, PMEC, Berhampur
Google Meet Link:
https://meet.google.com/ahr-muww-rin
(Venue: Conference Hall, Civil Dept., 1st Floor)
(Paper IDs:- 195, 215, 235, 237, 250, 264)</td>
</tr>
<tr><td colspan="4">(03.30 PM- 04.15 PM)
Keynote Talk-3
Keynote Speaker: Prof. Srinjoy Mitra, University of Edinburgh, UK
Title of the talk:- Electronics for Healthcare and Neuroscience
Session Chair: Prof. Sarat Kumar Sahoo, PMEC Berhampur
Google Meet Link: https://meet.google.com/cns-bugh-xtk
(Venue: Auditorium, Ground Floor)</td></tr>
<tr><td colspan="4">(04.15 PM- 04.30 PM)
High-Tea Break</td></tr>
<tr><td colspan="4">(04.30 PM- 05.15 PM)
Keynote Talk-4
Keynote Speaker: Prof. Shambhu J. Upadhyaya, University at Buffalo, The State University of New York
Title of the talk:- Detecting Ransomware with Machine Learning and Natural Language Processing Models
Session Chair: Prof. Srinivas Sethi, IGIT Sarang
Google Meet Link: https://meet.google.com/cns-bugh-xtk
(Venue: Auditorium, Ground Floor)</td></tr>
<tr><td colspan="4">(06.30 PM-07.30 PM)
Cultural Programme
(Venue: Auditorium, Ground Floor)</td></tr>
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<tr><td colspan="3">6th April-2025 (Conference Day-2)</td></tr>
<tr><td colspan="3">(09.30 AM- 10.15 AM)
Keynote Talk-5
Keynote Speaker: Prof. Rammohan Mallipeddi, Kyungpook National University
Title of the talk:- Clustering based Image Segmentation and Tracking
Session Chair: Prof. Siba Kumar Udgata, University of Hyderabad
Google Meet Link: https://meet.google.com/cns-bugh-xtk

(Venue: Auditorium, Ground Floor)</td></tr>
<tr><td colspan="3">(10.15 AM- 11.00 AM)
Keynote Talk-6
Keynote Speaker: Prof. Manas Ranjan Patra, NIST University, India
Title of the talk:- Agentic AI: The Future of Autonomous Intelligence
Session Chair: Prof. Trilochan Rout, PMEC Berhampur
Google Meet Link: https://meet.google.com/cns-bugh-xtk

(Venue: Auditorium, Ground Floor)</td></tr>
<tr><td colspan="3">(11.00 AM- 11.15 AM)
High-Tea Break</td></tr>
<tr><td colspan="3">(11.15 AM- 01.30 PM)
(Parallel Technical Sessions)</td></tr>
<tr><td>Technical Session-5
(Session Chairs)
Prof. Gopal Behera, GCEK, Bhawanipatna
Prof. Niranjan Panigrahi, PMEC, Berhampur

Google Meet Link:
https://meet.google.com/wba-qedv-wjp

(Venue: COE Cyber security, 4th Floor)

(Paper IDs:- 56, 203, 249, 267, 293, 308, 314, 338)</td><td>Technical Session-6
(Session Chairs)
Prof. Ramesh Kumar Sahoo, IGIT Sarang
Prof. Raghunandan Swain, PMEC, Berhampur
Google Meet Link:
https://meet.google.com/pfx-kdgv-hbu

(Venue: Room No. 429, 3rd Floor)
(Paper IDs:- 11, 33, 105, 134, 168, 216, 238)</td><td>Technical Session-7
(Session Chairs)
Prof. Sibarama Panigrahi, NIT, Rourkela
Prof. Sasmita Rani Behera, PMEC, Berhampur

Google Meet Link:
https://meet.google.com/ahr-muww-rin

(Venue: Conference Hall, Civil Dept., 1st Floor)
(Paper IDs:- 111, 189, 234, 255, 301, 324, 347, 374)</td></tr>
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(01.30 PM-02.30 PM)
Lunch Break

(02.30 PM- 4.00 PM)
(Parallel Technical Sessions)

Technical Session-8 **(Session Chairs)** Prof. Jitendra Kumar Rout, NIT, Raipur Prof. Balaji Kumar Choudhury, PMEC, Berhampur **Google Meet Link:** **https://meet.google.com/wba-qedv-wjp** **(Venue: COE Cyber security, 4th Floor)** **(Paper IDs:- 17, 41, 118, 132, 149, 208, 270)**	**Technical Session-9** **(Session Chairs)** Prof. Debabrata Dansana, Rajendra University Prof. Suryalok Dash, PMEC, Berhampur **Google Meet Link:** **https://meet.google.com/pfx-kdgv-hbu** **(Venue: Room No. 429, 3rd Floor)** **(Paper IDs:- 70, 96, 99, 138, 266, 292, 342)**	**Technical Session-10** **(Session Chairs)** Prof. Debasis Gountia, OUTR, Bhubaneswar Prof. Rashmi Ranjan Sahoo, PMEC, Berhampur **Google Meet Link:** **https://meet.google.com/ahr-muww-rin** **(Venue: Conference Hall, Civil Dept., 1st Floor)** **(Paper IDs:- 94, 114, 218, 231, 236, 302, 316)**

(04.00 PM- 04.30 PM)
Valedictory Session

Google Meet Link: https://meet.google.com/cns-bugh-xtk

(Venue: Auditorium, Ground Floor)

Technical Session-1

(Track:- Applied Intelligence-1)

5th April-2025, (01.30 PM- 03.30 PM)

(Session Chairs)
Prof. Rajendra Prasad Nayak, GCEK, Bhawanipatna
Prof. Kalyan Kumar Jena, PMEC, Berhampur
Google Meet Link:
https://meet.google.com/pfx-kdgv-hbu
(Venue: Room No. 429, 3rd Floor)

Paper ID	Title
13	Optimized Cost Path for Autonomous Underwater Vehicle in Obstacle Rich Environment using SFLA
88	Federated IoT Security with Explainable AI for Interpretable Attestation
288	Image-Based Traffic Anomaly Detection Using Deep Learning Models
297	Hybrid Deep Learning Approach for Enhanced Cardiovascular Disease Prediction
303	Leveraging FedSHE-based FedAVG for Efficient Privacy-Preserving Federated Learning and Secure Model Aggregation
305	FOSTOUR: Festive Oriented Seasonal Tour Recommendation
311	AI-Based Chatbot with Recommender System for Interactive Support

Technical Session-2

(Track:- Applied Intelligence-2)

5th April-2025, (01.30 PM- 03.30 PM)

(Session Chairs)
Prof. Subasish Mohapatra, OUTR, Bhubaneswar
Prof. Chittaranjan Mallick, PMEC, Berhampur
Google Meet Link:
https://meet.google.com/cns-bugh-xtk

(Venue: Auditorium, Ground Floor)

Paper ID	Title
29	Copy-Move Forgery Detection using Oriented FAST and Rotated BRIEF on Multi-Resolution Images
112	Enhancing IoMT Security: A Stacking Ensemble Model for Multi-Class Attack Classification
131	Optimized Deep Convolutional Neural Network Architectures for High-Precision Multiclass Detection of Tomato Leaf Diseases
245	UAV-Assisted Path Planning for Cell Tower Performance Evaluation
358	A Multi-Layer Data Flow Offloading Strategy for Enhanced System Efficiency in Healthcare Network
367	Smart Security System for Android Using Deep Learning
375	Denoising time series data by integrating fourier and wavelet transform on stock prices

Technical Session-3

(Track:- Applied Intelligence-3)

5th April-2025, (01.30 PM- 03.30 PM)

(Session Chairs)
Prof. Brojo Kishore Mishra, NIST University, Berhampur
Prof. Ritanjali Behera, PMEC, Berhampur
Google Meet Link:
https://meet.google.com/wba-qedv-wjp

(Venue: COE Cyber security, 4th Floor)

Paper ID	Title
258	Zero-Shot Learning for Face Recognition in Cyber Security: Enhancing Model Generalization with Limited Data.
259	A Nonce Challenge Based Authentication Scheme for Secured Task Offloading in Edge Computing
260	Real-time church analysis using AI/ ML for predicting attrition of B2B telecom customers for operational efficiency
290	A Study On Compositions Optimization Of A Hybrid Brake Friction Material Using Metaheuristic
319	Odia Sign Language Detection for Deaf and Hard-of-Hearing Community
327	Reinforcement Learning-Driven Adaptive Task Grouping with Deep-ConvLSTM Based VM Sizing in Container as a Service Cloud Environment
354	Model-agnostic Interpretability Techniques for Machine Learning-based Pre-term Birth Prediction

Technical Session-4

(Track:- AI and Security)

5th April-2025, (01.30 PM- 03.30 PM)

(Session Chairs)
Prof. Santosh Kumar Majhi,
Guru Ghasidas Vishwavidyalaya, Bilaspur
Prof. Dinesh Kumar Dash, PMEC, Berhampur
Google Meet Link:
https://meet.google.com/ahr-muww-rin
(Venue: Conference Hall, Civil Dept., 1st Floor)

Paper ID	Title
195	Governance and Ethical Challenges in AI Vulnerability Research: A Case Study of PAIR
215	Deep Learning Techniques for Attack Detection in IIoT Networks: An Analysis Using the Bot-IoT Dataset
235	DDoS Attack Detection Approach for Fog-Cloud Environment
237	NotetheNote: An AI Study Companion with a Music Recommendation System Utilizing Mood Detection
250	Enhanced Security Protocol for IoT-Based Applications: A Comparative Analysis of Lightweight Cryptography Solutions
264	A Robust Model for Quantum-Resistant Cryptography to Tackle Quantum Risks

Technical Session-5

(Track:- Data Science)

6th April-2025, (11.15 AM- 01.30 PM)
(Session Chairs)
Prof. Gopal Behera, GCEK, Bhawanipatna
Prof. Niranjan Panigrahi, PMEC, Berhampur
Google Meet Link:
https://meet.google.com/wba-qedv-wjp
(Venue: COE Cyber security, 4th Floor)

Paper ID	Title
56	Improving Collaborative Recommender System Using Random Search Optimization and SVD
203	Visual recognition of crop composite planting based on Vision Transformer
249	Clustering based sentiment analysis for unlabeled reviews using Bi-LSTM for movie reviews
267	Adaptive Learning-Enhanced Model Predictive Control for Resilient Energy Management Systems
293	Automated Classification of EEG patterns from BrainEEG Signals for Predicting Sleep Deficiency
308	Investigating Factors That Influence Behavior Towards Adopting Smartwatches: An Empirical Analysis in the Context of the UAE Marketplace
314	A Smart Assistive Navigation System for the Visually Impaired Using YOLOv5
338	High-Speed 32-Channel Data Transfer System for 40Gbps Using NRZ and RZ Modulation

Technical Session-6

(Track:- Deep Learning-1)

6th April-2025, (11.15 AM- 01.30 PM)
(Session Chairs)
Prof. Ramesh Kumar Sahoo, IGIT Sarang
Prof. Raghunandan Swain, PMEC, Berhampur
Google Meet Link:
https://meet.google.com/pfx-kdgv-hbu

(Venue: Room No. 429, 3rd Floor)

Paper ID	Title
11	Maize Plant Disease Detection using Deep CNN
33	RicNet: Enhancing Rice Leaf Disease Detection through Optimized Convolutional Neural Network Architectures and Dropout Configurations
105	Explainable AI Integrated Deep Learning Approach for Glaucoma Prediction
134	Explainable AI Meets Agriculture: Lightweight Deep Learning for Tomato Leaf Disease Detection
168	A Novel Deep Learning Model for High-Utility Item Set Mining in Transactional data
216	Cardiac thermodynamic optimization through Personalized Activity Recommendations
238	Forest Fire and Smoke Detection using Deep Learning

Technical Session-7

(Track:- Deep Learning-2)

6th April-2025, (11.15 AM- 01.30 PM)
(Session Chairs)
Prof. Sibarama Panigrahi, NIT, Rourkela
Prof. Sasmita Rani Behera, PMEC, Berhampur

Google Meet Link:
https://meet.google.com/ahr-muww-rin

(Venue: Conference Hall, Civil Dept., 1st Floor)

Paper ID	Title
111	Integrating Facial Indicators for Enhanced Road Safety by Using Deep Learning Models
189	LSTM-Based Prediction of Financial Asset Returns
234	Computation Offloading in MEC using Deep Q-Learning Framework
255	Dental Caries Recognition using Deep Learning
301	Neuro-Symbolic Sentiment Analysis: Integrating Lexicon Features with Deep Learning Models
324	Experimental Results Region-Based Convolutional Neural Network Algorithm for Deep Face Detection
347	A Hybrid Deep Learning Model for Lung Cancer Classification Using Enhanced TransResNet-50
374	Integrated Deep Learning Framework for Automated Rice Leaf Disease Image Classification

Technical Session-8

(Track:- Healthcare)

6th April-2025, (02.30 PM- 4.00 PM)

(Session Chairs)
Prof. Jitendra Kumar Rout, NIT, Raipur
Prof. Balaji Kumar Choudhury, PMEC, Berhampur

Google Meet Link:
https://meet.google.com/wba-qedv-wjp

(Venue: COE Cyber security, 4th Floor)

Paper ID	Title
17	Early detection of Alzheimer's disease and Brain tumor using EfficientNetB3
41	MRI-Based Classification of Glioma, Meningioma, and Pituitary Tumors Using Deep Learning Approaches
118	Enhancing Fetal Health Classification Using xGBoost Endorsed kBestFS Feature Selection and Comprehensive Performance Analysis
132	Deep Network Models for Alzheimer's Diagnosis Using MRI: A Comparative Analysis of CNN and Hybrid CNN-LSTM Architectures
149	AI-Powered ECG Signal Analysis for Cardiac Biosensors
208	A Novel Deep Learning Approach for Automated Cardiac Arrhythmia Detection Using RNNs
270	Hybrid XGBoost-LSTM Model for Early Parkinson’s Disease Identification Using Voice Data

Technical Session-9

(Track:- Cognitive Science, IOT, Cloud, and Network)

6th April-2025, (02.30 PM- 4.00 PM)
(Session Chairs)
Prof. Debabrata Dansana, Rajendra University
Prof. Suryalok Dash, PMEC, Berhampur
Google Meet Link:
https://meet.google.com/pfx-kdgv-hbu
(Venue: Room No. 429, 3rd Floor)

Paper ID	Title
70	Exploring the Intricate Connection Between Attention and Working Memory Through the Lens of Machine Intelligence
96	Enhancing Heart Disease Classification with Steerable Graph Neural Networks and Registered Attribute-Based Encryption in IoT-Cloud Healthcare Systems
99	Dynamic Assessment of Cognitive Load and Its Impact on Working Memory: A Fuzzy Logic-Based
138	Automated Image Captioning Using Transformer-Based Visual Attention Networks
266	Ensuring Cloud Security Through Scalable Network Forensics
292	Co-Channel Interference in Fractional Frequency Reuse Cellular Network: Performance Analysis
342	Adaptive Threshold-Based Machine Learning for Elephant Flow Classification in SDN

Technical Session-10

(Track:- Machine Learning)

6th April-2025, (02.30 PM- 4.00 PM)
(Session Chairs)
Prof. Debasis Gountia, OUTR, Bhubaneswar
Prof. Rashmi Ranjan Sahoo, PMEC, Berhampur

Google Meet Link:
https://meet.google.com/ahr-muww-rin

(Venue: Conference Hall, Civil Dept., 1st Floor)

Paper ID	Title
94	Rapid Pneumonia Diagnosis Using Lightweight Neural Networks And Machine Learning
114	An Automated Software Defect Prediction Model Using Machine Learning Approaches
218	Securing Digital Transactions: Machine Learning Frameworks for Fraud Detection in Payment Systems
231	Machine Learning based Fault Detection Model for Wireless Electrocardiogram (ECG) Body Sensor Data
236	A machine learning approach for analyzing and predicting hypothyroidism based on hormonal change
302	AI-Powered Waste Segregation: Enhancing Recycling Efficiency through Machine Learning
316	Predicting Age-Specific Trends in Depression and Anxiety: A Machine Learning Approach to Public Health Policy and Intervention