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INTERNATIONAL CONFERENCE ON RECENT ADVANCEMENTS IN COMPUTING AND SYSTEM DESIGN

InRACS-2025

HYBRID MODE

25 26 27 JUNE, 2025

Department Of Electronics and Communication Engineering

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Selected papers will be published in IJIRT - an UGC approved Journal

More Information

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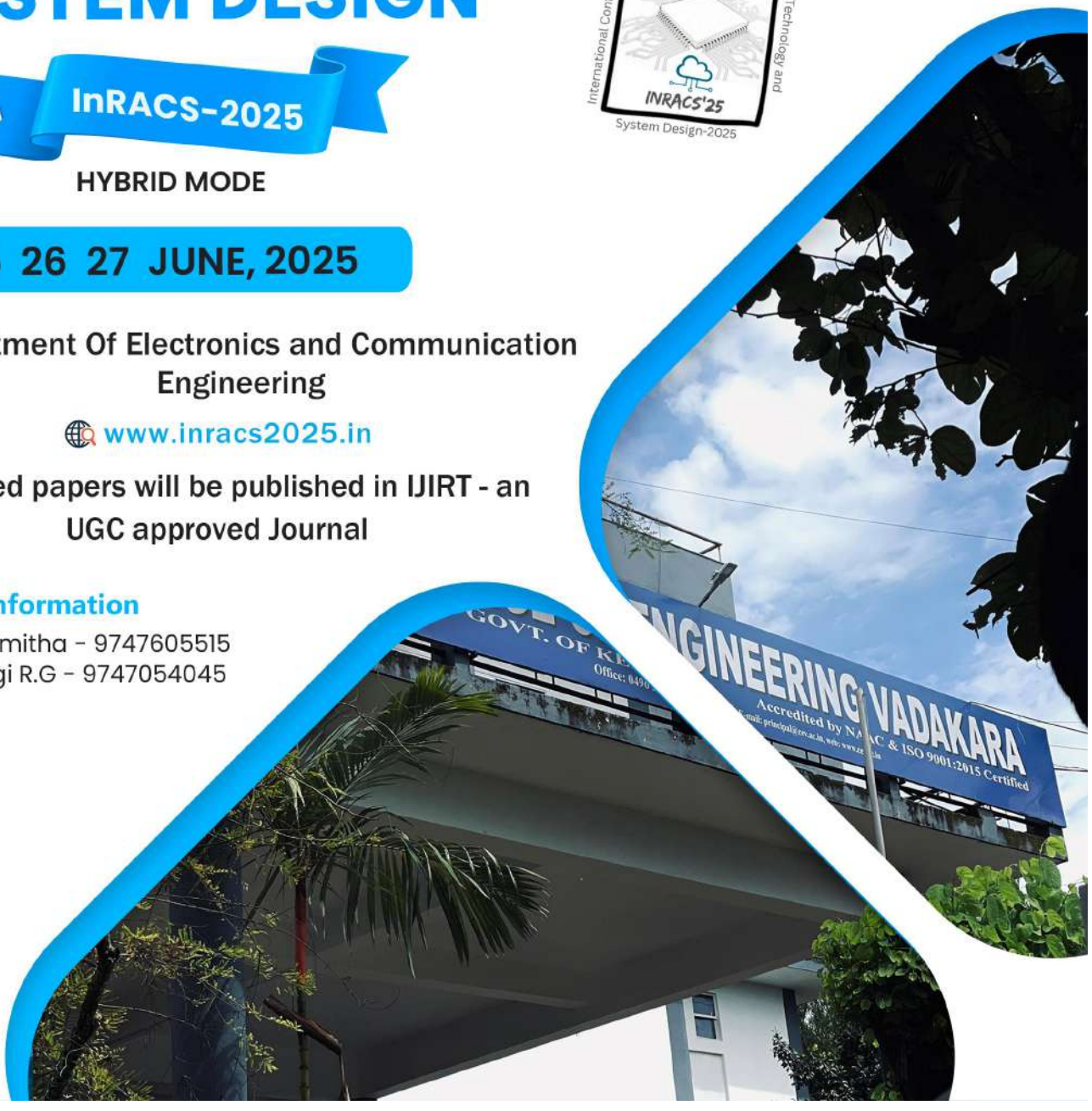
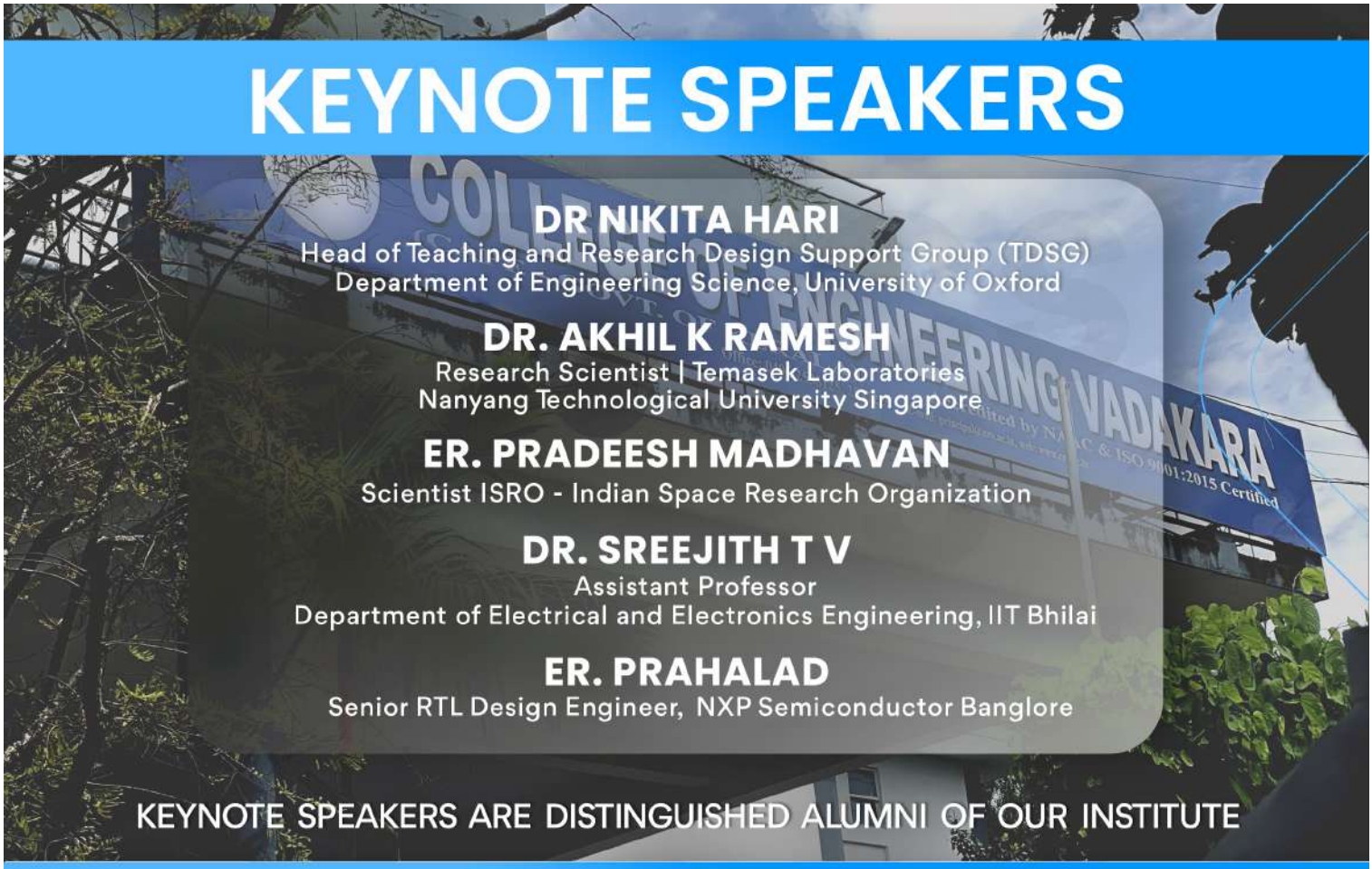


KEYNOTE SPEAKERS



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KEYNOTE SPEAKERS ARE DISTINGUISHED ALUMNI OF OUR INSTITUTE

ABOUT THE CONFERENCE

InRACs -2025 is an International Conference on Recent Advancements in Computing and System Design (InRACS-2025) organised by Department of Electronics and Communication Engineering Vadakara, Kozhikode, Kerala, India. The conference is intended for technical exchange amongst researchers in various emerging fields of Signal Processing, Artificial Intelligence, Machine Learning, Bigdata Analytics Communication, Robotics, Automation and Control, VLSI and Embedded System, spanning across five tracks. The technical program includes keynote lectures, technical sessions and special sessions by Auminae of our Institution .

Department of Electronics and Communication Engineering is started n 1999, the primary objective of the department has been to impart quality education and training at the undergraduate level in various areas of Electronics and Communication Engineering. The department has been consistently producing engineering graduates of high caliber who occupy prestigious positions in the academic and industrial fields.

"Advancements in Computing and System Design: Shaping the Future of Technology."

TRACKS

ARTIFICIAL INTELLIGENCE AND MACHINE LEARNING - TRACK 1

Foundations of AI & ML, Reinforcement Learning and Deep Reinforcement Learning, Deep Learning & Neural Networks, Generative AI , Multimodal AI, Neuromorphic Computing, AI for Signal Processing & Communication, AI-based Image, Speech, and Video Processing, AI for Biomedical Signal Analysis, AI in VLSI and Automation, AI for Hardware Acceleration (FPGAs, ASICs, etc), AI-based Fault Detection and Reliability in Embedded Systems AI Applications in Robotics & Automation, AI for Big Data Analytics, AI-driven Intrusion Detection in Networks Ethical AI & Societal Impact, AI for Sustainable Development and Green AI

BIG DATA ANALYTICS - TRACK 2

Fundamentals of Big Data Analytics, Distributed Computing and Parallel Processing for Big Data, Cloud-based Big Data Solutions and Edge Computing Machine Learning & AI for Big Data, Real-time Data Analytics and Stream Processing, Data Science & Statistical Analysis, Big Data Visualization and Interactive Dashboards, Big Data in Cybersecurity & Privacy, Blockchain for Secure Big Data Transactions, Industry Applications of Big Data, Big Data in Finance, Retail and E-commerce Big Data Strategies Real-Time and Streaming, Big Data Storage and Management

TRACKS

COMMUNICATION - TRACK 3

Wireless Communication & Networking, 6G Networks and Beyond, Optical and Satellite Communication, Free Space Optical (FSO) Communication, Photonic and Quantum Communication Technologies, Antenna and RF System Design, Metamaterial and Reconfigurable Antennas, AI-driven Antenna, AI-Driven Wireless Communication Systems, Energy-Efficient Wireless Communication, UAV and Drone Communication Networks Optimization, Low-Power VLSI Design for IoT Devices, MEMS and Nanoelectronics for Communication Systems, Photonic Integrated Circuits (PICs) for High-Speed Communication, Underwater Wireless Communication, Embedded System Security and Threat Detection Cybersecurity in Communication Systems, Cryptographic Techniques for Secure Communication

SIGNAL PROCESSING - TRACK 4

Algorithms and implementations, Image and video processing Audio and speech processing, Error concealment techniques, Management of multimedia services, Test-beds and trials. Signal processing for Finance, Bioinformatics and Genomics, Compressed Sensing and Sparse Modeling, Computational Imaging/ Spectral Imaging, Design/Implementation of Signal Processing Systems, DSP Algorithms and Architecture, Image/Video Processing & Data Compression, Image Forensics, Information Forensics and Security, Nonlinear Signal Processing, Optimization Techniques, Radar and Sonar Signal Processing, Sensor Array and Multichannel Signal Processing, Signal Processing Theory and Methods, Speech and Language Processing, Statistical Signal Processing

TRACKS

AUTOMATION, CONTROL AND ROBOTICS - TRACK 5

Intelligent Control Systems, IoT-Enabled Smart Control Systems, Process Control & Optimization, Smart Sensors & Actuators, Intelligent Sensor Networks for Automation, MEMS-Based Sensors and Actuators, AI for Sensor Fusion and Decision-Making, Robotics and Motion Control, Autonomous Vehicles and Motion Planning, AI-Based Trajectory Optimization and control, Automation in Energy Systems, Smart Grid Automation and Control, Renewable Energy Integration in Automation,, Safety, Security & Ethics in Automation, Ethics and Regulations in Autonomous Systems, Autonomous and Intelligent Robots, Robotics in Manufacturing and Industry 4.0, Collaborative Robots (Cobots) in Smart Factories, Humanoid and Bio-Inspired Robotics, Emotion and Gesture Recognition in Robots , Swarm and Aerial Robotics, AI for Multi-Robot Coordination and Control, UAVs, Drones, and Autonomous Flying Robots, Medical and Healthcare Robotics, AI-Powered Surgical Robots, Robotics for Elderly Care and Rehabilitation, Robotic Perception and Vision, Computer Vision for Robotics Applications, Ethical, Security, and Societal Aspects

VLSI AND EMBEDDED SYSTEM - TRACK 6

Digital and Analog VLSI, ASIC and FPGA Design Methodologies, Reconfigurable Architectures and FPGA-based Systems Design, Emerging Memory Technologies, Quantum and Spintronics Circuits VLSI Design Automation and CAD Tools , AI/ML for VLSI Design Automation Embedded Systems Design Microcontroller and Microprocessor-based Design, Real-Time Operating Systems (RTOS) FPGA-based Embedded Systems Hardware/Software Co-Design, Cyber-Physical Systems RISC-V Architectures and Implementations, AI/ML Accelerators in Hardware, Edge AI Systems, 3D ICs and Heterogeneous Integration, Quantum Computing Circuits, Green Electronics and Sustainable

IMPORTANT DATES

LAST DATE FOR **PAPER SUBMISSION**	**20 MAY 2025**
ACCEPTANCE **NOTIFICATION**	**05 JUNE 2025**
LAST DATE FOR **CAMERA READY** COPY SUBMISSION	**15 JUNE 2025**

REGISTRATION DETAILS

AUTHOR	FEE INCLUDING TAX
FACULTY	RS.2000
STUDENT	RS.1000
INDUSTRY	RS.3000
FOREIGN DELEGATES	USD 100

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SUBMISSION GUIDELINE

- Please follow the formatting instructions and templates from IEEE.
- Be sure to use the IEEE standard two column conference paper template.
- You can download MS Word and Latex templates from:
- http://www.ieee.org/conferences_events/conferences/publishing/templates.html
- The maximum length of the paper for review is 6 pages including references.
- All submitted papers will be peer-reviewed based on their quality and relevance.
- Papers having poor quality and/or high similarity index will be desk rejected (without review).
- InRACS only considers original papers that have not been published or submitted for publication elsewhere.
- Fullpaperscanbesubmittedthrough https://easychair.org/conferences/?conf=inracs25.
- All submitted papers will be peer-reviewed based on their quality and relevance.

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PUBLICATION DETAILS

SELECTED PAPERS WILL BE PUBLISHED IN INTERNATIONAL JOURNAL OF INNOVATIVE RESEARCH IN TECHNOLOGY - AN UGC APPROVED JOURNAL (IJIRT)

https://ijirt.org/

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ABOUT INSTITUTION

College of Engineering Vadakara (CEV) formerly known as Co-operative Institute of Technology, Vadakara, is the first engineering college under Co-operative Academy of Professional Education (CAPE) established by Govt. of Kerala in the year 1999. This was started with a broad vision of assisting the Government to impart quality education to the meritorious and economically backward students in the State without much financial burden.

FOR MORE DETAILS VISIT

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