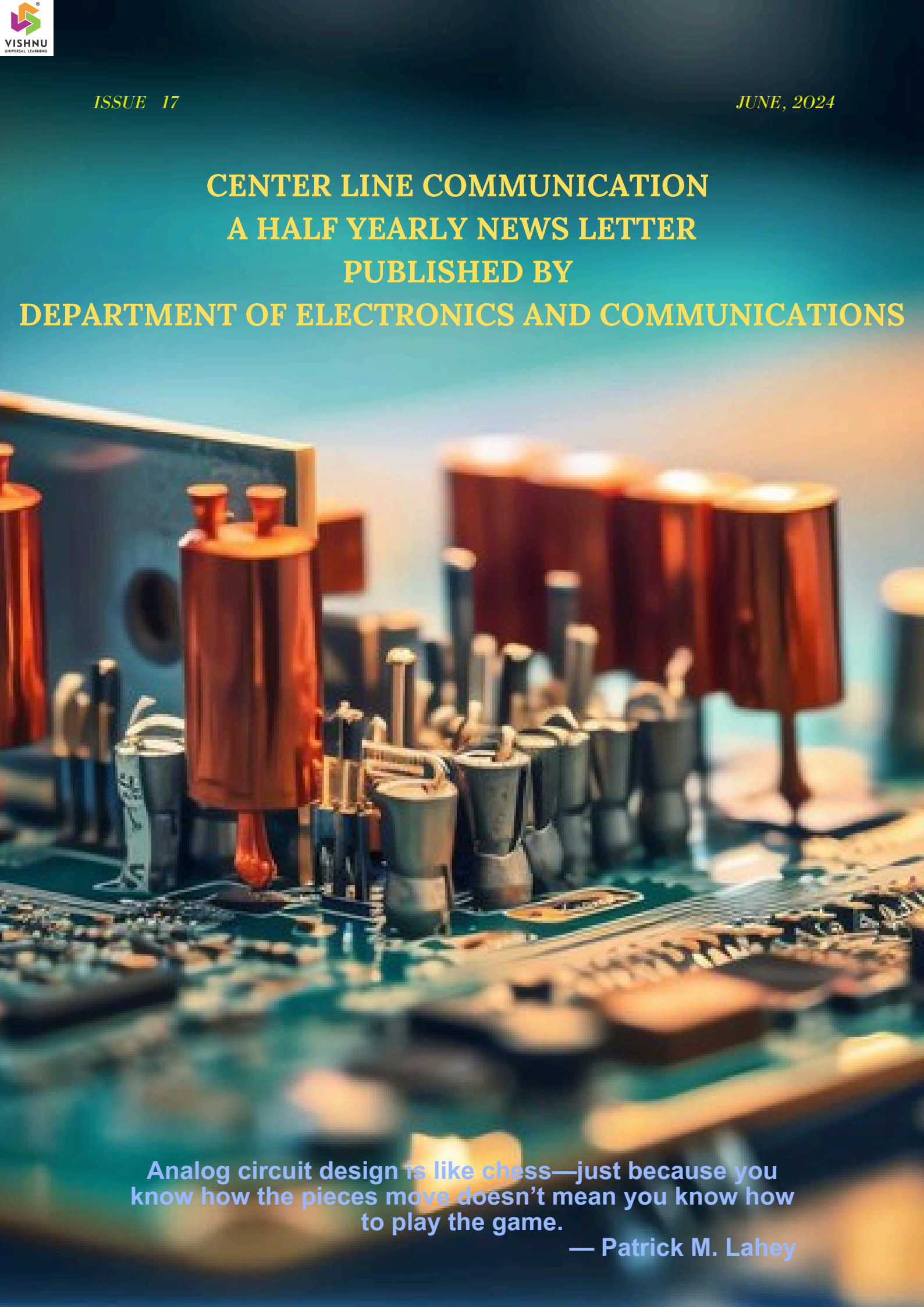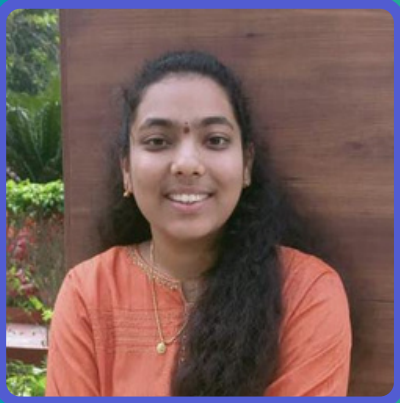# CENTER LINE COMMUNICATION
# A HALF YEARLY NEWS LETTER
# PUBLISHED BY
# DEPARTMENT OF ELECTRONICS AND COMMUNICATIONS

Analog circuit design is like chess—just because you know how the pieces move doesn't mean you know how to play the game.

— Patrick M. Lahey

# STUDENT ACHIEVEMENTS



Ms. Sai Saranya of 2024 graduated batch of ECE department got final selection for 'Kalpana fellowship' with a stipend of 50,000/- rupees after clearing multiple rounds of interview and one case study presentation.



Ms. T. Navya Yasaswini, Ms. P. Jaswini, Ms. Md. Neha Taslim, and Ms. S. Gowthami, students of IV ECE achieved a significant milestone by being selected for the L&T Techgium 2024 Finals. Guided by Dr. M. Venkata Subbarao, they were one of top 32 teams chosen from over 4,400 teams across India, and the only team from Andhra Pradesh.

# FACULTY ACHIEVEMENTS

## Congratulations!

## Project Grant

Dept. of ECE received a prestigious research grant from Ministry of Electronics and Information Technology (MeitY) Awards Groundbreaking Research Project under C2S Scheme. The title of the project is "Memory-Optimized Co-Processing Unit for Enhanced Edge AI,". Received funding of INR 64.55 lakhs and will be conducted over duration of five years in the field of VLSI (Very Large Scale Integration). Dr. K Padmavasavi professor and HOD-ECE is Chief Investigator and Dr. M V Ganeswara Rao Associate professor, Dept. of ECE, as Co-Chief Investigator along with Dr. M V Subba Rao and Mr. G Challaram as Project team.

# ✳ Publications ✳

Dr. M. V. Subba Rao Associate professor in Dept. of ECE Presented a paper titled "Insights into Seafood Quality: Machine Learning Algorithms and Key Feature Analysis"in 2024 International Conference on Distributed Computing and Optimization Techniques (ICDCOT) organized by SJB INSTITUTE OF TECHNOLOGY, Bangalore in the month of May 2024.

Dr. M. Prema Kumar Professor in Dept. of ECE published a paper entitled "CROP YIELDING RATE PREDICTION AND ANALYSIS USING DEEP MACHINE LEARNING ALGORITHMS" Journal of Theoretical and Applied Information Technology. In the month of April 2024.

Mr. Kommisetti Murthy Raju Associate professor in Dept. of ECE published a paper entitled " An investigation of Malware Detection System using Deep Learning on computing Systems, in " 5th International Conference on Information Management & Machine Intelligence (ICIMMI- 2023) held at Poornima Institute of Engineering & Technology during the month of May 2024.

Mr. Kommisetti Murthy Raju Associate professor in Dept. of ECE published a paper entitled " An overview Scientific Cloud computing Web-based cloud services issues and challenges, in " 5th International Conference on Information Management & Machine Intelligence (ICIMMI- 2023) held at Poornima Institute of Engineering & Technology) held at Poornima Institute of Engineering & Technology during the month of May 2024.

Mr. Kommisetti Murthy Raju Associate professor in Dept. of ECE published a Book Chapter entitled " Homomorphic Encryption and Machine Learning in the Encrypted Domain, in " Innovative Machine Learning Applications for Cryptograph with ISBN13: 9798369304877 conducted by IGI in the month of April 2024.

Dr. M. V. Subba Rao Associate professor in Dept. of ECE Presented a paper titled "Constrained Optimization Guided Approach for Multispectral and Panchromatic Image Fusion" in Journal of the Indian Society of Remote Sensing in the month of May 2024.

Mr. G. Challa Ram Presented a paper titled "UWB Cone Antenna with Azimuthal Symmetry for IoT Applications" in 2024 International Conference on Distributed Computing and Optimization Techniques (ICDCOT) organized by SJB INSTITUTE OF TECHNOLOGY, Bangalore in the month of May 2024.

Dr. M. Prema Kumar of ECE department published a paper entitled "Detection of Casing Laceration Using Dense CNN" in the Journal of Theoretical and Applied Information Technology (JATIT). In the month of December.

Dr. R. Sahoo and Dr. G. R. L. V. N. Srinivasa Raju Dean R&D of ECE department published a paper entitled "Dual-band Microstrip Fork Shaped Terahertz Antenna for Short Range Wireless Application, in " 2023 4th IEEE Global Conference for Advancement in Technology (GCAT), Bangalore, India.



Mr. Kommisetti Murthy Raju of ECE department published a paper entitled " A Machine Learning Approach for the Underwater Investigation of Malicious Activity in a Wireless Sensor Network, in " 2023 International Conference on Sustainable Communication Networks and Application (ICSCNA).



Mr. Kommisetti Murthy Raju of ECE department published a Book Chapter entitled "Applications of machine learning in education and skill developments", in Facilitating Global Collaboration and Knowledge Sharing in Higher Education With Generative AI, in the month of December 2023.



Mr. Kommisetti Murthy Raju of ECE department published a Book Chapter entitled " Implementation and Performance Evaluation of Asymmetrical Encryption Scheme for Lossless Compressed Grayscale Images, in " International Conference on Cognitive Computing and Cyber Physical Systems conducted in the month of January 2024.

Dr. M V Ganeswara Rao, Associate Professor, Dept. of ECE, SVECW presented a technical paper "High Performance VLSI Architecture for Real-Time Video Edge Detection High Performance VLSI Architecture for Real-Time Video Edge Detection " in "IEEE Second International Conference on Advances in Computational Intelligence and Communication" IEEE ICACIC-2023



Dr. G R L V N Srinivasa Raju of ECE department Published a paper titled "Enhanced Skin Cancer Classification Through A Hybrid Optimized Approach: Deep Echo Network Machine Utilizing Pelican-Optimized Deep Kohonen Features" in Traitement du Signal, Vol. 40, No. 6, pp. 2455-2469, 2023.

Mr. G. Challa Ramof ECE department published a paper entitled "Spoof Surface Plasmons Based Reconfigurable Band stop Filter for THz Applications. in the Journal of Opt Quant Electron. On 18th of January 2024.

Ms. M.Hemalatha of ECE department published a paper entitled " IoT-Enabled Smart Trolley with RFID for Enhanced Shopping Experience", in 14th international conference onComputer Communication and Informatics (ICCCI) held in January 2024.

Dr. M. V. Subba Rao of ECE department published a Book Chapter entitled" Schizophrenia Identification Through Deep Learning on Spectrogram Images," Cognitive Computing and Cyber Physical Systems. IC4S 2023. Lecture Notes of the Institute for Computer Sciences, Social Informatics and Telecommunications Engineering conducted in the month of January 2024.

Dr. G R L V N Srinivasa Raju of ECE department Presented a paper titled "Area And Power Efficient Least Mean Square Adaptive Filter Using Approximate Arithmetic" in International Conference on Recent Advances in Applied Sciences and Engineering 2023 (ICRAAE-2023) organized by Shri Vishnu Engineering College for Women, Andhra Pradesh during 22 &; 23 December 2023.

Dr.Ganeswara Rao. M.V of ECE department published a paper entitled Exploring High-Temperature Reliability of 4H-SiC MOSFETs: A Comparative Study of High-K Gate Dielectric Materials. Trans. Electr. Electron. Mater. (2023).

Dr. M. Sumalatha of ECE department published a paper entitled "Novel Design of Volumetric Antenna for Wideband Applications" in the Journal of Theoretical and Applied Information Technology (JATIT). In the month of February 2024.

Dr. M. Sumalatha of ECE department published a paper entitled "Implementation of High-Speed FIR Filter with Distinct Parallel Adders" in the Journal of Advanced Engineering Science in the month of December 2023.

# STUDENT ACTIVITIES

## Expert Talk

Department of ECE organized an Expert Talk on "Achieving Problem Solution Fit and Product Market Fit" on 20th February 2024. Dr. K. Padma Vasavi- IIC Innovation Ambassador, Professor & HOD- ECE Department is the resource person for the talk.

# ✵ ISTE STUDENT CHAPTER ✵

National science day 2024 was celebrated on 28th February, at Chess Board at open Air auditorium under the ISTE STUDENT CHAPTER in Association with Institution's Innovation Council (IIC) under the guidance of Faculty Advisor, Dr.G.R.L.V.N. Srinivasa Raju, Professor, Dean R&D. A total of 488 students of various colleges around our SVES Campus have actively participated in 10 Technical events.





## Glimpses of the Events
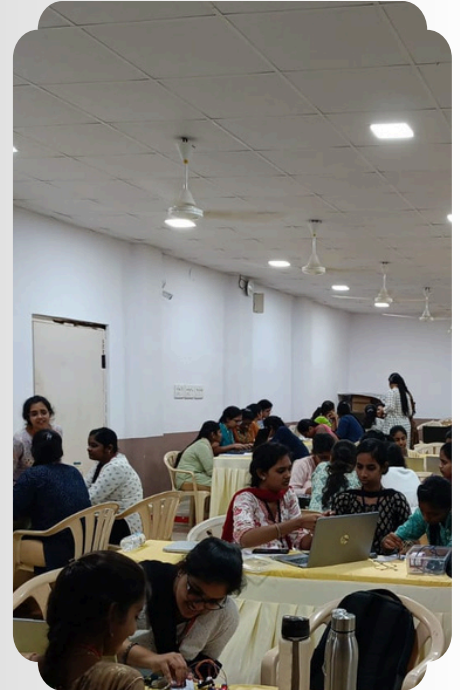
# TECHNOVA
## 2K24

# Glimpses of events Conducted by ECE



Radio War-ECE



Technical Treasure Hunt-ECE



Make A Thon-ECE

# TECHNOVA

Technova 2k24 was a two-day national-level technical symposium organized by Sri Vishnu Engineering College for Women (SVECW) on 11th & 12th March 2024. The event aimed to provide a platform for students to showcase their technical skills, knowledge, and innovations. It featured various competitions, workshops, Hackathons seminars, and exhibitions covering a wide range of technical fields. Technova 2k24 aimed to inspire and encourage young minds from different regions to explore and excel in the field of technology.

# SPORTIFY - 2K24

## ANNUAL SPORTS MEET

# RESEARCH & DEVELOPMENT CELL

**1.** Research and Development cell of SVECW different events during the Month of February 2024. One activity is to showcase the projects conducted for the students and the second one is for the faculty to start research related activities.

Research and Development call of SVECW successfully conducted R&D Showcase 2024 on February 29th, 2024. The event was honored by the esteemed presence of Prof. G. Srinivasa Rao, Principal, Prof. P Srinivasa Raju, Vice-Principal, Dr. Raju AEDLA, Dr. Sivakumar Krishnan, Dr. G.R.L.V.N.S. Raju, Dr. V Purushothama Raju, Dr. Durga Prasad, and Heads of Departments along with R&D coordinators from all departments. A total of 265 projects focusing on hardware and software were presented. Additionally, the event featured 11 outstanding ideas and concepts from the hackathon.
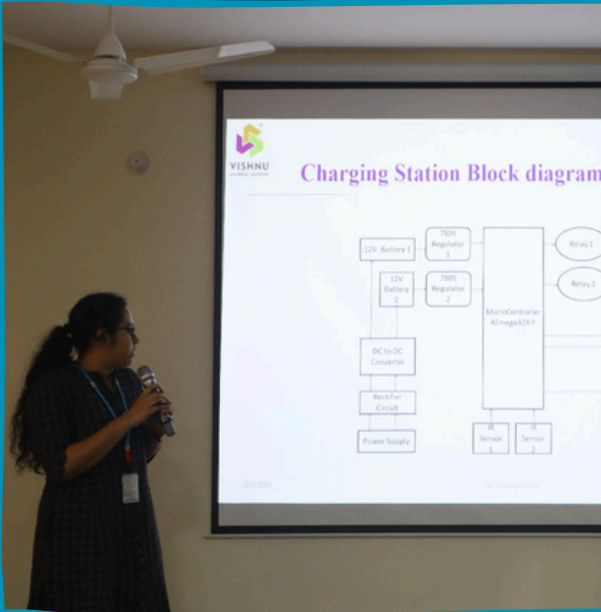


## R&D SHOWCASE 2024



**2.**

## RESEARCH KICK-START



Research and Development cell conducted a Two-day workshop on Research Kickstart was conducted on February 16th & 17th, 2024. The workshop, tailored for faculty members aspiring to pursue Ph.D. studies, provided an intensive learning experience.

**3.**

Research & Development Cell organized of R-Pratibha Student Series-I, held on February 24th, 2023. This event was meticulously designed with the aim of nurturing and elevating the research culture among our students.
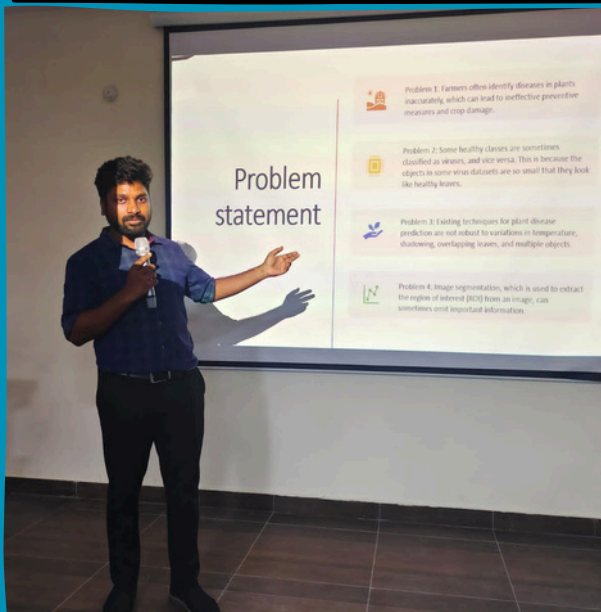


# R-PRATIBHA STUDENT SERIES-I



**4.**

The Research & Development Cell organized of R-Pratibha Faculty Series-I, held on February 26th, 2023. This distinguished event was meticulously crafted with the objective of fostering and elevating the research culture among our esteemed faculty members.



# R-PRATIBHA FACULTY SERIES-I