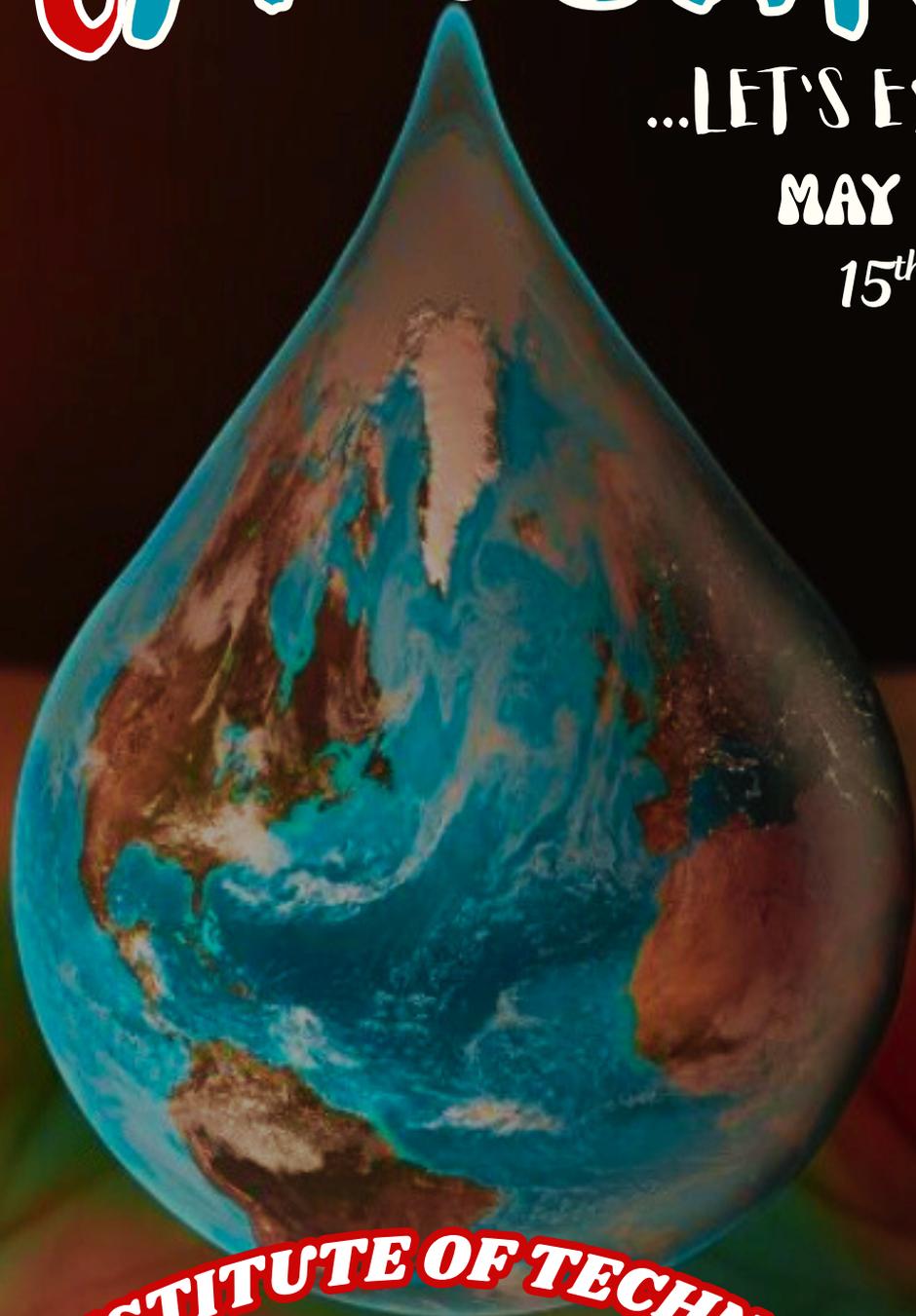


ENCYNOSSURE

...LET'S EXCEL

MAY '2025

15th Issue



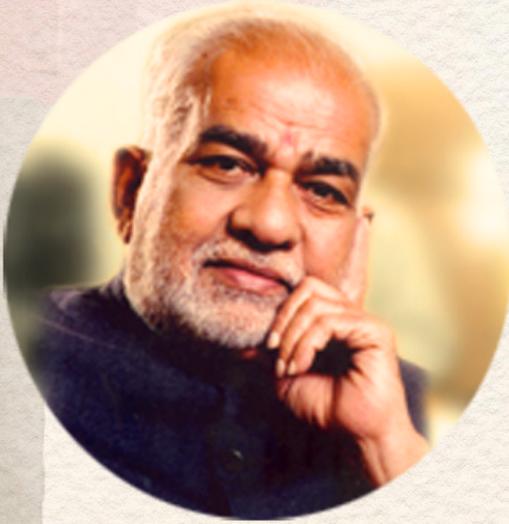
VISHNU INSTITUTE OF TECHNOLOGY (A)



VISHNU
UNIVERSAL LEARNING

Vishnu Institute of Technology

(Autonomous)



Padma Bhushan

Dr. B. V. Raju

Vishnu Institute of Technology, the scion of Shri Vishnu Educational Society was established in 2008 and is currently the eleventh educational institution to disseminate education under the aegis of this society. Nascent that it is, it combines in its matrix the lofty idealism of its Founder Chairman the Late Padma Bhushan.

Dr. B. V. Raju, a distinguished industrialist, philanthropist and an eminent educationalist; the experience and vigour provided by the Chairman Sri K. V. Vishnu Raju, a man of holistic vision and his team comprising dexterous administrators, reputed academicians and brilliant line students. They constantly strive to make the institution join the ranks of prestigious technical institutions.

Campus

The campus, sprawling over 100 acres, is located in the verdant atmosphere of Vishnupur, Bhimavaram. It is in the vicinity of the town and is well connected by rail and road. VISHNU provides a home away from home to students who opt for a residential mode of education. The hostels are amidst the serene and picturesque green ambience congenial to pursue education.

Hands on Experience

To make the instruction in VISHNU more practical-oriented, special focus is on hands on experience. The Assistive Technologies Lab works in collaboration with the University of Massachusetts, USA to help students combine technology with a humane approach. Gadgets for the physically challenged are designed and developed here by students under the guidance of eminent professors both from the Institute and abroad. VISHNU aims at empowering students with technical skills and a “can-do” entrepreneurial spirit. The IBM Software Centre of Excellence in the campus provides students with World-Class education there by increasing the skill set of each student and faculty for a great career.

HELM OF AFFAIRS



Sri K.V. Vishnu Raju
Chairman, SVES

Academics are a continuing process of exploration, growth and sustenance. Today information explosion has brought about many changes. Every day brings in new demands. One has to constantly upgrade to cope with the fast emerging trends. Hence it has become imperative to all the stakeholders in education to strengthen themselves with the necessary knowledge, skills and attitude to keep themselves abreast of the rapid changes. The stimulus has been given it is time for your response.

I come with deep insights into quality education in the areas of future skills required to be embedded in the courses offered by our autonomous colleges across Sri Vishnu institutions, and industry relevant knowledge to drive disruptions in higher education. I'm in close coordination with the Vishnu Educational Development and Innovation Centre (VEDIC) at Hyderabad, a campus dedicated to innovations in teaching pedagogy, learning styles and continuous assessment methods for active learning of students.



Sri Ravichandran Rajagopal
Vice Chairman, SVES



Sri K. Aditya Vissam
Secretary, SVES

The way I want to inspire as a leader is to keep the faculty focused on the objective of the business of education itself and to keep my students engaged in a meaningful way and not only through the regular academic rigor of running a syllabus but also to identify their inner talent. Therefore it is as much an important attribute that we need to bring into our students in our college and create career track paths through interactions with them. My job is to bring that experience by giving them the right alignment tools to accomplish their goals.



Dr. M. Venu
Principal

It gives me an immense pleasure to note that the Department of Electronics and Communication Engineering is bringing out the departmental magazine. Students have enormous powers inherent in them. A college is a wonderful institution which can bring to fruition the latent talents of its wards. Magazine is one of the forums by which students can exhibit their talent in literary skills. I am happy to note that a group of students who are interested have come forward to make it a reality. I see their thirst to prove themselves and their talent through the medium of communication.

I strongly feel that education is a blend of academic excellence and creativity and as the Principal of the college; my motto is to encourage and empower our students to grow as a strong, reflective and humble individuals with discerning minds, prepared to make a mark in all spheres of life.

I congratulate teaching and non teaching staff, editorial board and students of ECE Department for bringing this edition of Magazine Wish you all the best.

Our priority is to provide every one with formal qualification for a rewarding career. In Vishnu, we aim for every student to settle in a suitable career path of choice. Together with the entire supportive community of vishnu's dedicated faculty and staff, we will do our best to provide you with a caring environment that will enable you to take the right steps towards a brighter future and career success, as well as outstanding student experiences. We pride ourselves in timely completion by students. I therefore wish to urge you to work hard from the very beginning and remain steadfast.



Ms. M. Srilakshmi
Vice Principal

With immense pleasure, I with my faculty team play a vital role in leading the ECE Department of Vishnu Institute of Technology towards development with growing pace of technology. Department magazine EnCynosurE is one such part of initiative, which empowers our students towards overall development of one's self, department and the organization. Through this platform I would like to congratulate the VIT-ECE for continuing the bimonthly department magazine EnCynosurE. I'm sure this technical culture will be a platform to both student and faculty fraternity to exhibit the hidden talents. Finally, my best wishes to the editorial board members and huge applause to the contributors for taking the responsibility and making this happen. .



Dr. N. Padmavathy
HOD - ECE

VISION OF THE COLLEGE

- **To empower the students through Academic excellence and Ethics so as to bring about social transformation and prosperity.**

MISSION OF THE COLLEGE

- **To expand the frontiers of knowledge through quality education.**
- **To provide value added Research and development.**
- **To embody a spirit of excellence in Teaching, Creativity, Entrepreneurship and Outreach.**
- **To provide a platform for synergy of Academy, Industry and Community.**
- **To inculcate high standards of Ethical and Professional behaviour.**

VISION OF THE DEPARTMENT

- **In pursuit of world class excellence in the field of Electronics and Communication Engineering by empowering quality education and research.**

MISSION OF THE DEPARTMENT

- **To empower the students with knowledge and competencies in the frontier fields conforming to international standards.**
- **To enable the students to develop innovative solutions in collaboration with industries and research institutes to meet the local and global needs through project based learning.**
- **To mould the students professionally with a consciousness of moral values and professional ethical code.**

ABOUT THE INSTITUTION

Vishnu Institute of Technology, was established in 2008 by Sri Vishnu Educational Society (SVES), a leading educational trust to promote quality education, under the aegis of eminent philanthropist Padma Bhushan Dr. B.V.Raju (Late). The institute is approved by AICTE and is permanently affiliated to JNTUK, Kakinada. It has got Autonomous status in the academic year 2019-20 and is accredited by NBA and NAAC 'A+' with 3.51 CGPA. We offer 9 UG Courses, 4 PG Programs and we also offer research degree programs in ECE and Mechanical Engineering

DEPARTMENT OF ELECTRONICS AND COMMUNICATION ENGINEERING

To impart value based technical education and train students to turn out fullfledged engineers in the field of Electronics & Communication Engineering with an overall background suitable for making a successful career either in Industry/Research or higher education i.e, from A.Y 2008-09 with an intake of 60 students. Presently, the intake of the ECE Department is 180 students. The department has faculty strength of 44 well qualified, experienced and dedicated Post graduates with seven Doctorates and some of them are pursuing Ph.D in different streams and 6 supporting staff.

The department encourages students into postgraduate studies and prepares them for leadership roles in research and development. ECE Department is recognised as Research Centre by JNTU Kakinada in A.Y 2019-20. Along with UG, one M.Tech course in Digital Electronics and Communication Systems from A.Y 2014-15 with an intake of 18 students is also offered.

The ECE department has good infrastructure with 8 different labs namely Microwave Engineering lab, Microprocessor Lab, Digital ICs Lab, Communications Lab, Computer Lab, EDC Lab, LIC Lab, DSP & VLSI Lab. All the labs are fully equipped to provide the present day advanced technology. ECE department has three Centre of excellences, Assistive Technology Lab (ATL), National Instruments lab (NI) and Drone Centre of Excellence(DCE)..

The Department has student's chapters like IETE Student's Forum and ISTE Student's chapter.

Women's Day



The ECE Department celebrated International Women's Day on March 8, 2025, with great enthusiasm in the presence of all girl students from various years. The event featured two esteemed guests—**Dr. Sridevi Vegiraju**, who runs Prakruti ashram in Bhimavaram, and **Dr. N. Satya Vijnana Devi**, an advocate. Both guests delivered inspiring motivational talks that encouraged confidence and self-empowerment among girl students. The program was organized under the leadership of **Dr. N. Padmavathy (HOD ECE & Dean R&D)**, with active participation from the lady faculty, who also conducted engaging cultural activities and games, making the celebration both meaningful and memorable.

WOMEN
CAN ♥



Paper-a-thon 2025

The Department of **Electronics and Communication Engineering** successfully conducted a three-day research hackathon, Paper-a-thon 2025, from 10th to 12th March, 2025. The event was inaugurated by **Principal Dr. M. Venu**, with encouraging words on the importance of research. **Vice-Principal Ms. M. Srilakshmi** and **Dr. N. Padmavathy, HOD ECE & Dean R&D**, also addressed the gathering, motivating students to pursue innovation. **Prof. K. Srinivas, Dean Academics**, highlighted departmental initiatives in research.

The hackathon saw enthusiastic participation from 46 student teams, guided by faculty mentors. A total of 43 research papers were prepared, with submissions made to reputed journals and conferences. Additionally, 4 patents were filed, with some projects achieving both outcomes.

Faculty reviewers included **Dr. S. Sugumaran, Dr. G. Prasanna Kumar, Dr. B. V. V. Satayanarayana, and Dr. Naveen Kumar Maurya**. The event was smoothly coordinated by the IV-Year Co-Ordinator Mr. K. Ramesh Chandra, Assoc. Professor & Department R&D Co-Ordinator Mr. D. Durga Prasad, Asst. Professor.



FAREWELL



PARTY

On 13th March, the Department of Electronics and Communication Engineering came together to bid a heartfelt farewell to the final-year students of the 2025 batch. Organized by the 3rd year students, the event was filled with emotion, gratitude, and celebration.

The Head of the Department and faculty members graced the occasion, offering words of encouragement and pride as they reflected on the journey shared with the graduating students. Cultural performances, nostalgic videos, and warm messages from juniors created an atmosphere of joy and bittersweet memories.

To our beloved final-year students—your time here may be ending, but you leave behind a legacy of inspiration. As you step into a new chapter, know that you'll always be part of the ECE family.



R&D SHOWCASE

The Department of Electronics and Communication Engineering (ECE) successfully organized a Research & Development (R&D) showcase, spearheaded by **Dr. N. Padmavathy (HOD-ECE & Dean of R&D)**. The event was aimed at highlighting the ongoing research projects, innovative student ideas, and significant faculty contributions in emerging technological areas.

The showcase was graced by esteemed guests from academia and industry, providing an excellent platform for interaction, feedback, and collaboration. The Chief Guest for the event was **Prof. Ranjit Thapa-SRM University, Andhra Pradesh**. The Guest of Honor included **Dr. K. Himabindu, Professor at NIT-Andhra Pradesh**, along with other distinguished dignitaries such as **Dr. Kiran Kumar, Professor at NIT-Warangal, Telangana** and **Dr. M. Kamaraju, Professor at SRGEC, Andhra Pradesh**. Students and faculty members presented research models, prototypes, and posters, fostering a vibrant spirit of innovation and technical excellence. The event encouraged participants to engage in impactful, industry-relevant research. **Dr. N. Padmavathy** appreciated the collective efforts of all involved and motivated the participants to continue pursuing excellence in research, aiming to make significant contributions to the field and industry.





ANNUAL DAY

2K25



The Annual Day of Vishnu Institute of Technology was celebrated with great enthusiasm and grandeur on 14th April of this year. The event showcased the vibrant cultural spirit of the institution, featuring a colorful array of performances including classical and contemporary dances, musical renditions, skits, and a fashion show. Students from all departments participated actively, reflecting the diversity and talent within the campus. The celebration also included prize distributions recognizing academic excellence and achievements in sports and extracurricular activities. The event was graced by distinguished guests, faculty, and parents, making it a memorable evening of joy, creativity, and celebration.

On the occasion of the Annual Day celebration, Dr. N. Padmavathy (HOD-ECE & Dean R&D) and Mr. K. Kiran (Asst. Professor) were felicitated for completing 10 years of exemplary service with Shri Vishnu Educational Society. The felicitation was carried out by Sri Ravichandran Rajagopal, Vice-Chairman of the Society, in recognition of their unwavering commitment, dedication, and valuable contributions to the institution over the past decade.



R&D WORKS

I. Acted as Resource Person/Others:

1. **Dr. N. Padmavathy** has served as a reviewer for several conferences including, International Conference on Communication and Computational Technologies (ICCCT 2025) on 23.01.2025 & 14.01.2025, 2025 IEEE International Conference on Contemporary Computing and Communications (InC4 2025) on 09.01.2025.
2. **Dr. N. Padmavathy** has served as a reviewer for several conferences including and journals, including, Journal of Ad Hoc networks on 17.02.2025, Journal of Reliability and Statistical Studies on 14.02.2025, Indian Journal of Pharmaceutical Sciences on 03.02.2025, IEEE International Conference on Contemporary Computing and Communications (InC4 2025) on 04.02.2025 & 27.02.2025, ICMVRCET-2025 on 04.02.2025, SCRS sponsored conferences on 17.02.2025.
3. **Dr. N. Padmavathy** has served as a reviewer for several conferences and journals, including, Journal of Reliability and Statistical Studies on 14.03.2025, Expert Systems With Applications on 01.03.2025, Ad Hoc Networks on 26.03.2025.
4. **Dr. N. Padmavathy** has served as a Session Chair, Track 3 ICSSSES – 2025 on 14.03.2025.
5. **Dr. Prakash Pareek** has served as a reviewer for several conferences and journals, including, IEEE Sensors Journal for manuscript entitled “Linearizing optical frequency chirp of a DFB laser by optimizing the modulation waveform using resampling technique for FMCW LiDAR” on 15-01-2025, IEEE IoT Magazine for manuscript entitled “IoT-Enabled Cryo-Hydro Synergy: Revolutionizing Burn Care Solutions for Small Hospitals” on 16-01-2025, AIP Advances Journal for manuscript entitled “X-band Polarization Conversion Radome Based on Dielectric-Embedded Metamaterial Elements for High-Power Microwave Application” on 16-01-2025, the IEEE Transactions in Nanotechnology Journal for manuscript entitled “Revolutionizing Breast Cancer Diagnosis: Harnessing Heterojunction Vertical Tunnel FET with Magnesium Silicide” on 18-01-2025, Fiber and Integrated Optics Journal for manuscript entitled “Smart Logical Traffic Routing Technique for Control Plane Interface in Data Centers” 25-01-2025.
6. **Dr. Prakash Pareek** has served as a reviewer for several conferences and journals, including, International Journal of Cloud Computing on 15.02.2025, Journal Optics Communication on 25.02.2025.
7. **Dr. Prakash Pareek** Served as an expert for delivering lecture on “Modeling and Design of THz Compatible Optoelectronic Devices Suitable for 5G mm wave and Beyond” during FDP titled Antenna Design for the Future: Innovative Approaches for 5G mm-Wave and Beyond organized by VIT Vellore on 06.02.2025.

8. **Dr. S. Sugumaran** has acted as a resource person in Hands-on Training in OptiSystem: Practical Approach to Optical System Design (Offline Workshop) at St.Peter's College of Engineering and Technology, Avadi, Chennai, on 22.02.2025.
9. **Dr. S. Sugumaran** has Served as an Resource person in Comprehensive Hands-on Training in OptiSystem: Practical Approach to Optical System Design (Offline Workshop) At St. Peter's College of Engineering and Technology, Avadi, Chennai on 03.03.2025
10. **Dr. S. Sugumaran** has Served as an a reviewer in Paper-a thon 2025
11. **Dr. B V V Satyanarayana** and **Mr. B. Elisha Raj** has served as a reviewer for 1st International Conference on Microstructure, VLSI, Robotics, Communication ,Electrical & Emerging Technologies using AI-ML Algorithms (IC MVR CET 2025) in February 2025.
12. **Dr. B V V Satyanarayana** has Served as an a reviewer in Paper-a thon 2025
13. **Mrs. G Srilakshmi** has Served as an a reviewer for several conferences in International Conference on Smart Materials, Virtual Intelligence and Robotics Automation using Advanced Electronics and Computational designs on 08.03.2025.
14. **Mr. K Ramesh Chandra** has served as a reviewer for Springer Nature Journals - Annals of Telecommunications & Telecommunication Systems on January 2025

II. Faculty Publications in Journals & Conferences:

1. **Dr. N. Padmavathy**, Professor in Department of ECE, has published a research paper entitled “ Cost-Effective Wireless Health Monitoring with ARDUINO for Physiological Parameters”. IC4S 2024. LNICST, Vol 599. Springer, Cham. (Scopus)
2. **Dr. Prakash Pareek**, Associate Professor in Department of ECE, has published a research paper entitled “Enhancing Supply Chain Efficiency in India: A Sustainable Framework to Minimize Wastage Through Authentication and Contracts” in Sustainability Journal, (SCI/Scopus), January 2025.
3. **Dr. Prakash Pareek**, Associate Professor in Department of ECE, has published a research paper entitled “Use of IoT with Deep Learning for Classification of Environment Sounds and Detection of Gases” in Computers Journal, (SCI/Scopus), January 2025
4. **Dr. Prakash Pareek**, Associate Professor in Department of ECE, has acted as editor in 5th EAI International Conference, IC4S 2024, Proceedings, Part I, Part II, Part III, LNICST, Volume 597, Cognitive Computing and Cyber Physical Systems. (Scopus) February 2025.
5. **Dr. Prakash Pareek**, Associate Professor in Department of ECE, has published a research paper entitled “ Investigation of Quantum Machine Learning for Smart Eco System Focusing on Energy Optimization”. IC4S 2024. LNICST, Vol 597. Springer, Cham. https://doi.org/10.1007/978-3-031-77075-3_12. (Scopus)

6. **Dr. Prakash Pareek**, Associate Professor in Department of ECE, has published a research paper entitled “ Investigation of Quantum Machine Learning for Smart Eco System Focusing on Energy Optimization”. IC4S 2024. LNICST, Vol 597. Springer, Cham. https://doi.org/10.1007/978-3-031-77075-3_12. (Scopus)
7. **Dr. Prakash Pareek**, Associate Professor in Department of ECE, has published a research paper entitled “Non-invasive Technique for Detecting Glycosuria Through Image Processing and Deep Learning Approaches”. IC4S 2024. LNICST, Vol 597. Springer, Cham. https://doi.org/10.1007/978-3-031-77075-3_17. (Scopus)
8. **Dr. S. Sugumaran**, Professor in Department of ECE, has published a research paper entitled “ Assessment of the Decay of Monuments Using Deep Learning and CNN”. IC4S 2024. LNICST, Vol 597. Springer, Cham. https://doi.org/10.1007/978-3-031-77075-3_28. (Scopus)
9. **Dr. G. Prasanna Kumar**, Professor in Department of ECE, has published a research paper entitled “ FPGA Based Peak Cancellation for Efficient Communication Transmitters”. IC4S 2024. LNICST, Vol 598. Springer, Cham. https://doi.org/10.1007/978-3-031-77078-4_13. (Scopus)
10. **Dr. G. Prasanna Kumar**, Professor and **Dr. B. V. V. Satyanarayana**, Associate Professor **Prudhvi Raj Budumuru & B. Elisha Raju**, Assistant Professors in Department of ECE, has published a research paper entitled “ FPGA Implementation of Fast Fourier Transform Using Hybrid Pipelining Technique”. IC4S 2024. LNICST, Vol 598. Springer, Cham. https://doi.org/10.1007/978-3-031-77078-4_14. (Scopus)
11. **Dr. G. Prasanna Kumar**, Professor & **Dr. B. V. V. Satyanarayana**, Associate Professor in Department of ECE, has published a research paper entitled “ Low Power Adder Circuit Design and Implementation Using Lector Technique”. IC4S 2024. LNICST, Vol 598. Springer, Cham. https://doi.org/10.1007/978-3-031-77078-4_15. (Scopus)
2. **Dr. B. V. V. Satyanarayana**, Associate Professor in Department of ECE, has published a research paper entitled “FPGA Implementation of Optimized Floating Point Multiplier Using Minimal Error Logarithmic Approach”. IC4S 2024. LNICST, Vol 598. Springer, Cham. https://doi.org/10.1007/978-3-031-77078-4_16. (Scopus)
13. **Dr. B. V. V. Satyanarayana**, Associate Professor in Department of ECE, has published a research paper entitled “Voice-Based Smart System for Emotion Recognition and Regulation”. IC4S 2024. LNICST, Vol 599. Springer, Cham. https://doi.org/10.1007/978-3-031-77081-4_37. (Scopus)
14. **Dr. B. V. V. Satyanarayana & Mr. A. K. C. Varma**, Associate Professors, **Dr. G. Prasanna Kumar** Professor and **B. Prudhvi Raj**, Asst. Professor in Department of ECE, has published a book chapter entitled “Characteristic Analysis of GOS HTFET” in book with title “Field Effect Transistors” John Wiley & Sons, Inc. (International), <https://doi.org/10.1002/9781394248506.ch20>. (SCOPUS) March 2025.

15. **Dr. Naveen Kumar Maurya**, Associate Professor in Department of ECE, has published a research paper entitled “Liver Tumour Detection in Computed Tomography Images Through Image Processing and Deep Learning”. IC4S 2024. LNICST, Vol 598. Springer, Cham. https://doi.org/10.1007/978-3-031-77078-4_24. (Scopus)
16. **Dr. Naveen Kumar Maurya**, Associate Professor in Department of ECE, has published a research paper entitled “An Intelligent GUI Enhancements a Robust Model for Detecting Fake News”. IC4S 2024. LNICST, Vol 599. Springer, Cham. https://doi.org/10.1007/978-3-031-77081-4_18. (Scopus)
17. **Dr. Naveen Kumar Maurya**, Associate Professor in Department of ECE, has published a research paper entitled “Design of Autonomous Lagori Game Playing Robotics”. IC4S 2024. LNICST, Vol 599. Springer, Cham. https://doi.org/10.1007/978-3-031-77081-4_38. (Scopus).
18. **Dr. Naveen Kumar Maurya**, Associate Professor in Department of ECE, has published a research paper entitled “Tunable terahertz filter using graphene for refractive index sensing” in *Diamond & Related Materials*, (SCI/Scopus), January 2025
19. **Dr. Naveen Kumar Maurya**, Associate Professor in Department of ECE, has published a research paper entitled “Tunable graphene based terahertz sensor for biochemical sensing with ML-driven refractive index prediction” in *Physica Scripta*, (SCI/Scopus), January 2025
20. **Dr. Naveen Kumar Maurya**, Associate Professor in Department of ECE, has published a research paper entitled “Tunable triband graphene metasurface absorber with wide frequency agility for 6G and beyond communication in THz gap regime” in *Optics & Laser Technology*, <https://doi.org/10.1016/j.optlastec.2025.112793>. (SCIE/SCOPUS) March 2025.
21. **Dr. Naveen Kumar Maurya**, Associate Professor and Gandreddi Lakshmi Prasanna Ashok Assistant Professor in Department of ECE, has published a research paper entitled “Tunable dual-band metasurface absorber utilizing electric dipole and magnetic loop in a DC-connected bilayer graphene stack: A theoretical approach” in *Diamond & Related Materials*, <https://doi.org/10.1016/j.diamond.2025.112208>. (SCIE/SCOPUS) March 2025.
22. **Dr. Naveen Kumar Maurya**, Associate Professor in Department of ECE, has published a research paper entitled “Design of a low-noise wideband fixed IF subharmonic mixer at W-band” in *Analog Integrated Circuits and Signal Processing*, <https://doi.org/10.1007/s10470-025-02388-y>, (SCIE/SCOPUS) March 2025
23. **Dr. M. Uma Suseela**, Associate Professor, **Ms. N. Durga Naga Lakshmi & Ms. Vardhanapu Praveena**, Assistant Professors in Department of ECE, has published a research paper entitled “Cross Layered Neighbor Route Discovery Protocol in Cognitive Radio Networks” In: Pareek, P., Mishra, S., Reis, M.J.C.S., Gupta, N. (eds) *Cognitive Computing and Cyber Physical Systems*. IC4S 2024. Lecture Notes of the Institute for Computer Sciences, Social Informatics and Telecommunications Engineering, Vol 598. Springer, Cham. https://doi.org/10.1007/978-3-031-77078-4_9. (Scopus)

24. **Dr. M. Sri Uma Suseela**, Associate Professor in Department of ECE, has published a research paper entitled “Optimization of Spectrum Sensing in Cognitive Radio Using Energy Detection and Matched Filter” in 2024 7th International Conference on Contemporary Computing and Informatics (IC3I), (Scopus), January 2025.

25. **Dr. M. Sri Uma Suseela**, Associate Professor in Department of ECE, has published a research paper entitled “Advanced Cross-Layer Protocol Architecture through Modified Ideal Link State Routing (MOLSR)” in 2024 7th International Conference on Contemporary Computing and Informatics (IC3I), (Scopus), January 2025.

26. **Mr. Abdul Rahaman**, Associate Professor in Department of ECE, has published a research paper entitled “Classification of Skin Cancer Using CNN with Transformer Layer”. IC4S 2024. LNICST, Vol 597. Springer, Cham. https://doi.org/10.1007/978-3-031-77075-3_13. (Scopus)

27. **Mr. Ch. Venkateswara Rao**, Assistant Professor and **Dr. Prakash Pareek**, Associate Professor in Department of ECE, has published a research paper entitled “Quantum Technology Fueling the Next Generation Optical Communication: Challenges and Pathways”. IC4S 2024. LNICST, Vol 598. Springer, Cham. https://doi.org/10.1007/978-3-031-77078-4_10. (Scopus)

28. **Mr. Ch. Venkateswara Rao**, Assistant Professor and **Dr. Prakash Pareek**, Associate Professor Prof.Srinivas Kanuri, Professor in Department of ECE, has published a research paper entitled “Exploring Underwater Acoustic Propagation Based on Deep Sound Channel. IC4S 2024. LNICST, Vol 598. Springer, Cham. https://doi.org/10.1007/978-3-031-77078-4_12. (Scopus)

29. **Mr. Ch. V. V. S. Srinivas**, Associate Professor in Department of ECE, has published a research paper entitled “Multiuser MIMO Systems Channel Estimation with Gaussian Distributed Data Symbols” in 2024 4th International Conference on Advancement in Electronics & Communication Engineering (AECE), GHAZIABAD, India, 2024, pp. 1-6, doi: 10.1109/AECE62803.2024.10911398.(SCOPUS) March 2025.

30. **Mr. Y .Srinivas**, Assistant Professor in Department of ECE, has published a research paper entitled “ “Exploring Prominent Convolutional Neural Network Frameworks to Identify COVID-19 Deceases by Using Medical Images”. IC4S 2024. LNICST, Vol 597. Springer, Cham. https://doi.org/10.1007/978-3-031-77075-3_16. (Scopus)

31. **Mr. B. Prudhvi Raj**, Assistant Professor in Department of ECE, has published a research paper entitled “Performance Assessment of Deep Learning-Models for Kidney Tumor Segmentation using CT Images. IC4S 2024. LNICST, Vol 597. Springer, Cham. https://doi.org/10.1007/978-3-031-77075-3_11. (Scopus)

32. **Mr. K. Ramesh Chandra**, Associate Professor in Department of ECE, has published a research paper entitled “An Energy Efficient Artificial Neural Network based Clustering Protocol for Wireless Sensor Network” in 2024 7th International Conference on Contemporary Computing and Informatics (IC3I), (Scopus), January 2025.
33. **Mr. K. Ramesh Chandra**, Associate Professor in Department of ECE, has published a research paper entitled “An Energy Efficient Improved Clustering based Data Compression Protocol in Wireless Sensor Network” in 2024 7th International Conference on Contemporary Computing and Informatics (IC3I), (Scopus), January 2025.
34. **Mr. K. Ramesh Chandra**, Associate Professor in Department of ECE, has published a research paper entitled “Predicting Adverse Interactions: A Comprehensive Review of AI-Driven Drug-Drug Interaction Models for Enhanced Patient Safety” in 2024 International Conference on IoT Based Control Networks and Intelligent Systems (ICICNIS), (Scopus), January 2025.
35. **Mr. K. Ramesh Chandra**, Associate Professor, **Mr. B Prudhvi Raj** and **Mr. B Elisha Raju**, Assistant Professors in Department of ECE, has published a research paper entitled “5G Deployment Challenges and Solutions: A Comprehensive Review” 2024 9th International Conference on Communication and Electronics Systems (ICCES), Coimbatore, India, 2024, pp. 1-6, doi: 10.1109/ICCES63552.2024.10859706. (Scopus)
36. **Mr. K. Ramesh Chandra**, Associate Professor in Department of ECE, has published a research paper entitled “Improving Multispectral Image Classification with Convolutional Networks and Hyperspectral Band” 2024 4th International Conference on Ubiquitous Computing and Intelligent Information Systems (ICUIS), Gobichettipalayam, India, 2024, pp. 225-230, doi: 10.1109/ICUIS64676.2024.10866647. (Scopus)
37. **Dr. J. Doondi Kumar**, **Dr. Prakash Pareek**, **Dr. Naveen Kumar Maurya**, Associate Professors and **Mr. D. Durga Prasad**, Assistant Professor in Department of ECE, has published a research paper entitled “ Effective Way to Communicate with Divyangjan Using Morse Code”. IC4S 2024. LNICST, Vol 599. Springer, Cham. https://doi.org/10.1007/978-3-031-77081-4_34. (Scopus)
38. **Mr. D. Durga Prasad**, Assistant Professor and **Dr. J. Doondi Kumar**, Associate Professors in Department of ECE, has published a research paper entitled “ Complex Network Articulation Points Detection and Centrality Measures. IC4S 2024. LNICST, Vol 599. Springer, Cham. https://doi.org/10.1007/978-3-031-77081-4_35. (Scopus)

39. **Mr. D. Durga Prasad**, Assistant Professor in Department of ECE, has published a research paper entitled “Aperture-Coupled Feed Patch Antenna for 5G Applications”. ICICCD 2024. LNICST. https://doi.org/10.1007/978-981-97-8329-8_47. (Scopus)

40. **Mr. B. Elisha Raju**, Assistant Professor and **Mr. K. Ramesh Chandra**, Associate Professor in Department of ECE, has published a research paper entitled “Advancing Biomedical Imaging Through High-Resolution Image Segmentation and Computational Modelling Using CNN” in 2024 7th International Conference on Contemporary Computing and Informatics (IC3I), January 2025. (Scopus)

41. **Mr. B. Elisha Raju**, Assistant Professor and **Mr. K. Ramesh Chandra**, Associate Professor in Department of ECE, has published a research paper entitled “Fuzzy Logic-Enhanced Multi-Sensor Hardware Module for Real-time Fire Detection and Notification” in 2024 7th International Conference on Contemporary Computing and Informatics (IC3I), January 2025. (Scopus)

III. Patent Publications:

1. **Dr. B. V. V. Satyanarayana** and **Dr. G. Prasanna Kumar**, Professors have filed a patent titled "Cache Controller Design for Enhanced Data Access Rates". The application number is 202541009410. The date of filing (DOF) is 05-02-2025, and the date of publication (DOP) is 14-02-2025.

2. **Mr. Kotta Kiran**, Asst. Professor has submitted a patent application titled "Innovative VLSI Architectures and Methods for Advanced Applications in the Digital Era". The application number is 202541017618. It was filed on 27-02-2025 and published on 14-03-2025.

3. **Mr. D. Durga Prasad**, Asst. Professor has applied for a patent on "Wireless Power Transfer Device". The application number is 437602-001. The patent was filed on 18-11-2024 and published on 28-03-2025

IV. Swayam-NPTEL Courses/FDP:

1. **Dr. N. Padmavathy**, Professor in the Department of ECE has attended a online course “Geodata Processing using Python and Machine Learning” organized by IIRS e-learning during the period 17.02.2025 to 27.02.2025.

2. **Dr. B. V. V. Satyanarayana** & **Dr. G. Prasanna Kumar**, Professors in the Department of ECE has attended a online course “VLSI SoC Design using Verilog HDL” organized by Maven Silicon during the period 08/01/2025 to 31/01/2025.

V. Online Course/FDP/Workshop Attended:

1. **Dr. N. Padmavathy**, Professors in the Department of ECE has attended a SERB Sponsored 5 day seminar on Hybrid Quantum- Classical Computing organized by Sri Krishna College of Technology, Coimbatore, Tamilnadu, during the period 17.02.2025 to 21.02.2025
2. **Dr. N. Padmavathy**, Professor in the Department of ECE has attended a webinar on “Building a sustainable journal ecosystem” organized by Elsevier on 27.03.2025
3. **Dr. N. Padmavathy**, Professor in the Department of ECE has attended a webinar on “Tips for writing grant applications: a funder perspective” organized by Elsevier on 28.03.2025.
4. **Dr. N. Padmavathy**, Professor in the Department of ECE has attended a webinar on “Funding Hacks for Researchers” organized by Elsevier on 29.03.2025.
- . **Dr. B. V. V. Satyanarayana & Dr. G. Prasanna Kumar**, Professors in the Department of ECE has attended a VLSID 2025 Conference organized by VLSI Society of India (VSI) during the period 04/01/2025 to 08/01/2025.
6. **Dr. Sri Uma suseela**, Associate Professor in the Department of ECE has attended a workshop on Advancements in Telehealth Industry Using IoT organized by Koneru Lakshmaiah Education Foundation Deemed To B University Off Campus Aziznagar Hyderabad, during the period 20/01/2025 to 25/01/2025.
7. **Dr. V. Siddhartha**, Associate Professor and **G. L. P. Ashok** Assistant Professor in the Department of ECE has attended a IDEATE workshop organized by VEDIC, Hyderabad during the period 19.03.2025 to 21.03.2025.
8. **Mr. CH V V S Srinivas**, Associate Professor and **Mr. D. Durga Prasad**, and **Mr. R. Bharath Kumar**, Assistant Professors in the Department of ECE has attended a FDP on Next-Generation Wireless Communication Systems: Trends, Technologies and Future Directions organized by Lakireddy Bali Reddy College of Engineering, Mylavaram, NTR District, during the period 10.02.2025 to 14.02.2025.
9. **Mrs. G. Srilakshmi**, **Mrs. P. Sri Lekha** and **Mrs. K P K LalithaVitala**, Assistant Professors in the Department of ECE has attended a IDEATE workshop on organized by VEDIC, Bhimavaram, during the period 12-02-2025 to 14-02-2025.

PLACEMENTS

S.No	Employer Name	Package (LPA)	No. of Students Placed
1	Northern Arc	7	2
2	Infosys	6.25	3
3	e litmus evaluation pvt ltd (Razorpay)	6	1
4	Capgemini VLSI	5.75	4
5	Tech Mahindra	5.5	17
6	Qentelli	5	6
7	Grenko energies Pvt Ltd	5	1
8	KPIT	4.5	9
9	Accenture	4.5	1
10	Capgemini	4.25	14
11	Cognizant	4	3
12	Averixis	4	12
13	Cognizant Genc	4	4
14	Cyient	3.8	1
15	Infosys	3.6	8
16	Sagar semiconductor	3.6	1
17	Cadsys	3.43	2
18	Advanced Gadgets Pvt. Ltd	3.12	7
19	Kushagramati Analytics	3	2
20	Movate	2.5	3
21	weblinkin	2.4	1
22	Kernex Micro systems pvt ltd	2.28	16
23	TI clean mobility pvt ltd.	2.16	6

INTERVIEW EXPERIENCE



A G B RAVIKUMAR
22PA5A0402
IV - YEAR ECE

As a final-year Electronics and Communication Engineering student, I appeared for both core and software placement interviews and was fortunate to be selected by companies like ERAM Power Electronics, CADSYS, TI Clean Mobility, and KERNEX Microsystems.

The interview process typically included an online technical test followed by one or two rounds of technical interviews and an HR round. Most technical discussions revolved around embedded systems fundamentals, electronics basics, C programming, and my final year project. I was asked questions on microcontrollers, real-time systems, power electronics, and circuit design. My project, which involved embedded hardware-software integration, drew significant interest—interviewers probed into the design, components used, and the challenges I faced during implementation. For example, TI Clean Mobility focused on battery management systems and energy efficiency, while ERAM Power Electronics tested my understanding of converters and PWM control. Even in software-oriented rounds, my embedded C skills and logical approach were appreciated. These experiences helped me realize the importance of strong core fundamentals, project clarity, and the ability to communicate technical ideas effectively.



M U V SAI ASRITH
22PA5A0413
IV YEAR ECE

I had the opportunity to attend several interviews during my engineering journey and was fortunate to receive offers from companies like Qentelli Private Limited and Efftronics Systems Private Limited.

The selection process in core electronics companies revolved around strong fundamentals, especially in VLSI, digital electronics, and basic circuit design. Interviewers often asked questions on topics like flip-flops, multiplexers, CMOS logic, and real-time applications of these concepts. Efftronics, in particular, emphasized practical understanding over theoretical answers, and discussing my final-year project played a key role in highlighting my technical depth. On the software side, Python was a common topic in many interviews. My proficiency in Python helped me tackle coding rounds that included logic-based problems, syntax clarity, and object-oriented programming concepts. At Qentelli, I had to solve problems using Python and explain my approach step-by-step, which showed how important problem-solving skills are in software roles. This experience helped me realize the advantage of having both strong core knowledge and solid programming skills. For anyone preparing for interviews, I would recommend focusing on conceptual clarity, being confident while explaining projects, and continuously practicing both technical and coding problems.

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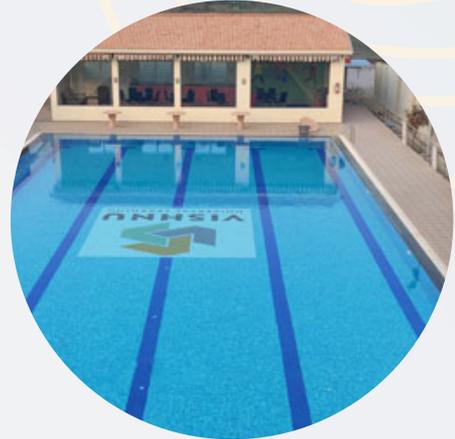


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