



Vision of the Department

The vision of the CSE (Artificial Intelligence and Machine Learning) branch is to: Create experts capable of designing tomorrow's smart technologies, such as virtual assistants and disease detection systems, as well as building intelligent systems that learn and think, resulting in technology that solves real-world problems in healthcare, transportation, education, finance, and other areas...

Mission of the Department

- M1: To Providing a comprehensive curriculum that covers foundational concepts and advanced topics in AI and machine learning and emphasizes hands-on experience and project-based learning.
- M2: Encouraging and supporting cutting-edge research in AI and machine learning and fostering collaborations with industry and academia.
- M3: Providing opportunities for professional development, networking, and lifelong learning, and supporting our alumni in their continued success in the field of AI and machine learning.

Program Educational Objectives

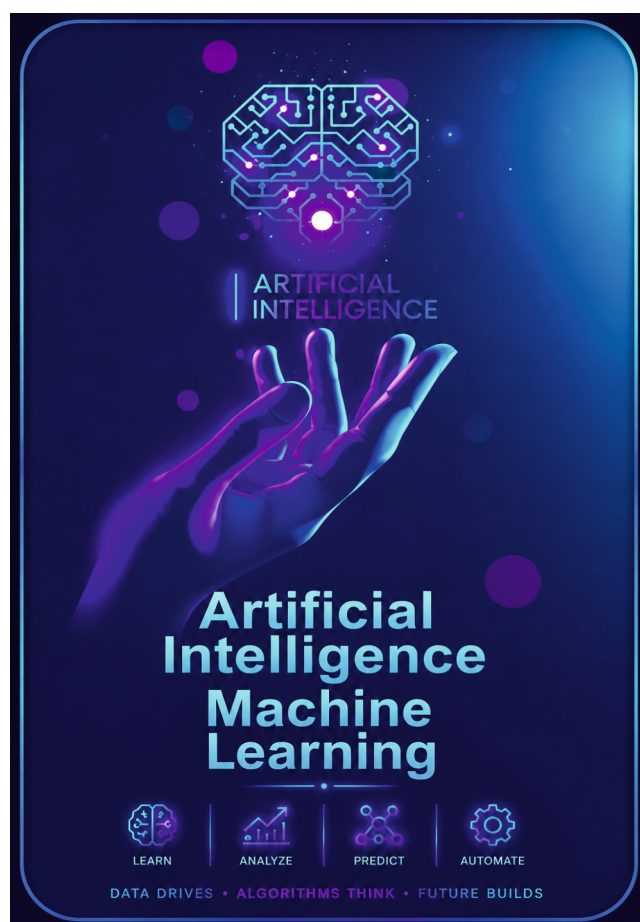
- PEO1: Exhibit the knowledge of artificial intelligence and machine learning concepts to solve complex problems in diverse industries.
- PEO2: To implement necessary skills to design, develop, and implement intelligent systems that can analyze large datasets, learn from them, and make informed decisions.
- PEO3: Apply deep understanding of ethical considerations in the development and deployment of AI systems, including privacy, security, and fairness.

Program Specific Outcomes

- PSO1: **Engineering Fundamentals:** Ability to apply mathematical foundations, algorithms, and statistical models to analyze and solve complex problems in AI and machine learning.
- PSO2: **Industrial Skills Ability:** Ability to design and develop AI and machine learning models using various tools and programming languages such as Python, R, and TensorFlow., Ability to evaluate the performance of AI and machine learning models using various performance metrics and data visualization techniques.
- PSO3: **Ethical and Social Responsibility:** Understanding of the ethical, social, and legal issues associated with the development and deployment of AI and machine learning systems. Ability to work collaboratively in interdisciplinary teams to design and implement AI and machine learning solutions to real-world problems.

EDITORIAL BOARD

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CSE (Artificial Intelligence & Machine Learning)

The department of Artificial Intelligence & Machine Learning has been started in the year 2020 with an of 60 students.. They always strive to provide quality education to the students and work hard to develop the overall personality of the students. The laboratories of the department are well developed with advanced equipment to impart the required practical training to the students. The department also contain huge computer centre with 100 systems and with registered software to impart the computing knowledge to the students. The department maintains a strong links with the infrastructure industry, academic and research institutions at the national level.

The Department of Artificial Intelligence and Machine Learning at VMTW focuses on simulating human intelligence processes using machines, especially computer systems. AI involves developing algorithms for dynamically changing environments.



HOD'S MESSAGE

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Welcome to the Department of CSE(Artificial Intelligence & Machine Learning)

The Department of CSE (Artificial Intelligence & Machine Learning) is committed to academic excellence, research innovation, and outcome-based education aligned with the vision and mission of the institution. In today's rapidly evolving technological landscape, Artificial Intelligence and Machine Learning play a pivotal role in driving digital transformation across industries and society. Our department strives to equip students with the knowledge, skills, and ethical values necessary to meet global challenges and contribute meaningfully to technological advancement.

The curriculum is designed in accordance with Outcome Based Education (OBE) principles, integrating strong foundations in Computer Science with emerging domains such as Data Science, Deep Learning, Computer Vision, Natural Language Processing, Robotics, and Intelligent Systems. Emphasis is placed on experiential learning through laboratory practices, project-based learning, internships, industry collaborations, research initiatives, and participation in technical competitions and innovation activities.

The department promotes a culture of continuous improvement through regular curriculum updates, stakeholder feedback, faculty development programs, research publications, funded projects, and industry interaction. Our dedicated faculty members mentor students not only in academics but also in developing problem-solving abilities, leadership qualities, teamwork, communication skills, and social responsibility.

We encourage students to actively participate in research, innovation, entrepreneurship, and community engagement activities. Our goal is to produce competent professionals who are industry-ready, globally competitive, and committed to lifelong learning and ethical practices.

Let us work together to foster a vibrant academic ecosystem that drives excellence, innovation, and sustainable development through Artificial Intelligence and Machine Learning.

FROM PIONEERS TO VISIONARIES: THE MINDS SHAPING ARTIFICIAL INTELLIGENCE

GREAT QUOTES ABOUT CSE (AI & ML)

Learn Today | Innovate Tomorrow | Lead the Future

"AI is the most transformative technology of our time. It will redefine every industry and create opportunities we can't yet imagine." — Jensen Huang CEO, NVIDIA	"Machine Learning is the core, and it will transform every product we build." — Sundar Pichai CEO, Google	"AI will impact every aspect of our lives. The challenge is to ensure it is used for good." — Fei-Fei Li AI Researcher, Stanford University
"AI is the new electricity." — Andrew Ng AI Pioneer & Co-founder, Coursera	"Machine Learning is a tool, not a magic wand." — Yann LeCun Chief AI Scientist, Meta	"Our mission is to solve intelligence and then use it to solve everything else." — Demis Hassabis CEO, Google DeepMind
"AI is far more powerful than humans in many ways." — Elon Musk CEO, Tesla & SpaceX	"The goal of AI and machine learning is to make better decisions." — Lex Fridman AI Researcher & Podcast Host	"I believe that at the end of the century the use of words and general educated opinion will have altered so much..." — Alan Turing Father of Computer Science & AI Pioneer

CODE. LEARN. THINK. INNOVATE. EMPOWERING INTELLIGENCE, SHAPING THE FUTURE.

ACTIVITIES



1. Healthcare

- Disease diagnosis using medical images
- Cancer detection and prediction
- Drug discovery and personalized treatment
- Virtual health assistants
- Patient monitoring and predictive healthcare

2. Space and Defence

- Satellite image analysis
- Autonomous systems
- Object detection
- Cybersecurity
- Mission planning

3. Education

- Personalized learning systems
- AI tutors and chatbots
- Automated evaluation and grading
- Student performance prediction

AI MEDICINE

AI-Powered Healthcare
Smarter Decisions, Better Outcomes

Medical Image Analysis

Diagnostics

Risk Forecasting

Assistant

Speeding Up Work

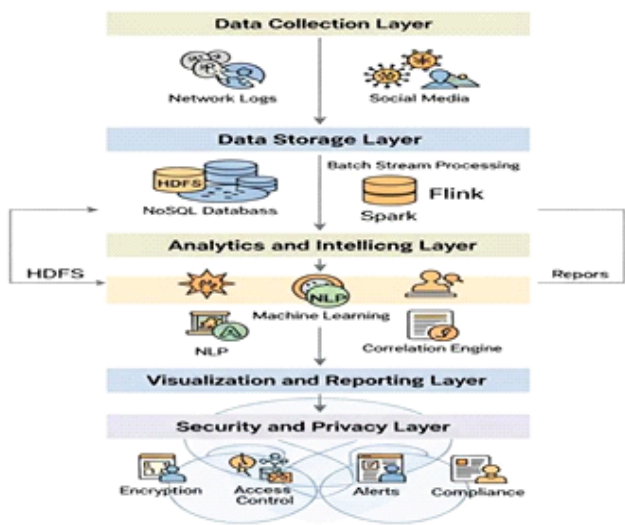
Automating Routine Tasks

1.Faculty Articles On Cyber Crime Analysis Using Big Data Intelligence

By Dr. M. Thejovathi

Abstract:

The rapid growth of cybercrime presents significant challenges to digital security worldwide. Traditional methods of cybercrime detection and analysis often fall short in handling the massive volume, variety, and velocity of data generated in modern networks. This paper explores the application of big data intelligence techniques to enhance cybercrime analysis. Leveraging big data tools and analytics, we propose an integrated framework that enables real-time detection, pattern recognition, and predictive analysis of cyber threats. Our approach combines machine learning algorithms with scalable data processing technologies to provide actionable insights, thereby improving the efficiency and accuracy of cybercrime investigations. The proposed framework is evaluated using real-world datasets, demonstrating its effectiveness in identifying complex cyberattack patterns and supporting proactive cybersecurity measures.

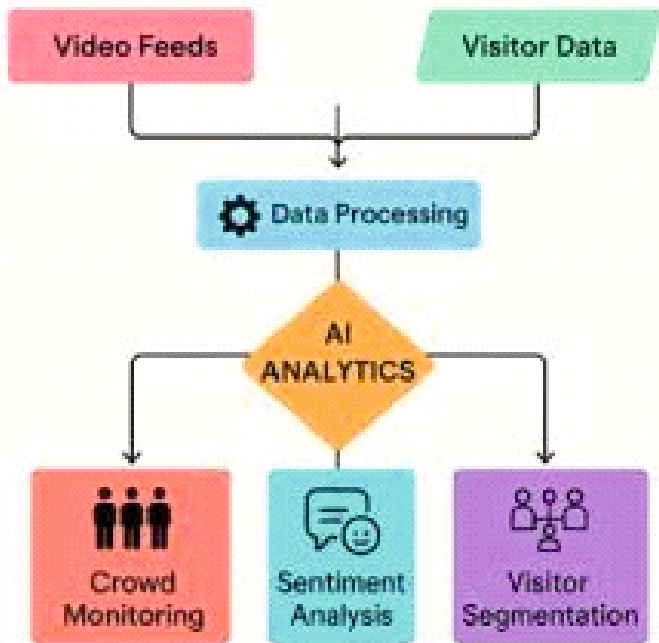


2.Faculty Articles On AI-Driven festival popularity forecasting using social media trends and historical attendance patterns

By A. Rupa

Abstract:

There is a huge involvement of cultural festivals in association with tourism, local economies as well as participatory activities. The accurate forecast of the number of people who will attend the festival and buy tickets allows the organizers to optimize their marketing methods, perceive their resources and improve the impression of a visitor. Conventional forecasting can only be based on past attendance records which may not adapt well to variation in the activity of the people. This research proposed an artificial intelligence (AI)-based forecasting model that combines detailed information about social media buzz and past trends and data about attendance rates to produce successful forecasts of festival popularity. The data collected to be mined in social media (twitter, Instagram, Facebook etc.) include engagement-related statistics, sentiment analysis, and frequency of keywords, whereas ticket selling. and attendance data in the past are processed to extract seasonality and specific event trends. It uses feature fusion and prediction with a multimodal deep learning model that combines Transformer based text encoders and Long Short-Term Memory (LSTM) time-series networks. The model is tested using a dataset over three years in several cultural festivals, where excellent results are recorded over baseline methods in Mean Absolute Error (MAE) and R 2 score. Findings show that the use of real-time trends of social media can enhance the accuracy of predictions by more than 15 per cent compared to those who use only the past data.



DEPARTMENT EVENTS

One-Day Workshop on "The Rise of Agentic AI"

The Department of CSE (AI & ML), under the AIML CODE PRO initiative, organized a One-Day Workshop on "The Rise of Agentic AI" on 17 March 2026. The workshop was attended by 85 students and featured an engaging session by Mr. Joel Jojo, who introduced participants to the emerging field of Agentic AI, autonomous AI agents, their real-world applications, and future trends. The interactive session enhanced students' understanding of next-generation AI technologies and inspired them to explore advanced concepts in artificial intelligence.



PLACEMENT ACHIEVEMENT



VIGNAN'S
INSTITUTE OF MANAGEMENT AND
TECHNOLOGY FOR WOMEN
Kondapur (V), Chaitanya (M), Medchal Dist - 501301

*Building Careers
Inspiring Futures*

PLACEMENTS 2025

Our Students, Our Pride!

Heartfelt Congratulations to our talented students
for their successful placements.

Sl No	Roll No	Name	Company
1	22UP1A6601	Akshitha Jain	1000 CODERS
2	22UP1A6603	A.Shriya	QUBITS
3	22UP1A6606	B.Tanusree	GLOWLOGICS TECHNOLOGY SOLUTIONS
4	22UP1A6608	B.Sahithi	GLOWLOGICS TECHNOLOGY SOLUTIONS

*Your hard work, dedication and perseverance
have paved the way for a bright future!
Wishing you all the best for your future endeavors!*

SAC ACTIVITIES

1. Student Articles On AI And Human Intelligence

By P. SANJANAA , 24UP1A6657

Article OF AI Education: Artificial Intelligence (AI) has become an important part of modern education in 2026. It helps students understand difficult topics through personalized explanations and instant feedback. AI-powered tools can summarize lessons, solve mathematical problems, translate languages, and improve writing skills. Teachers also use AI to prepare lesson plans and evaluate student performance more efficiently. AI saves time by automating routine tasks, allowing students to focus on learning and creativity. However, students should not depend entirely on AI for completing assignments. Excessive use of AI may reduce critical thinking, creativity, and independent problem-solving abilities. AI-generated information should always be verified because it may contain errors or outdated facts. Schools should encourage the responsible and ethical use of AI in classrooms. Students must develop digital literacy to use AI effectively and safely. AI is a valuable learning assistant, but it cannot replace the role of teachers or the importance of human understanding. A balanced approach to using AI can improve educational outcomes while preserving essential learning skills. As AI continues to evolve, it will become an even more significant part of education. Responsible use of AI will help students prepare for the future while maintaining academic integrity.

1. Student Articles On The Future of Artificial Intelligence

By P. MAANANI, 24UP1A66H5

Artificial Intelligence is transforming the way people live, work, and communicate. In 2026, AI is being used in healthcare, transportation, business, agriculture, finance, and scientific research. It helps doctors diagnose diseases, assists businesses in making decisions, and supports researchers in solving complex problems. AI-powered robots and smart devices are making homes and workplaces more efficient. Self-learning systems can analyze large amounts of data quickly and accurately. Despite these advantages, AI also raises concerns about privacy, job automation, and misinformation. Governments and technology companies are working to develop ethical guidelines for responsible AI development. People must learn new skills to work alongside AI rather than compete with it. Creativity, communication, and critical thinking will remain essential human strengths. AI should be designed to benefit society while respecting human values and rights. With proper regulation and responsible innovation, AI has the potential to improve the quality of life for millions of people. The future of AI depends on balancing technological progress with ethical responsibility. Used wisely, AI can become a powerful force for innovation and sustainable development.

National Level First Prize at HackSavvy-26

Gade Sai Kruthi (II-II, CSE AI & ML) receiving recognition after winning the First Prize at the National-Level HackSavvy-26 Hackathon conducted by Mahatma Gandhi Institute of Technology (MGIT), held on 12–13 February 2026.

INNOVATION PROJECTS

Title Modified: SIH-1788 Development & implementation of face reorganization technology for criminal identification & public safety. Criminal identification in rapidly growing urban environments continues to rely heavily on traditional methods such as manual CCTV monitoring, eyewitness testimonies, and time-consuming verification processes, which often lead to delays, inaccuracies, and reduced situational awareness. These limitations have become more evident with increasing urbanization, population density, and the growing sophistication of criminal behavior. The core problem stems from fragmented criminal databases, lack of real-time coordination among agencies, and minimal public participation in reporting mechanisms, creating a substantial gap in proactive crime prevention. To overcome these challenges, this research develops CrimeVision, an AI-powered facial recognition and public safety platform designed to transform static surveillance into an intelligent, automated, and community-inclusive safety system. The proposed system integrates DeepFace with ArcFace facial embeddings, multi-backend detectors such as RetinaFace and MTCNN, and OpenCV preprocessing to ensure high-accuracy face matching from both uploaded images and live camera feeds. Additionally, the system incorporates GPS-based geolocation, interactive map visualization, role-based dashboards, OTP-secured authentication, multilingual interfaces, and real time alert mechanisms for efficient monitoring. Public users can report suspicious activities with images and location details, while police personnel can manage criminal records, validate reports, track incidents on a map, and receive instant detection alerts. By combining AI-driven recognition, geospatial intelligence, and public engagement within a secure and scalable web architecture, CrimeVision significantly enhances identification speed, reduces manual investigation workload, strengthens community–police collaboration, and supports timely law enforcement response. Ultimately, this system offers a cost-effective, accessible, and technologically advanced framework for improving public safety and enabling smarter, data-driven urban policing.

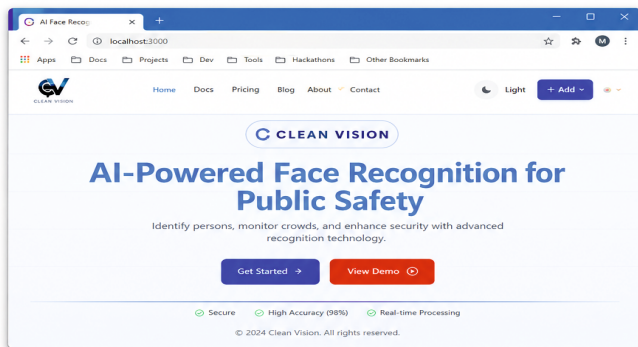


Fig 2: Home Page Interface (Light Mode)

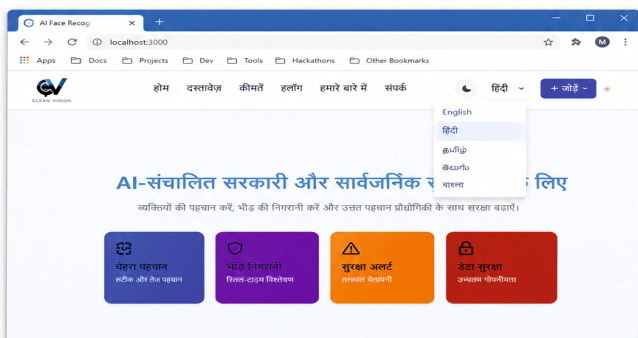


Fig 3: Home Page (Hindi Interface)

Program Outcomes (Adapted from NBA)

Engineering Graduates will be able to:

Engineering knowledge: Apply the knowledge of mathematics, science, engineering fundamentals, and an engineering specialization to the solution of complex engineering problems.

Problem Analysis: Identify, formulate, review research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.

Design/Development of Solutions: Design solutions for complex engineering problems and design system components or processes that meet the specified needs with appropriate consideration for the public health and safety, and the cultural, societal, and environmental considerations.

Conduct Investigations of Complex Problems: Use research-based knowledge and research methods including design of experiments, analysis and interpretation of data, and synthesis of the information to provide valid conclusions.

Modern Tool Usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools including prediction and modeling to complex engineering activities with an understanding of the limitations.

The Engineer and Society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal and cultural issues and the consequent responsibilities relevant to the professional engineering practice.

Environment and Sustainability: Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.

Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.

Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.

Communication: Communicate effectively on complex engineering activities with the engineering community and with society at large, such as, being able to comprehend and write effective reports and design documentation, make effective presentations, and give and receive clear instructions.

Project Management and Finance: Demonstrate knowledge and understanding of the engineering and management principles and apply these to one's own work, as a member and leader in a team, to manage projects and in multidisciplinary environments.

Life-long Learning: Recognize the need for, and have the preparation and ability to engage in independent and life-long learning in the broadest context of technological change.