

JIS College of Engineering

Department of Information Technology

- **Vision of the Department [DV]:**

To create **technical manpower** of **global standards** with capabilities of accepting **new challenges** in the field of Information Technology to **serve the society**.

- **Mission of the Department [DM]:**

The mission of the department is to build and sustain **broad area based high-quality teaching and research** program in Information Technology, to prepare students for **successful professional careers in industry, academia, and entrepreneurship**, and to provide **service to the nation** as a good human being.

Departmental Mission may be looked into by splitting it as follows.

- ✓ **DM1:** Building and sustaining **broad area-based high-quality** teaching to equip students for prosperous professional careers in **industry, academia, and entrepreneurship**.
- ✓ **DM2:** Providing all possible support to promote students in the field of **research and development**.
- ✓ **DM3:** Providing **service to the nation** as a good human being.

- **Program Educational Objectives [PEO]**

- ✓ **PEO1.** Graduates will be engineering practitioners and leaders capable of solving real life technological problems.
- ✓ **PEO2.** Graduates will be engineering professionals, innovators, or entrepreneurs working in technology development, deployment, or engineering system implementation in the industry.
- ✓ **PEO3.** Graduates will perform in their profession with social awareness and responsibility, contributing to the country's economic prosperity.
- ✓ **PEO4.** Graduates will be successful in pursuing higher studies and taking part in research activities.

- **List of Program Outcomes [PO]**

PO	PO Statement
PO1	Engineering knowledge: Apply the knowledge of mathematics science engineering fundamentals and an mathematics, science, engineering fundamentals, and an engineering specialization to the solution of complex engineering problems engineering problems.
PO2	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.
PO3	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.
PO4	Conduct investigations of complex problem: 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.
PO5	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.
PO6	The engineer and society: Apply reasoning informed by Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal and cultural issues and the consequent responsibilities legal and cultural issues and the consequent responsibilities relevant to the professional engineering practice.
PO7	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 and need for sustainable development.
PO8	Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.
PO9	Team work: Function effectively as an individual and as a member or leader in diverse teams and individual, and as a member or leader in diverse teams, and in multidisciplinary settings.
PO10	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, and write effective reports and design documentation, make effective presentations, and give and receive clear.

	instructions.
PO11	Project Management and Finance : Demonstrate knowledge and understanding of the engineering and 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.
PO12	Life-long learning: Recognize the need for and have the Recognize the need for, and have the preparation and ability to engage in independent and lifelong learning in the broadest context of technological change.

- **Program Specific Outcomes [PSO]**

PSO1	Graduates will able to comprehend, exhibit, analyze, and explain the fundamental design and working principle of emerging computing model connected to field of Information Technology.
PSO2	Graduates will able to illustrate and provide optimized solutions by applying the relevant domain knowledge.
PSO3	Graduates will competitively employable, capable of managing projects and resources in a team and competent enough to take on the challenges as an IT professional.
PSO4	Graduates will able to provide technical expertise for driving a predilection for technological innovation, augmented by research and entrepreneurial aptitude for developing qualified professionals capable of making important contributions for nation building.