## PROGRAM EDUCATION OBJECTIVES- PEOs

Build fundamental concepts of Electronics and Communication Engineering to ponder real time social problems and deliver efficient solutions.

Motivate the students to undergo continuous upgradation of knowledge to make them professionally competent in the field of Electronics and Communication Engineering.

Develop the necessary skill set in a graduate engineer to make them employable in the core as well as multidisciplinary companies.

## **PROGRAM OUTCOMES – POs**

PO1.Engineering Knowledge: Apply the knowledge of mathematics, science, engineering fundamentals, and an engineering specialization to the solution of complex engineering problems.

PO2.Problem Analysis: Identify, formulate, review research literature, and analyse 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 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 for complex problems:

PO5.Modern Tool Usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools including prediction and modelling to complex engineering activities with an understanding of the limitations. PO6.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. 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.

PO8.Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.

PO9.Individual and Team Work: Function effectively as an 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, make effective presentations, and give and receive clear instructions.

PO11.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.

PO12.Life-long Learning: 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 – PSOs

Electronics and Communication Engineering students will be able to

Analyze specific engineering problems relevant to Electronics and Communication Engineering by applying the knowledge of core electronics, communication, basic sciences, engineering mathematics and fundamentals.

Design electrical, electronics and communication systems containing

electrical/electronic devices, software and hardware using the significant analytical knowledge in Electronics and Communication Engineering and computer sciences, and applying modern tools.

Apply the contextual knowledge of Electronics and Communication Engineering to assess societal, environmental, health, safety, legal and cultural issues with professional ethics, and function effectively as an individual or a leader in a team to manage different projects in multidisciplinary environments, as the process of life long learning.