

## **RESEARCH AND DEVELOPMENT POLICY**

# PRAGATI ENGINEERING COLLEGE: AUTONOMOUS 1-378, ADB Road Surampalem -533437

#### Preamble

Pragati Engineering College (PEC) is a premier institution of higher education located in Surampalem, East Godavari district of Andhra Pradesh, India. It was established in 2001 with the objective of providing high-quality technical education to students in the region. The college is affiliated with Jawaharlal Nehru Technological University, Kakinada (JNTUK) and is approved by the All India Council for Technical Education (AICTE).

The college offers undergraduate and postgraduate programs in engineering and technology, including Civil Engineering, Electrical and Electronics Engineering, Mechanical Engineering, Electronics and Communication Engineering, Computer Science and Engineering, and Information Technology. All programs are designed to meet the current industry requirements and to prepare students for the challenges of the future.

The college has a well-established infrastructure with state-of-the-art facilities, including modern classrooms, well-equipped laboratories, a library with a vast collection of books and journals, and sports and recreational facilities. The campus is spread over an area of 25 acres and has a beautiful and serene environment conducive to learning.

PEC has a highly qualified and experienced faculty who are dedicated to providing students with quality education and mentoring. They use innovative teaching methods and modern technologies to make learning effective and engaging. The college also encourages faculty to pursue research and innovation, and provides them with the necessary resources and support.

PEC has a strong industry-institute interface, and regularly conducts seminars, workshops, and guest lectures by industry experts to keep students updated on the latest developments in their fields. The college also encourages students to participate in co-curricular and extracurricular activities, including sports, cultural events, and social initiatives, to develop their overall personality and leadership skills.

PEC has a robust placement cell that helps students secure employment in reputed companies. The placement cell provides training and guidance to students on interview skills, resume writing, and communication skills. The college has a track record of excellent placement, and students have been placed in top companies such as TCS, Infosys, IBM, Wipro, and many others.

In addition to academic excellence, PEC also places great emphasis on values such as integrity, social responsibility, and ethical behavior. The college has a strong commitment to community service and encourages students to participate in various social initiatives.

## VISION

To Emerge as a Premier Institution for Technical Education in the Country through Academic Excellence and to be Recognized as a Center for Excellence in Research & Development, catering to the needs of our Country.

## MISSION

To realize a strong Institution by consistently maintaining State-of-art-infrastructure and building a cohesive, World Class Team and provide need based Technical Education, Research and Development through enhanced Industry Interaction.

## **QUALITY POLICY**

We aspire to continuously improve our performance through systematic monitoring and upgradation of all aspects of Teaching – Learning Process and Research & Development.

#### **OBJECTIVES**

<u>To provide quality technical education</u>: Pragati Engineering College's primary objective is to provide its students with high-quality technical education that prepares them to meet the demands of the rapidly changing technological landscape.

**To foster research and innovation:** PEC aims to be a center for research and innovation, promoting scientific and technological advancements that benefit society.

To produce socially responsible engineers: PEC aims to produce socially responsible engineers who are not only technically competent but also conscious of their social and environmental responsibilities.

#### **Research and Development**

The principal constitutes a College Research and Development Committee consisting of the Head of Departments and senior faculty members who shall initiate, promote and monitor the research activities in the College. The principal shall appoint a Dean from among this team. This committee shall meet at regular intervals to review research activities in the college and also to discuss ways to enhance research outcomes in the College. The team shall report to the principal. This policy shall apply to all the faculty, staff and students of the college undertaking research.

#### College creates and promotes a culture of research

- 1. Providing infrastructure through the various research centres in the campus.
- 2. Identifying research areas and assisting faculty to submit proposals to various funding agencies for Major and Minor research grants.
- 3. Ensuring quality and ethics in research.
- 4. Encouraging faculty to apply for recognition as research guides
- 5. Organizing seminars/conferences/workshops on research topics such as research methodologies.
- 6. Sanctioning Seed Money that is allocated between departments.
- 7. Knowledge dissemination initiatives for writing of textbooks, research papers, etc.
- 8. Organizing creative activities resulting in generation of innovative ideas.

#### **Tool for prevention of plagiarism**

The college is using Internet-based plagiarism detection software 'Drillbit plagiarism tool'. All the documents submitted by faculty, students and research Scholars (including thesis, research articles, dissertations, etc) are subjected to a plagiarism check.

#### **Research Policy Implementation Mechanism**

The College Research and Development Committee shall be responsible for implementing the research policy by working closely with the faculty, staff and students.

#### Roles and responsibilities of Research and Development committee

The research & Development committee is responsible to plan research activities, mobilize resources from government and non-government agencies, manage and review R&D projects and initiate collaborative research.

#### **Planning Research Activities:**

- 1. To maintain excellence in research outcomes
- 2. To encourage multidisciplinary research
- 3. To create awareness and promote faculty for publication, research contribution and patent
- 4. To promote faculty to organize and attend conferences
- 5. To announce Incentives for faculty with excellent research outcome
- 6. To acquaint the students about technological innovations
- 7. To motivate students to attend conference and Training

#### Mobilize resources from government and non-government agencies:

- 1. To identify opportunities for externally funded R&D projects
- 2. To apply for funding & submit project proposals
- 3. To follow up with the funding agencies for securing sanction of projects
- 4. To promote faculty to write effective research proposals for funding agencies.
- 5. To plan annual budget towards research

#### Manage and review R&D projects:

- 1. To call for projects for in-house research.
- 2. To scrutinize projects for sanction of SEED money.
- 3. To review sanctioned projects at regular intervals.
- 4. To ensure timely submission of Utilization certificates, Annual progress reports and Expenditure statements.

#### Initiate Collaborative research:

- 1. To develop and maintain close ties with industry
- 2. To promote technical exchange leading to MOUs.

## Institute Initiatives towards promoting research activities

- Paper publication in National/International journals with an Impact factor as first and second author is given Rs 10000/and Rs 5000/ respectively as one time incentive
- Paper publications in International Conferences of Prime Institutions 50% TA and DA, 100% Registration Fees, on Duty and Cash Reward
- Seed Money to the faculty for research and career adavancement
- Deputation of faculty to participate in workshop, seminar and conferences Centers of excellence / Innovative labs / Incubation centers
- Faculties undergoing Part-time higher Education (PhD)– Special incentive of Rs.1000/-per month to faculty who registered for Ph.D and Rs.2000/- per month to faculty who completed Pre-Ph.D)