

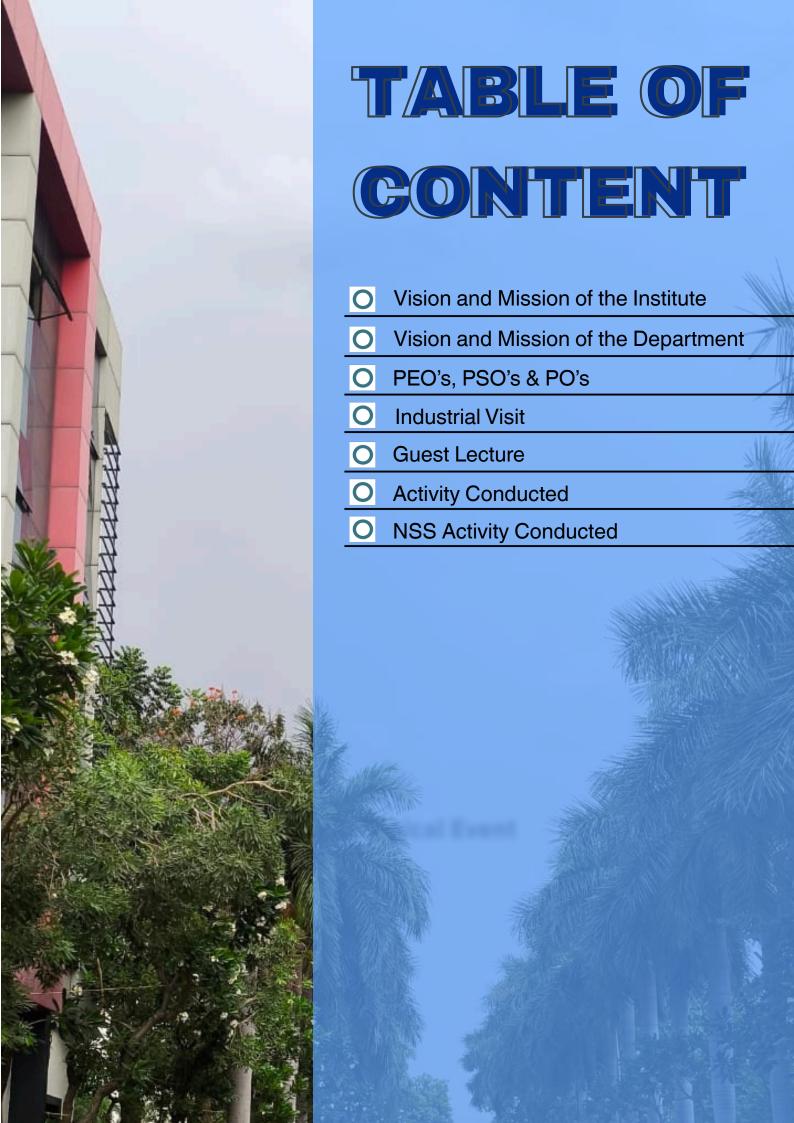
Department of Electrical Engineering

NEWSLETTER

SESSION: 2024-25 (ODD)

SPARK 2K24





Vision of the Institute

To emerge as a learning Center of Excellencein the National Ethis in Diploma in Engineering.

Mission of the Institute

M1: To elevate the standards of students through ethical practices.

M2: To provide facilities and services to meet the challenges of Industry and Community.

M3: To ascertainholistic development of the students and staff members by inculcating knowledge and profession as work practices.

Vision of the Department

To Emerge as a learning Centre in the Domain of Electrical Engineering

Mission of the Department

M1: To impart quality technical education through effective teaching & learning process.

M2: To provide learning environment to face societal and industrial challenges of Electrical Engineering

M3: To ensure overall development of students and staff members by inculcating knowledge and professional ethics as a part of lifelong learning.

About TGPCET

Tulsiramji Gaikwad-Patil College of Engineering and Technology Polytechnic (TGPCET) was established in the year 2013 by Vidarbha Bahu-uddeshiyaShikshan Sanstha (VBSS), a registered society. It is a self-financed Private Engineering College, which is affiliated to Maharashtra State Board of Technical Education Mumbai and is approved by All India Council for Technical Education, New Delhi. Also, college is approved by Directorate of Technical Education (DTE), Mumbai, Maharashtra State.

About Department

The Department of Electrical Engineering provides in depth education & Samp; prepares its students for all the possible future career & developments in technology. Department has a fine blend of experienced as well as young dynamic enthusiastic personalities as faculty for providing quality education. The specious infrastructure, well equipped laboratories, meritorious students and academically qualified and enthusiastic faculty being the salient features of the Department.

HOD's Desk



Mr. Ganesh Wakte
HOD, EE, Polytechnic

Welcome to the Department of Electrical Engineering of TulsiRamji Gaikwad-Patil College of Engineering and Technology, Polytechnic, Nagpur. We started our journey in the year of 2013. Over the last 11 years, we have grown our Expertise & competence in the core Electrical Engineering curriculum. Electrical Engineering department aims to nurture young talents with technical training to tackle real-world challenges. With a blend of experienced faculty, the department focuses on theoretical and practical approaches. The department has well-equipped laboratories and provides opportunities for collaborative growth through its technical society, "TECHNO-SPARK". The goal of this newsletter is to keep you updated with developments in Electrical Engineering Department of TGPCET Polytechnic. This department is continuously undergoing transformation. New initiatives have been launched related to academics, student affairs, extracurricular activities. The students & faculty members of the department are sincerely participating in various activities organized at institute or at other places. It is elevating to see the sound performance of students. I offer best wishes for future activities. At last, I thank to the editors of SPARK for their sincere efforts & I offer my best wishes to the readers of this newsletter.

PEO's, PSO's & PO's

Programs Educational Objectives:

- **PEO 1.** Provide socially responsible, environment friendly solutions to Computer engineering related broad-based problems adapting professional ethics.
- **PEO 2.** Adapt state-of-the-art Computer engineering board-based technologies to work in multi-disciplinary work environments.
- **PEO 3.** Solve broad-based problems individually and as a team member communicating effectively in the world of work

Programs Specific Outcomes:

PSO 1. Computer Software and Hardware Usage:

Use state-of-art technologies for operation and application of computer software and hardware.

PSO 2. Computer Engineering Maintenance:

Maintain computer engineering related software and hardware system.

Programs Outcomes (PO's):

- 1. Basic and Discipline specificknowledge: Apply knowledge of basic mathematics, science and engineering fundamentals and engineering specialization to solve the engineering problems.
- 2. Problem analysis: Identify and analyze well-defined engineering problems using codifiedstandard methods.
- 3. Design/ development of solutions: Design solutions for well-defined technical problems and assist with the design of systems components or processes to meet specified needs.
- 4. Engineering Tools, Experimentation and Testing: Apply modern engineering tools and appropriate technique to conduct standardtests and measurements.
- 5. Engineering practices for society, sustainability and environment: Apply appropriate technology in context of society, sustainability, environment and ethical practices.
- 6. Project Management: Use engineering management principles individually, as a team member or a leader to manage projects and effectively communicate about well-defined engineering activities.
- 7.Life-long learning: Ability to analyze individual needs and engage in updating in the contextof technological changes.

Industrial Visit



Department of **Electrical Engineering** have organized an Industrial visit at Manas Agro Industries and Infrastructure Itd, Bela, Nagpur Maharashtra 440011

Aim: Understand to Manas Agro Industries and Infrastructure Ltd is to gain practical exposure to agro-based industrial processes and their real-world applications.

Department of Electrical Engineering of Tulsiramji Gaikwad Patil College of Engineering & Technology, Polytechnic, Nagpur student visited "Manas Agro industries and Infrastructure Itd, Bela, Nagpur". The Manoj Somwanshi (CO) and Mr. Bhargav Deshpande (Executive Officer) enriched the experience & students gained insights into modern manufacturing practices, industry standards, safety protocols, and sustainability efforts

Guest Lecture



Aim: Expert lecture on "Essence of the Indian Constitution" is to enhance students' understanding of the fundamental principles, values, and significance of the Indian Constitution in shaping the nation.

On 27th September 2024, the Department of Electrical Engineering organized an expert lecture on the "Essence of Indian Constitution" by Mr. Chaitanya Bharat, Founder of Dnyanjyoti Education, Nagpur. The session highlighted key constitutional principles, democratic values, and the importance of informed citizenship.

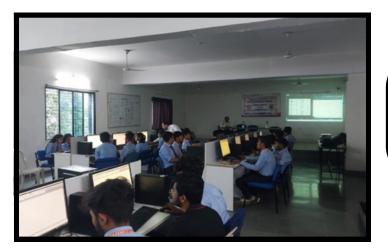


Aim: Expert lecture on "33kV/11kV Substation Equipment and Their Functions" is to provide students with knowledge of substation components, their operation, and their role in efficient power transmission and distribution.

On 5th October 2024, the Department of Electrical Engineering organized an expert lecture on "33/11 KV Substation Equipment and their Functions" by Mr. Praful Shingade, Assistant Engineer, MSDCL Mouda, Nagpur. The session covered key substation equipment, their operation, maintenance, and troubleshooting, enhancing students' technical and analytical skills aligned

Workshop

• Technical workshop at AUTOCAD Software for PCB Designing



Aim: To enhance students' practical skills in PCB designing using AutoCAD software through hands-on training.

On 25th October 2024, the Department of Electrical Engineering, Polytechnic, organized a hands-on workshop on "AUTO CAD Software for PCB Designing" by Mr. Akshay Dhoble, Centre Head. The session focused on PCB design principles, component placement, and routing, providing students with practical experience aligned with PO2, PO3, PO4, PO6, and PO7, enhancing their technical and lifelong learning skills.

• <u>Two days workshop organized in KeC International LTD. Training</u>

<u>Center Nagpur</u>



Aim: To provide students with practical industry exposure and technical training through a two-day workshop at KEC International Ltd. Training Center, Nagpur

KEC International Ltd. Training centre, Butibori, Nagpur, under the ISTE and IE(I), Students Chapter was organized n18-11-2024&19-11-2024. Students got workshop to understanding the company Rules regulations tower testing. The main focus of this 2 day's workshop is to fill the bridge between technical concepts taught in curriculum and industry applied concepts. Various technical concepts were discussed with the students which are applied in the field of electrical engineering.

Activity Conducted

THE DEPARTMENT OF ELECTRICAL ENGINEERING,
POLYTECHNIC, TULSIRAMJI GAIKWAD-PATIL
COLLEGE OF ENGINEERING AND TECHNOLOGY, NA

WALL MAGAZINE ACTIVITY

31ST AUGUST 2024

The activity provided a platform for expressing ideas through writing and design on themes like

- INNOVATIONS IN ELECTRICAL ENGINEERING
- SUSTAINABILITY
- SOCIAL AWARENESS



The Department of Electrical Engineering, Polytechnic, Tulsiramji Gaikwad-Patil College of Engineering and Technology, Nagpur, organized ECO-CRAFTING 2K24 on 31st August 2024. The aim of the event was to raise environmental awareness and promote sustainability by encouraging students to create crafts from recyclable and waste materials. The objective of the event was to foster creativity and innovation through eco-friendly crafting, develop awareness of environmental issues and the importance of recycling. The event was centered around the following themes: Waste to Art: Turning trash into treasure, Reuse of plastic, paper, metal, and electronic waste, Artistic messaging for environmental protection, Creativity as a tool for sustainability.

POLYTECHNIC, TULSIRAMJI GAIKWAD-PATIL COLLEGE OF ENGINEERING AND TECHNOLOGY, NA

WALL MAGAZINE
ACTIVITY

31ST AUGUST 2024

The activity provided a platform for expressing ideas through writing and design on themes like

INNOVATIONS IN ELECTRICAL ENGINEERING

SUSTAINABILITY

SOCIAL AWARENESS

SCIENTIFIC DEVELOPMENTS

SCIENTIFIC

THE DEPARTMENT OF ELECTRICAL ENGINEERING

The Department of Electrical Engineering, Polytechnic, Tulsiramji Gaikwad-Patil College of Engineering and Technology, organized a Wall Magazine Activity on 31st August 2024. The aim of the activity was to provide a space for students to express their creativity, opinions, and technical knowledge in a visually engaging format. The objective of the activity was to encourage expression of ideas through writing, drawing, and designing and to foster teamwork and collaboration through contributions.Students contributed group content based on the themes like: Recent **Innovations** in **Electrical** Engineering, Sustainability and Green Technology, Social Awareness and Youth Responsibilities, National and International Scientific Developments.

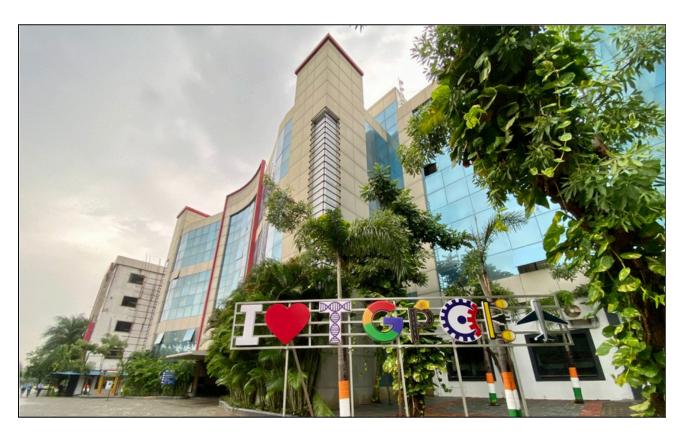
NSS Activity Conducted

SANVIDHAN DIWAS





The National Service Scheme (NSS) Unit of TGPCET, in association with IEI, ISTE, and PHOENIX, organized the Sanvidhan Diwas (Constitution Day) celebration on 26th November, 2024 at 2:30 PM in the A.P.J. Abdul Kalam Hall. The event emphasized the importance of national integration, social harmony, and constitutional values, reinforcing a commitment to unity and integrity among students and staff. The aim of celebrating Samvidhan Diwas (Constitution Day) under the National Service Scheme (NSS) is to raise awareness among students and the general public about the importance of the Indian Constitution and to promote values such as democracy, justice, equality, and fraternity. The objective of the program is to promote Constitutional Awareness and Installing Patriotism and National Pride.



Courses we Offer:

- Computer Science & Engineering
- Information Technology
- Civil Engineering
- Mechanical Engineering
- Electrical Engineering
- Electronics & Communication







Tulsiramji Gaikwad-Patil College of Engineering and Technology. Mohagaon, Wardha Road, Nagpur, 441108 Maharashtra, INDIA.



www.tgpcetpoly.com