### **Basic Electrical Engineering Laboratory (21ELE17/27)**

#### Course outcomes

CO1: Verify KCL, KVL, and maximum power transfer theorem (MPTT) and analyze the effects of open and short circuits in DC circuits.

CO2: Compare power factors of different types of lamps, measurement of R & L in a choke coil (3-voltmeter-method) & analyze two-way and three-way control of lamps using single phase AC supply.

CO3: Demonstrate the measurement of the impedance of an electrical circuit and power consumed by a 3-phase load.

CO4: Determination of efficiency of a single-phase transformer by direct load test.

CO5: Interpret the suitability of earth resistance measured.

## **BASIC ELECTRICAL ENGINEERING (21ELE13/23)**

### Course outcomes

- 1) CO1: Analyses basic DC and AC electric circuits.
- 2) CO2: Explain the working principles of transformers and electrical machines.

3) CO3: Explain the concepts of electric power transmission and distribution of power.

4) CO4: Understand the wiring methods, electricity billing, and working principles of circuit protective devices and personal safety measures

# **Basic Electrical Engineering Lab**

The Basic Electrical Engineering Lab is fully equipped with workbenches to carryout various fundamental experiments which focuses on Basic Electrical Engineering for better understanding. The lab is equipped with both AC and DC power supply with proper protection which supports the students to perform the experiment in the safe environment. The experiments are designed in order to make the students towards the practical execution of the theory content studied in the subject in line with real time application.





