

DIPLOMA EXAMINATION IN ENGINEERING/TECHNOLOGY/  
MANAGEMENT/COMMERCIAL PRACTICE — OCTOBER, 2018

**BASIC ELECTRONICS**

[Time : 3 hours

(Maximum marks : 100)

**PART — A**

(Maximum marks : 10)

Marks

I Answer *all* questions in one or two sentences. Each question carries 2 marks.

1. Name two specifications of capacitors.
2. Give any two applications of transformer.
3. Define Potential barrier.
4. Draw the wave form of Half Wave Rectifier.
5. Draw the physical structure of BJT.

(5×2 = 10)

**PART — B**

(Maximum marks : 30)

II Answer any *five* of the following questions. Each question carries 6 marks.

1. Colour band sequence on a resistor is yellow, violet and red. What is the resistance value ? Define resistor and draw its symbol.
2. Explain the majority and minority carriers in P and N type materials.
3. Explain the working of diode as a switch.
4. Draw and explain the working of negative clipper.
5. Draw and explain the working of half wave voltage doubler.
6. Briefly explain the input characteristics of CB configuration.
7. Briefly explain the input characteristics of CE configuration.

(5×6 = 30)