



VIT

Vellore Institute of Technology

# Final Assessment Test - June 2023

Course: BEEE102L - Basic Electrical and Electronics Engineering

Class NBR(s) : 0371/ 0390/ 0420

Time: Three Hours

Slot: B1+TB1

Max. Marks: 100

KEEPING MOBILE PHONE/SMART WATCH, EVEN IN 'OFF' POSITION IS TREATED AS EXAM MALPRACTICE  
General Instructions: Always maintain an accuracy of at least 3 decimal digits.

Answer any **TEN** Questions  
(10 X 10 = 100 Marks)

1. Determine the following for the circuit depicted in Fig. 1.

- (a)  $I_{3\Omega}$  (b)  $I_{2\Omega}$  (c)  $I_{1\Omega}$  (d)  $I_{0.1\Omega}$  (e) Power supplied by the 11A current source.  
(Answers for the currents must conform to the directions of the arrows shown in Fig. 1).

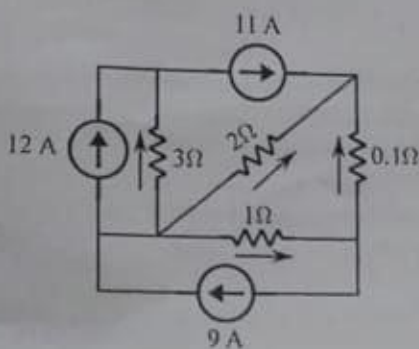


Fig. 1

2. a) Calculate the resistance between the terminals 'a' and 'b' as shown in Fig. 2(a). [4]

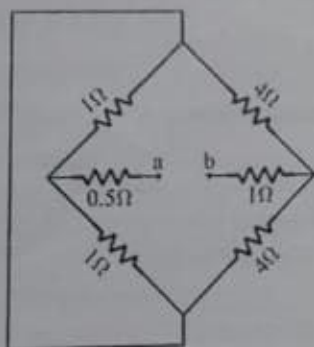


Fig. 2(a)