Assignment 6

The due date for submitting this assignment has passed.

Ask our mentors if you have any questions about this assignment.

Choose correct options. More than one choice could be correct. Each question carries 2 marks.

1. Which statement is correct?
   - A: All statements are correct.
   - B: None of the statements are correct.
   - C: Only statement C is correct.
   - D: Only statement D is correct.
   - E: Only statement E is correct.

2. The flowchart shows...
   - A: A series circuit.
   - B: A parallel circuit.
   - C: Both series and parallel circuits.
   - D: Neither series nor parallel circuits.
   - E: None of the above.

3. A circuit diagram should...
   - A: Be correctly connected to power sources.
   - B: Include all components in series.
   - C: Include all components in parallel.
   - D: Be correctly connected to load devices.
   - E: None of the above.

4. A voltage source is...
   - A: A device that provides a constant voltage.
   - B: A device that provides a constant current.
   - C: A device that provides both voltage and current.
   - D: A device that provides only voltage.
   - E: A device that provides only current.

5. A resistor in a circuit is used...
   - A: To increase the current flow.
   - B: To decrease the current flow.
   - C: To increase the voltage across the resistor.
   - D: To decrease the voltage across the resistor.
   - E: To change the frequency of the circuit.

6. A capacitor in a circuit is used...
   - A: To store energy.
   - B: To block direct current.
   - C: To pass alternating current.
   - D: To block alternating current.
   - E: To change the phase of the signal.

7. A diode in a circuit is used...
   - A: To allow current to flow in one direction only.
   - B: To block current in both directions.
   - C: To pass current in both directions.
   - D: To convert direct current to alternating current.
   - E: To convert alternating current to direct current.

8. A transformer in a circuit is used...
   - A: To increase or decrease voltage.
   - B: To increase or decrease current.
   - C: To change the frequency of the signal.
   - D: To change the phase of the signal.
   - E: To convert direct current to alternating current.

9. A filter in a circuit is used...
   - A: To block high-frequency signals.
   - B: To block low-frequency signals.
   - C: To pass both high and low-frequency signals.
   - D: To pass only direct current.
   - E: To pass only alternating current.

10. A power meter in a circuit is used...
    - A: To measure the power being used.
    - B: To measure the voltage in the circuit.
    - C: To measure the current in the circuit.
    - D: To measure the resistance of the circuit.
    - E: To measure the frequency of the circuit.