

Student: Sanket bhushan kamble

Score: 21/30 (70.00%)

Code: 4674

1. Which machine converts mechanical energy into electrical energy?

- A) Battery (Incorrect) **B) Generator**
 C) Heater D) Iron box

2. Which is the unit of current?

- A) Ampere** B) Volt
 C) Ohm D) Watt (Incorrect)

3. Which is the unit of resistance?

- A) Ampere B) Volt
C) Ohm (Correct) D) Watt

4. What is the flow of electrons in any conductor?

- A) Voltage **B) Current (Correct)**
 C) Resistance D) Power

5. Which property of a substance is opposing the flow of electric current?

- A) Current B) Voltage
C) Resistance (Correct) D) EMF

6. Which is very good conductor?

- A) Copper (Correct)** B) Cast iron
 C) Wrought iron D) Steel

7. Which is mineral insulator

- A) Glass B) Quartz
C) Mica D) Porcelain (Incorrect)

8. What is the total resistance if three resistances of 3 ohms, 9 ohms and 5 ohms are connected in series?

- A) 11 ohms B) 7 ohm
C) 17 ohms (Correct) D) 1/17 ohms

9. What is the total resistance if two resistances of 4 ohms and 6 ohms are connected in parallel?

- A) 10 **B) 2.4 (Correct)**
 C) 5 D) 4

10. Which is same in series connection of resistors in a circuit?

- A) Current** B) Voltage (Incorrect)

- C) Resistance D) Power

11. Which law states that at constant temperature the current passing through a closed circuit is directly proportional to the potential difference and inversely proportional to the resistance?

- A) Ohm's law (Correct)** B) Lenz's law
 C) Newton's law D) Hooke's law

12. What is the resistance?

-

 $I = 11.5 \text{ Amps}$

 $V = 380 \text{ Volts}$

 $R = \text{_____ Ohms}$
 A) 13 ohms B) 23 ohms
C) 33 ohms (Correct) D) 43 ohms

13. What is the current?

-

 $R = 50 \text{ Ohms}$

 220 Volts

 $I = \text{_____ Amps}$
 A) 4.1 Amps B) 4.2 Amps
 C) 4.3 Amps **D) 4.4 Amps (Correct)**

14. What is the voltage?

-

 $R = 250 \text{ Ohms}$

 $I = 0.44 \text{ Amps}$

 $V = \text{_____ Volts}$
 A) 100 Volts B) 105 Volts
 C) 108 Volts **D) 110 Volts (Correct)**

15. Which statement is correct according to ohm's law?

- A) $I = 1/V$ B) $I = R$
C) $I = V/R$ (Correct) D) $I = R/V$

16. What is the filament resistance if a 6 volt bulb draws a current of 0.5 Amps?

- A) 12 W (Correct)** B) 10 W
 C) 3 W D) 1.2 W

17. How much watt second in 1 watt hour?

- A) 1000 watt sec B) 2000 watt sec
C) 3600 watt sec (Correct) D) 4000 watt sec

18. What is the power if an emf of one volt causes a current flow of 1 ampere?

- A) 1 watt** B) 1 kilowatt
C) 1 HP (Incorrect) D) 1 Kilowatt hour

19. Which is equal to electric power?

- A) $R^2 I$ watts **B) $I^2 R$ watts (Correct)**
C) RI D) IRA

20. How much power does it consumes if an electric heater draws a current of 10 amps at 200 volts?

- A) 2000 watts (Correct)** B) 2010 watts
C) 2020 watts D) 2030 watts

21. What is the resistance of an electric iron if the rating of electric iron is 220 V and 500 watts?

- A) 94.8 ohms B) 95.8 ohms
C) 96.8 ohms (Correct) D) 97.8 ohms

22. What is the voltage of the immersion heater?

$P = 500$ watts

$I = 2.27$ Amps

$V = \underline{\hspace{2cm}}$ Volts

- A) 200.3 volts B) 210.3 volts
C) 220.3 volts (Correct) D) 230.3 volts

23. What is the unit of intensity of magnetic field?

- A) wb/m** B) m/wb
C) Hertz D) Coloumb (Incorrect)

24. Which law states about electromagnetic induction?

- A) Ohm's law B) Hooke's law
C) Lenz's law **D) Faraday's law (Correct)**

25. What is the formual for induced emf?

- A) $B^2 L \sin \theta$ volts B) $BL \sin \theta$ volts (Incorrect)
C) $BLV \sin \theta$ volts D) $B^2 V \sin \theta$ volts

26. What does EMF stands for?

- A) Electronic Magnetic Force (Incorrect) **B) Electro Motive Force**
C) Electro Magnetic Force D) Electromated Force

27. Which is the example for statically induced emf?

- A) Generator B) Motor
C) Transformer (Correct) D) Refrigerator

28. Which is the example for dynamically induced Emf?

- A) Motor **B) Generator (Correct)**
C) Car D) Motor bike

29. Which is the unit electrical power?

- A) Volts B) Ohms
C) Watts (Correct) D) Ampere

30. What is the current Flow in the bulb?

$P = 550$ watts

$R = 22$ Ohms

$I = \underline{\hspace{2cm}}$ Amps

- A) 2 Amps (Incorrect) B) 3 Amps
C) 4 Amps **D) 5 Amps**