

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

- A) Resistance
- B) Power
- C) Current
- D) Voltage

Answer: C) Current

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

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

Answer: C) 1 watt

18. What is the name of the metal which do not contain iron?

- A) Insulating metals
- B) Non-ferrous metals
- C) Non-Insulating metals
- D) Ferrous metals

Answer: B) Non-ferrous metals

19. How much watt second in 1 watt hour?

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

Answer: B) 3600 watt sec

20. What is the rated power if an adjustable resistor bears the following label 1.5 k ohms/ 0.08A?

- A) 9.6 watts
- B) 9.4 watts
- C) 9.8 watts
- D) 9.2 watts

Answer: A) 9.6 watts

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

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

Answer: A) 96.8 ohms

22. Which is equal to electric power?

- A) RI
- B) IRA
- C) R^2I watts
- D) I^2R watts

Answer: D) I^2R watts

23. What is called the ratio between the density of a substances density of water at 4 Degree Centigrade?

- A) Specific gravity
- B) Mass
- C) Density
- D) Weight

Answer: A) Specific gravity

24. What does EMF stands for?

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

Answer: B) Electro Motive Force

25. Which metal contains iron as a major content?

- A) Zinc
- B) Ferrous metal
- C) Bronze metal
- D) Brass metal

Answer: B) Ferrous metal

26. Which is mineral insulator

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

Answer: A) Mica

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

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

Answer: A) Resistance

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

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

Answer: B) 17 ohms

29. What is the density of aluminium?

- A) 2.7 g/cm^3
- B) 5.7 g/cm^3
- C) 4.7 g/cm^3
- D) 3.7 g/cm^3

Answer: A) 2.7 g/cm^3

30. Which one is non-metal?

- A) Graphite
- B) Brass
- C) Iron
- D) Mercury

Answer: A) Graphite

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

- A) Coloumb
- B) m/wb
- C) Hertz
- D) wb/m

Answer: D) wb/m

32. What is the volume (V) of mercury in cm^3 , if mass (m) of mercury is 1 kg and density (r) is 13.6 g/cm^3 ?

- A) 73.23 cm^3
- B) 73.53 cm^3
- C) 73.33 cm^3
- D) 73.43 cm^3

Answer: B) 73.53 cm^3

33. Which cast iron cannot be welded?

- A) Malleable cast iron
- B) Grey cast iron
- C) White cast iron
- D) Nodular cast iron

Answer: C) White cast iron

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

- A) 10 W
- B) 12 W

C) 1.2 W

D) 3 W

Answer: B) 12 W

35. What is the mass if the density of a body is 7.6 g/cm^3 and its volume is 25 cm^3 ?

A) 200 grams

B) 220 grams

C) 190 grams

D) 210 grams

Answer: C) 190 grams

36. How much voltage will be required to illuminate a 40 watts fluorescent lamp draws a current of 0.10 amperes?

A) 395 volts

B) 390 volts

C) 400 volts

D) 405 volts

Answer: C) 400 volts

37. Which is very good conductor?

A) Copper

B) Cast iron

C) Steel

D) Wrought iron

Answer: A) Copper

38. What is the specific gravity of the solid, if density of the solid is 19.5 g/cm^3 ?

A) 19.5

B) 18.5

C) 19

D) 8

Answer: A) 19.5

39. What is the force with which a body is attracted by the earth towards its centre?

A) Weight

B) Mass

C) Volume

D) Density

Answer: A) Weight

40. What is the power required? $I = 0.455 \text{ Amps}$ $R = 484 \text{ Ohms}$ $P = \text{___ Watts}$

A) 98.2 watts

B) 99.2 watts

C) 101.2 watts

D) 100.2 watts

Answer: D) 100.2 watts

41. What is called mass per unit volume of a substances?

A) Weight

B) Density

C) Volume

D) Mass

Answer: B) Density

42. How many hours will take for a 100 watts bulb to consume 1 kwh energy? $W = 1 \text{ Kwh}$ $P = 100 \text{ Watts}$ $t = \text{___ Hours}$

A) 10 hours

B) 12 hours

C) 18 hours

D) 24 hours

Answer: A) 10 hours

43. Which furnace is used to get pig iron from iron ore?

A) Blast furnace

B) Electric furnace

C) Mild steel - Rever battery

D) Cupola

Answer: A) Blast furnace

44. What is the specific gravity of the metal, if the weighs 6.5 kgf in air and 3.5 kgf in water?

A) 1.166

B) 3.166

C) 2.166

D) 6.166

Answer: C) 2.166

45. Which is the unit of resistance?

A) Watt

B) Ampere

C) Ohm

D) Volt

Answer: C) Ohm

46. Which property of material enables to formation of permanent deformation without fracture?

A) Ductility

B) Elasticity

C) Plasticity

D) Brittleness

Answer: C) Plasticity

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

A) Current

B) Power

C) Resistance

D) Voltage

Answer: A) Current

48. Which is the unit of current?

A) Ohm

B) Watt

C) Ampere

D) Volt

Answer: C) Ampere

49. What is the other name of low carbon steel?

A) Mild steel

B) High speed steel

C) Low alloy steel

D) High alloy steel

Answer: A) Mild steel

50. What is the current Flow in the bulb? $P = 550 \text{ watts}$ $R = 22 \text{ Ohms}$ $I = \text{___ Amps}$

A) 2 Amps

B) 3 Amps

C) 5 Amps

D) 4 Amps

Answer: C) 5 Amps

51. What is the voltage of the immersion heater? $P = 500 \text{ watts}$ $I = 2.27 \text{ Amps}$ $V = \text{___ Volts}$

A) 220.3 volts

B) 230.3 volts

C) 200.3 volts

D) 210.3 volts

Answer: A) 220.3 volts

52. Which alloy used in electric lamp as filament?

- A) Tungsten B) Cobalt
C) Vanadium D) Silicon

Answer: A) Tungsten

53. What is the volume of mercury in cm³, if the mass (m) of mercury is 136 grams (g) and density (r) of mercury is 13.6 g/cm³?

- A) 136 cm³ B) 10.0 cm³
C) 13.6 cm³ D) 10.6 cm³

Answer: B) 10.0 cm³

54. Which metal cannot be forged?

- A) Alloy steel B) Cast iron
C) Steel D) Mild steel

Answer: B) Cast iron

55. Which property of a metal possessed by it melts when heat is applied?

- A) Conductivity B) Fusibility
C) Tenacity D) Malleability

Answer: B) Fusibility

56. Which machine converts mechanical energy into electrical energy?

- A) Battery B) Iron box
C) Generator D) Heater

Answer: C) Generator

57. 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 B) Hooke's law
C) Lenz's law D) Newton's law

Answer: A) Ohm's law

58. What is the voltage? $R = 250 \text{ Ohms}$ $I = 0.44 \text{ Amps}$ $V = \text{___Volts}$

- A) 110 Volts B) 100 Volts
C) 108 Volts D) 105 Volts

Answer: A) 110 Volts

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

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

Answer: C) $I = V/R$

60. Which is the unit electrical power?

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

Answer: D) Watts

61. What is the resistance? $I = 11.5 \text{ Amps}$ $V = 380 \text{ Volts}$ $R = \text{___Ohms}$

- A) 33 ohms B) 43 ohms
C) 13 ohms D) 23 ohms

Answer: A) 33 ohms

62. What is the name of furnace to obtained cast iron?

- A) Alloy metal - Electric furnace B) Cupola
C) Mild steel - Blast furnace D) Steel - Rever battery

Answer: B) Cupola

63. What is the formual for induced emf?

- A) $BLV \sin \omega t$ volts B) $BL \sin \omega t$ volts
C) $B^2 L \sin \omega t$ volts D) $B^2 V \sin \omega t$ volts

Answer: A) $BLV \sin \omega t$ volts

64. What is the specific gravity of the metal, if the piece of metal weighs 150 grams in air and 125 grams in water?

- A) 10 B) 15
C) 6 D) 25

Answer: C) 6

65. What is the density (r) in g/cm³ of an iron cube, if it weighs (W) 4.8 kg and volume (V) is 640 cm³?

- A) 6.6 g/cm³ B) 6.9 g/cm³
C) 7.2 g/cm³ D) 7.5 g/cm³

Answer: D) 7.5 g/cm³

66. What is the current? $R = 50 \text{ Ohms}$ $V = 220 \text{ Volts}$ $I = \text{___Amps}$

- A) 4.2 Amps B) 4.1 Amps
C) 4.3 Amps D) 4.4 Amps

Answer: D) 4.4 Amps