

Duration: 30 Mins**Total Marks: 40****Q.ID: ITISKILL9406VY**

1. What are the active components used in electronic circuits?

- A) Semi conductors and transformers
B) Transistors, diodes and SCRs
C) Transformers and inductors
D) Resistors, capacitors and inductors

Answer: B) Transistors, diodes and SCRs

2. Which semiconductor material is used to make diodes?

- A) Aluminium
B) Copper
C) Steel
D) Silicon

Answer: D) Silicon

3. Which winding has more inductance in refrigerator compressor motor?

- A) Run
B) Start and common
C) Common
D) Start

Answer: A) Run

4. What is the equivalent of one microfarad in farad?

- A) 10-12 farad
B) 10-9 farad
C) 10-3 farad
D) 10-6 farad

Answer: B) 10-9 farad

5. What is the name of electronic circuit?

- A) Quarter wave rectifier
B) Bridge rectifier
C) Full wave rectifier
D) Half wave rectifier

Answer: B) Bridge rectifier

6. Which tool is used for skinning the insulation of cables and cleaning the wire surface?

- A) Firmer chisel
B) Electrician's knife
C) Combination pliers
D) Hacksaw

Answer: B) Electrician's knife

7. Which material is used for making zener diode?

- A) Silicon
B) Platinum
C) Titanium
D) Lead

Answer: A) Silicon

8. Which application uses the digital ICs?

- A) Voltage regulator
B) Amplifier
C) Logic gates
D) Tuned circuits

Answer: C) Logic gates

9. Which meter indicates the true power directly in an electrical circuit?

- A) Watt meter
B) Volt meter
C) Ammeter
D) Ohm meter

Answer: A) Watt meter

10. Which material is used to avoid oxidation between aluminium conductor and the terminal?

- A) Petrol
B) Kerosene
C) Shellac
D) Grease

Answer: D) Grease

11. How many diodes are required for making a bridge rectifier circuit?

- A) Two
B) Four
C) Three
D) One

Answer: B) Four

12. Which winding has low resistance in resistance start induction run motor?

- A) Common winding
B) Running winding
C) Auxiliary winding
D) Starting winding

Answer: B) Running winding

13. What is the supply voltage if a current of 2 ampere flows through 10 Ohm resistor in a circuit?

- A) 65 Volt
B) 55 Volt
C) 45 Volt
D) 20 Volt

Answer: D) 20 Volt

14. What is the effect of pouring water on electrodes resistance in earth pit?

- A) Remains same
B) Increases
C) Equalises
D) Decreases

Answer: D) Decreases

15. Which joint is made in either single or multi - strand conductors?

- A) Britannia joint
B) Western union joint
C) Rat tail joint
D) Scarfed joint

Answer: C) Rat tail joint

16. What is the unit of inductance?

- A) Henry
C) Ohm
- B) Ampere
D) Farad

Answer: A) Henry

17. How many terminals are there in a Silicon Controlled Rectifier (SCR)?

- A) One
C) Two
- B) Four
D) Three

Answer: D) Three

18. What is the name of active component used in electronic circuit?

- A) TRIAC
C) Transistor
- B) SCR
D) DIAC

Answer: C) Transistor

19. Which material is used for making disc in energy meter?

- A) Zinc
C) Aluminium
- B) Brass
D) Copper

Answer: C) Aluminium

20. How electrons flow in a battery circuit?

- A) Phase to earth
C) Negative polarity to positive polarity
- B) Positive to negative polarity
D) Phase to neutral

Answer: C) Negative polarity to positive polarity

21. What is the unit of capacitance used with single phase induction motors in domestic RAC system?

- A) Milli henry
C) Kilo ohm
- B) Milli ampere
D) Microfarad

Answer: D) Microfarad

22. How the ability of a conductor is called if it induces the voltage in the same conductor?

- A) Capacitance
C) Conductance
- B) Self inductance
D) Resistance

Answer: B) Self inductance

23. How the maximum reverse voltage across the diode is termed in reverse biased condition?

- A) Ripple frequency
C) Peak rectification voltage
- B) Diode voltage
D) Peak inverse voltage

Answer: D) Peak inverse voltage

24. Which electronic component is the voltage regulator?

- A) Triac
C) Transistor
- B) Zener diode
D) Diac

Answer: B) Zener diode

25. Which is the common terminal while Ohm meter reads $AB = 10 \text{ Ohm}$, $AC = 15 \text{ Ohm}$ and $BC = 25 \text{ Ohm}$ if the motor terminals are A, B and C?

- A) Terminal A
C) Terminal C
- B) Earth Terminal
D) Terminal B

Answer: A) Terminal A

26. Which type of diode is used for communication circuits?

- A) Signal diode
C) Switching diode
- B) Rectifier diode
D) Zener diode

Answer: A) Signal diode

27. Which property limits the flow of electrons in an electrical circuit?

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

Answer: C) Voltage

28. What are the passive components used in electronic circuits?

- A) Semi conductors and transistors
C) Transformers and semiconductors
- B) Resistors, capacitors and inductors
D) Transistors, diodes and SCRs

Answer: B) Resistors, capacitors and inductors

29. Which law relates to voltage, current and resistance in an electrical circuit?

- A) Faraday s law
C) Ohm s law
- B) Newton s law
D) Lenz s law

Answer: C) Ohm s law

30. What is the maximum capacity of 3 phase squirrel cage induction motor used with direct on line (DOL) starter?

- A) 10 HP
C) 15 HP
- B) 5 HP
D) 20 HP

Answer: B) 5 HP

31. What is the unit of electric current?

- A) Volt
C) Ohm
- B) Farad
D) Ampere

Answer: D) Ampere

32. What is the load resistance in an electrical circuit, if current, $I = 2 \text{ amp}$ and supply, $V = 10 \text{ volt}$?

- A) 4 Ohms
C) 2 Ohms
- B) 3 Ohms
D) 5 Ohms

Answer: D) 5 Ohms

33. Which device maintains a constant DC output?

- A) Rectifier circuits
B) Current limiters

C) Load regulators D) Voltage regulators

Answer: D) Voltage regulators

34. What is the unit of electrical energy?

- A) Volt B) Ampere
C) Watt D) Kilo watt hour

Answer: C) Watt

35. Which material is used for making ICs?

- A) Carbon B) Silicon
C) Platinum D) Mild steel

Answer: B) Silicon

36. What is the condition of compressor motor if Ohm meter reads infinity across common and start terminals?

- A) Running winding shorted B) Starting winding open
C) Running winding open D) Starting winding shorted

Answer: B) Starting winding open

37. What is the reverse break down voltage range of zener diode?

A) 0.1 to 0.5 volt

B) 1 to 3 volt

C) 3 to 18 volt

D) 0.5 to 1 volt

Answer: C) 3 to 18 volt

38. Which type of conductor is used for bus bars?

- A) Standard conductor B) Solid conductor
C) Thermal conductor D) Stranded conductor

Answer: D) Stranded conductor

39. Which component is used as a switching device in electronic circuit?

- A) SCR B) Diode
C) Capacitor D) Zener diode

Answer: A) SCR

40. What is the total resistance if two resistors R1 and R2 are connected in series?

- A) $(R1 - R2)$ Ohms B) $(R1 \times R2)$ Ohms
C) $(R1 / R2)$ Ohms D) $(R1 + R2)$ Ohms

Answer: D) $(R1 + R2)$ Ohms
