

MCQ TEST in Ch.6 – ELECTROLYSIS

1. Substances which conduct electric current without decomposing

- a) Ionic compounds ~~b) Metallic conductors~~ c) Insulators d) Non – Polar Solvents

2. Substances which don't conduct electric current

- a) Conductors ~~b) Insulators~~ c) Covalent Compounds d) None of these

3. Degree of dissociation is represented by the letter

- ~~a) α (alpha)~~ b) β Beta c) γ (Gamma) d) δ (Delta)

4. Chemical compounds having high melting point

- a) Covalent Compounds ~~b) Ionic Compounds~~
c) Acidic Compounds d) Basic Compounds

5. The force of attraction in ionic compounds

- ~~a) Electrostatic force~~ b) Hydrogen Bonds c) Metallic Bonds d) Covalent Bonds

6. Electrode where oxidation takes place

- a) Cathode ~~b) Anode~~ c) Bridge d) None of these

7. Identify the weak electrolyte from the following:

- a) Sodium Chloride solution b) Dilute Hydrochloric acid
c) Dilute Sulphuric acid ~~d) Aqueous acetic acid~~

8. Electrodes connected to the negative pole of the battery

- ~~a) Cathode~~ b) Anode c) Bridge d) None of these

9. Process of separation of ions of an ionic solid in solution

- a) Electrolytic association b) Electrolytic refining
~~c) Electrolytic dissociation~~ d) Spontaneous reaction

10. The process by which a polar covalent compound is converted into ions in aqueous solution

- a) Condensation ~~b) Ionisation~~ c) Sublimation d) Precipitation

11. The electrolyte used for electroplating an article with silver is :

- a) silver nitrate solution b) silver cyanide solution
~~c) sodium argentocyanide solution~~ d) nickel sulphate solution

12. Electrodes that do not take part in electrolytic, reactions are known aselectrodes

- a) electric b) conducting c) insulating ~~d) inert~~

13. Electrodes made of copper, nickel, silver are known as Electrodes

- a) inert b) passive ~~c) active~~ d) none of these

14. Electrolytic cell used for electrolysis of water is known as

- a) Ammeter b) Galvanometer c) Voltmeter ~~d) Voltmeter~~

15. gas is liberated at anode during electrolysis of water

- a) Hydrogen ~~b) Oxygen~~ c) Ammonia d) Carbon - dioxide

16. The ions which migrates towards an electrode but remains unaffected are known as

- a) Cations b) Anions c) Inhibitors ~~d) Spectator ions~~

17. The ions which gets deposited have Reduction potential

- a) low ~~b) high~~ c) moderate d) zero

18. Electrode at which reduction takes place is known as

- ~~a) Cathode~~ b) Anode c) Bridge d) None of these

19. The frequency of alternating current

- ~~a) 20 cycles/sec~~ b) 50 cycles/sec c) 100 cycles/sec d) 150 cycles/sec

20. Electrodes are used during electrolysis of acidulated water

- a) Iron ~~b) Platinum~~ c) magnesium d) Carbon

21. Article to be electroplated is always made as

- a) Anode b) Electrolyte ~~c) Cathode~~ d) None of these

22. Current should be used for electrolysis

- a) A.C Direct ~~b) D.C. Direct~~ c) Abbreviated current d) A.C. Abbreviated

23. Is the electrolyte used for electroplating an iron spoon with silver

- a) $\text{Na}_3[\text{AlF}_6]$ and HCL Sol. ~~b) $\text{NaIAg}(\text{CN})_2$ and HCN Sol.~~
c) (NiSO_4) and H_2SO_4 Sol. d) AgNO_3 and HNO_3 Sol.

24. Insoluble impurities such as silver, gold, mercury settle below as

- a) Precipitates b) Gelatinous compounds c) Crystals ~~d) Anode mud or slime~~

25. During electrorefining of copper pure copper is made the

- ~~a) Cathode~~ b) Anode c) Electrolyte d) none of these

26. Aluminium is extracted by dissolving aluminium oxide in

- ~~a) Nickel Sulphate $[\text{NiSO}_4]$~~ b) Silver Nitrate $[\text{AgNO}_3]$
~~Magnesium Hydroxide $[\text{Mg}(\text{OH})_2]$~~ d) Molten cryolite $\text{Na}_3[\text{AlF}_6]$

27. Electrolyte not used for electroplating with silver is

- a) Silver Chloride (AgCl) b) Silver Bromide (AgBr)
c) Silver Sulfide (Ag_2S) ~~d) Silver Nitrate (AgNO_3)~~

28. Current should be used for electroplating

- a) A.C (Alternating current) ~~b) D.C (Direct Current)~~
c) Abbreviated Current d) None of these

29. Select the correct answer from the choices A, B, C and D which are given

Write only the letter corresponding to the correct answer.

A compound which liberates reddish brown gas around the anode during electrolysis in its molten state is:

- a) Sodium Chloride b) Copper (II) oxide c) Copper (II) sulphate ~~d) Lead (II) bromide~~

30. Identify the weak electrolyte from the following:

- a) Sodium Chloride solution b) Dilute Hydrochloric acid
c) Dilute Sulphuric acid ~~d) Aqueous acetic acid~~

31. Choose the most appropriate answer from the following options:

Which of these will act as a non – electrolyte?

- ~~a) Liquid carbon tetrachloride~~ b) Acetic acid
c) Sodium hydroxide aqueous solution d) Potassium chloride aqu. solution

32. When fused lead bromide is electrolysed we observe:

- a) a silver grey deposit at anode and a reddish brown deposit at cathode
b) a silver grey deposit at cathode and a reddish brown deposit at anode
~~c) a silver grey deposit at cathode and reddish brown fumes at anode~~
d) a silver grey fumes at anode and reddish brown fumes at cathode