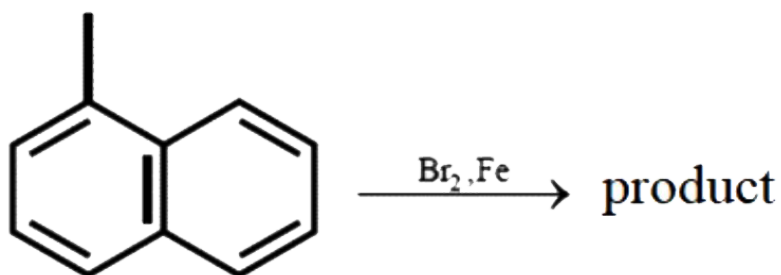


CHEMISTRY

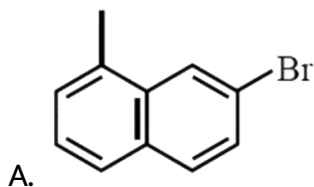
BOOKS - NTA MOCK TESTS

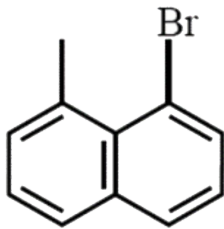
NTA NEET SET 23

Chemistry

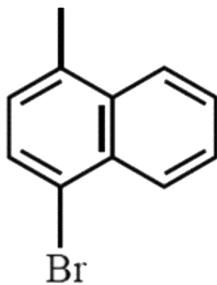


Major product is -





B.



C.

D. none of these

Answer: C

 [Watch Video Solution](#)

2. The time required to coat aluminum metal on the surface of a square plate of length 20 cm about 5 mm thickness on both sides by using molten $AlCl_3$ solution and 10 A current is nearly [Specific gravity of $Al = 1.8gmL^{-1}$]

A. 107.2 hr

B. 214.4 hr

C. 53.6 hr

D. 71.5 hr

Answer: B



Watch Video Solution

3. In nucleic acid, corresponding nucleotides are linked together by -

A. C' phosphodiester bond

B. $C'_2 - C'_5$ phosphodiester bond

C. $C'_3 - C'_5$ phosphodiester bond

D. $C'_4 - C'_5$ peptide linkage

Answer: C



Watch Video Solution

4. The increasing order of wavelength for He^+ ion, neutron (n) and electron (e^-) particles, moving with the same velocity is

A. $\lambda_{He^+} < \lambda_e < \lambda_n$

B. $\lambda_{He^+} = \lambda_n = \lambda_e$

C. $\lambda_{He^+} < \lambda_n < \lambda_e$

D. $\lambda_e < \lambda_n < \lambda_{He^+}$

Answer: C



Watch Video Solution

5. In a mixture of A and B, components show negative deviation when -

A. A - B interaction is stronger than A - A and B - B interaction

B. A - B interaction is weaker than A - A and B - B interaction

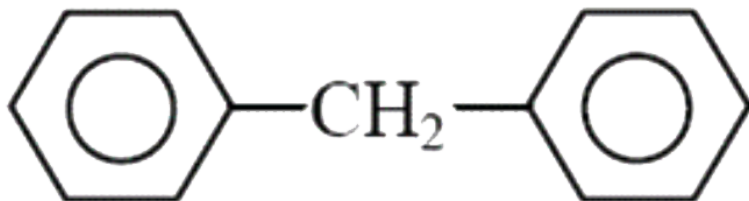
C. $\Delta V_{\text{mix}} > 0, \Delta S_{\text{mix}} > 0$

D. $\Delta V_{\text{mix}} = 0, \Delta S_{\text{mix}} > 0$

Answer: A

 Watch Video Solution

6. The molecular formula of diphenylmethane is $C_{13}H_{12}$



How many structural isomer are possible when one of the hydrogens is replaced by a chlorine atom?

A. 6

B. 4

C. 8

D. 7

Answer: B

 [Watch Video Solution](#)

7. Addition of inert gas to system

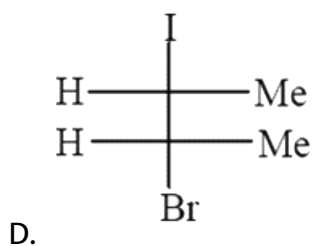
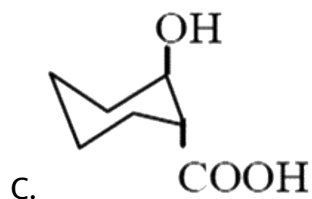
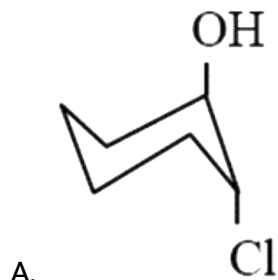
$N_2(g) + 3H_2(g)$ at equilibrium at constant volume. Then

- A. N_2 and H_2 are formed in abundance
- B. N_2 , H_2 and NH_3 will have the same molar concentration
- C. The production of ammonia increases
- D. No change in the equilibrium

Answer: D

 [Watch Video Solution](#)

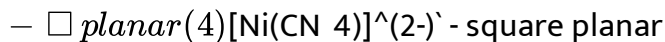
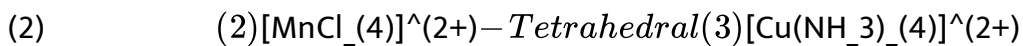
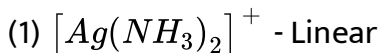
8. NGP (neighbouring group of participation) assistance for S_N2 reaction will not be seen in -



Answer: C

 Watch Video Solution

9. The geometry of some complex ions are given against them -



The correct match is -

A. 1 and 4

B. 1, 2, and 3

C. 1, 3 and 4

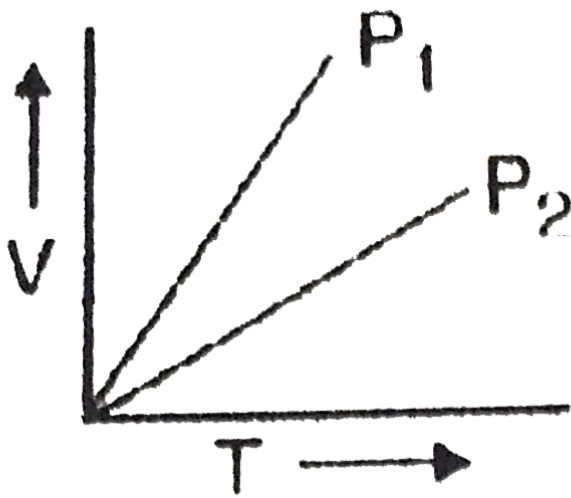
D. 1, 2, 3 and 4

Answer: D



Watch Video Solution

10. V vs T curves at constant pressure P_1 and P_2 for an ideal gas are shown below



Which is correct ?

A. $P_1 > P_2$

B. $P_1 < P_2$

C. $P_1 = P_2$

D. All of the above

Answer: B

 [Watch Video Solution](#)

11. The specific conductance of a 0.1 N KCl solution at $25^{\circ}C$ is $0.015 \text{ ohm}^{-1}\text{cm}^{-1}$. The resistances of the cell containing the solution at the same temperature was found to be 60 Ω . The cell constant (in cm^{-1}) will be

A. 0.9

B. 4×10^3

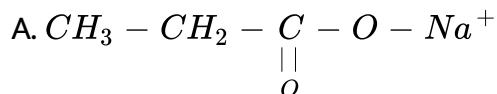
C. 2.4×10^{-4}

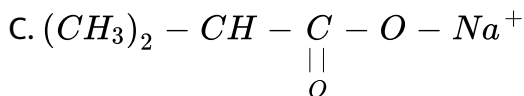
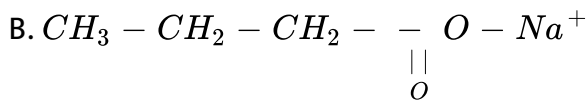
D. 1.11

Answer: A

 Watch Video Solution

12. Which sodium salt will be heated with doalime to obtain propane ?





D. 2 & 3 both

Answer: D

 [Watch Video Solution](#)

13. Liquation is used when

A. Metal and impurity have low melting point

B. Metal and impurity have high melting point

C. Metal have high melting point and impurity has low melting point

D. Metal has low melting point and impurity has high melting point.

Answer: D



[Watch Video Solution](#)

14. Which of the following contains calcium

A. Chalcocite

B. Carnallite

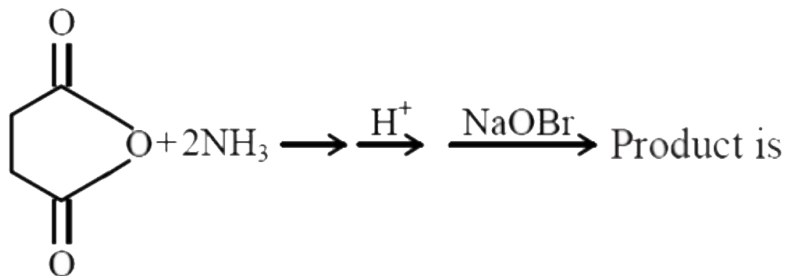
C. Cassiterite

D. Dolomite

Answer: D

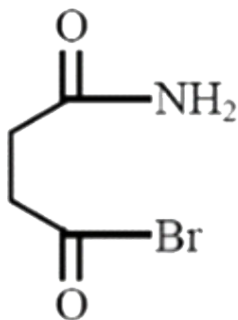


[Watch Video Solution](#)

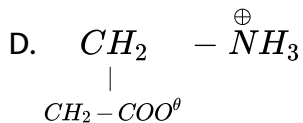
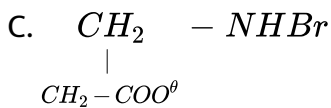
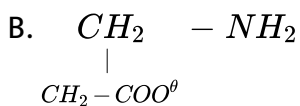


15.

2NH₃ to H^+ NaOBr product is:



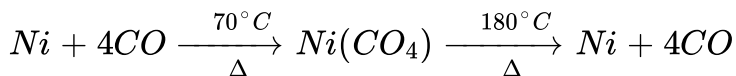
A.



Answer: B

Watch Video Solution

16. Which method of purification is represented by the following equation.

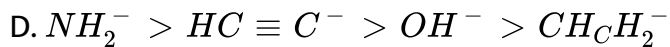
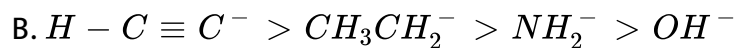
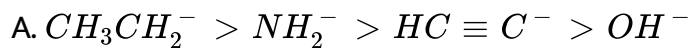


- A. Van arkel process
- B. zone refining
- C. Mond's process
- D. Cuppellation

Answer: C

 [Watch Video Solution](#)

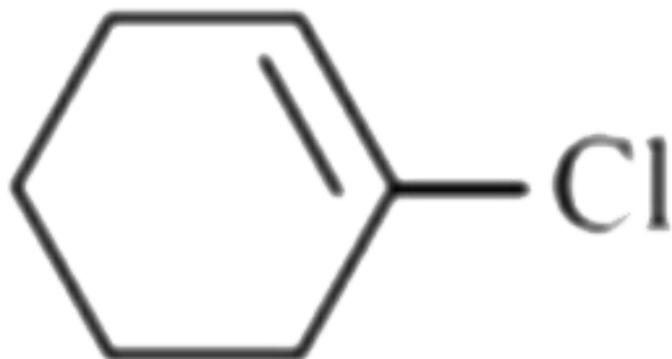
17. Which of the following order represent the order for the strength of base ?



Answer: A

 Watch Video Solution

18. Arrange the following compounds according to their relative reactivity with AgNO_3



 [Watch Video Solution](#)

19. The property of colloid is

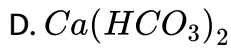
- A. Scattering of light
- B. setting under gravity
- C. Dialysis
- D. Emulsion

Answer: A

 [Watch Video Solution](#)

20. Temporary hardness is caused due to the presence of-

- A. $CaSO_4$
- B. $CaCl_2$



Answer: D

 [Watch Video Solution](#)

21. Consider a cube 1 of body-centered cubic unit cell of edge length 'a'. Now atom at the body center can be viewed to be lying on the corner of another cube 2. Find the volume common to cube 1 and cube 2.

A. $\frac{a^3}{27}$

B. $\frac{a^3}{64}$

C. $\frac{a^3}{2\sqrt{2}}$

D. $\frac{a^3}{8}$

Answer: D

 [Watch Video Solution](#)

22. Two liquids A and B form an ideal solution of 1 mole of A and x moles of B is 550 mm of Hg. If the vapour pressures of pure A and B are 400 mm of Hg and 600 mm of Hg respectively. Then x is-

A. 1

B. 2

C. 3

D. 4

Answer: C



Watch Video Solution

23. Half life of a reaction becomes half when initial concentrations of reactants are made double. The order of the reaction will be:

A. 1

B. 2

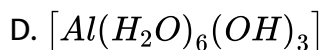
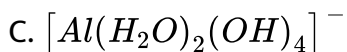
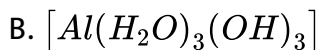
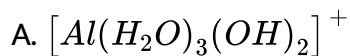
C. 0

D. 3

Answer: B

 [Watch Video Solution](#)

24. The dissolution of $Al(OH)_3$ by a solution of $NaOH$ results in the formation of



Answer: C

 [Watch Video Solution](#)

25. A sample of NaNO_3 weighing 0.38g is placed in a 50.0mL volumetric flask. The flask is then filled with water to the mark on the neck. What is the molarity of the solution?

A. $8.94 \times 10^{-6} M$

B. $8.94 \times 10^{-2} M$

C. $1.94 \times 10^{-2} M$

D. $8.94 \times 10^{-4} M$

Answer: B

 [Watch Video Solution](#)

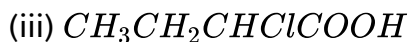
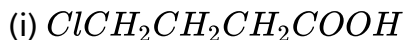
26. Which of the following is responsible for the inability of meso compound to show optical activity?

- A. Absence of chirality center
- B. Presence of more than one chirality centers
- C. Dissymmetric nature of its structure
- D. Internal compensation

Answer: D

 [Watch Video Solution](#)

27. Arrange the following compounds in decreasing order of acidity.



A. $I > II > III$

B. $III > II > I$

C. $I > III > II$

D. $III > I > II$

Answer: B

 [Watch Video Solution](#)

28. The xenon compounds that are isostructural with IBr_2^- and BrO_3^- respectively are:

A. Linear XeF_2 and planer XeO_3

B. Bent XeF_2 and pyramidal XeO_3

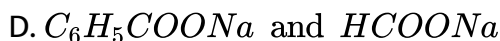
C. Bent XeF_2 and planer XeO_3

D. Linear XeF_2 and pyramide XeO_3

Answer: D

 [Watch Video Solution](#)

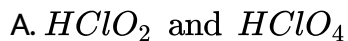
29. Phenylglyoxal, (C_6H_5COCHO), on heating with concentrated NaOH gives:



Answer: C

 Watch Video Solution

30. What products are expected from the disproportionation reaction of hypochlorous acid ?



B. HCl and Cl_2O

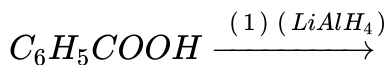
C. HCl and $HClO_3$

D. $HClO_3$ and Cl_2O

Answer: C

 [Watch Video Solution](#)

31. What are the organic products formed in the following reaction



A. $C_6H_5 - OH$ & $CH_3 - OH$

B. $C_6H_5 - CH_3$ & $CH_3 - OH$

C. $C_6H_5 - CH_2 - OH$

D. $C_6H_5 - CH_2 - OH$ & CH_4

Answer: C

 [Watch Video Solution](#)

32. What are the correct axial distance and axial angles for rhombohedral system?

A. $a = b = c, \alpha = \beta = \gamma \neq 90^\circ$

B. $a = b \neq c, \alpha = \beta = \gamma = 90^\circ$

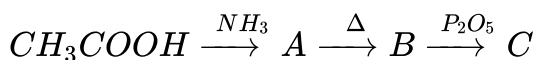
C. $a \neq b \neq c, \alpha = \beta = \gamma = 90^\circ$

D. $a \neq b \neq c, \alpha \neq \beta \neq \gamma \neq 90^\circ$

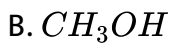
Answer: A

 Watch Video Solution

33. Name the end product in the following series of reaction



A. CH_4



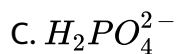
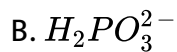
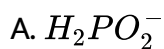
C. Acetonitrile

D. ammonium acetate

Answer: C

 [Watch Video Solution](#)

34. Which one of the following species acts as both Bronsted acid and base ?



D. All of these

Answer: C

 [Watch Video Solution](#)

35. Which of the following is not a non-electrolyte ?

- A. Acetic acid
- B. Glucose
- C. Ethanol
- D. Urea

Answer: A

 Watch Video Solution

36. In Lassaigne's test, the organic compound is fused with sodium metal so as to

- A. It is very reactive
- B. Its melting point is low

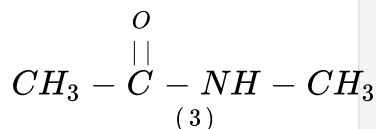
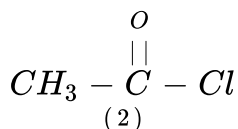
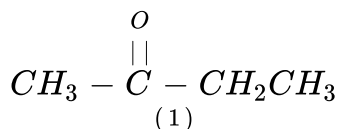
C. Its compounds are soluble in water

D. All of the above

Answer: D

 [Watch Video Solution](#)

37. Arrange the following in order of increasing reactivity towards nucleophilic substitution reaction



A. 1 lt 2 lt 3

B. 3 lt 1 lt 2

C. 1 lt 3 lt 2

D. 2 lt 1 lt 3

Answer: B

 Watch Video Solution

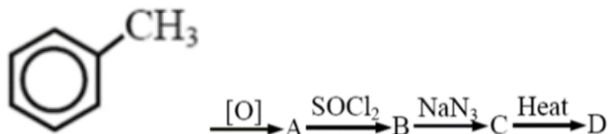
38. According to *MOT* which of the following statement about magnetic character and bond order is correct regarding O_2^{\oplus} .

- A. Bond order is less than O_2 & O_2^+ is paramagnetic
- B. Bond order is greater than O_2 & O_2^+ is paramagnetic
- C. Bond order is less than O_2 & O_2^+ is diamagnetic
- D. Bond order is greater than O_2 & O_2^+ is diamagnetic

Answer: B

 Watch Video Solution

39. In the following sequence of reaction what is D?



- A. Primary amine
- B. An amide
- C. phenyl isocyanate
- D. A chain lengthened hydrocarbon

Answer: C

 [Watch Video Solution](#)

40. The bonds present in N_2O_5 , are

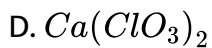
- A. only ionic
- B. covalent and coordinate
- C. only covalent
- D. covalent and ionic

Answer: B



Watch Video Solution

41. The bleaching action of bleaching powder is due to the formation of



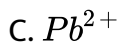
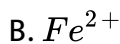
Answer: C



Watch Video Solution

42. Which of the following ions will liberate iodine when treated with KI?





Answer: A

 [Watch Video Solution](#)

43. The standard enthalpy of formation of octane (C_8H_{18}) is $-250kJ/mol$. Calculate the enthalpy of combustion of C_8H_{18} . The enthalpy of formation of $CO_2(g)$ and $H_2O(l)$ are $-394kJ/mol$ and $-286kJ/mol$ respectively.

A. $-5200kJmol^{-1}$

B. $-5726kJmol^{-1}$

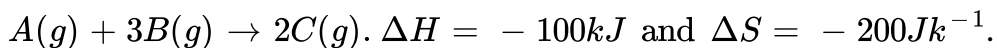
C. $-5476kJmol^{-1}$

D. $-5310kJmol^{-1}$

Answer: C

 [Watch Video Solution](#)

44. For a hypothetical reaction



Then the temperature at which the reaction will be in equilibrium is

A. 500 K

B. 480 K

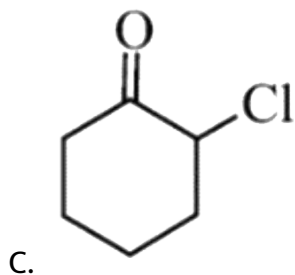
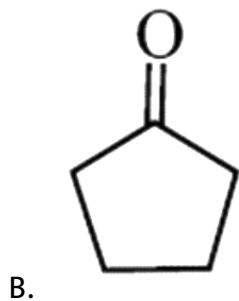
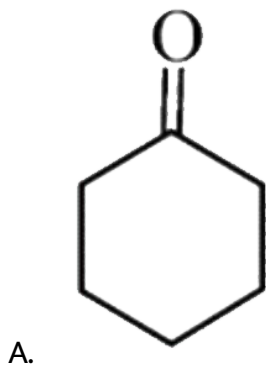
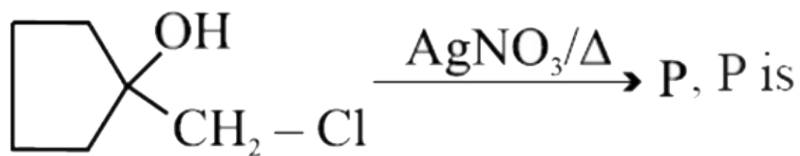
C. 520 K

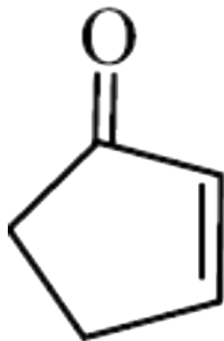
D. 510 K

Answer: A

 [Watch Video Solution](#)

45. Complete the following reaction





D.

Answer: A

 [Watch Video Solution](#)