

## NAT I Medical Chemistry

Sr	Questions	Answers Choice
1	The order of reactivity of halogens in aliphatic substitution reactions is	A. Br2 > Cl2 > F2 B. Cl2 > Br2 > F2 C. Cl2 Cl2 > Br2 D. F2 > Br2 > Cl2
2	The vapour density of a gas is 11.2 The volume occupied by 11.2 g of this gas at N.T.P is	A. 22.4 liters B. 11.2 liters C. 1 liter D. 2.24 liters
3	Carbon atom holding halogen in aryl halides is	A. Sp <sup>2</sup> -hybridesed B. <span style="font-size: 14.4444465637207px;">Sp</span> <sup>3</sup> <span style="font-size: 14.44444465637207px;">- hybridesed</span> C. <span style="font-size: 14.44444465637207px;">Sp</span> <span style="font-size: 14.44444465637207px;">Sp</span> Cspan style="font-size: 14.44444465637207px;">Sp D. <span style="font-size: 14.44444465637207px;">Sp</span> <sup>3 </sup> <span style="font-size: 14.44444465637207px;">Sp</span> <sup>3 </sup> <span style="font-size: 14.44444465637207px;">Sp</span> <hr/> <sup>3 </sup> <span style="font-size: 14.44444465637207px;">Sp</span> <hr/> <sup>3 </sup> <span style="font-size: 14.44444465637207px;">Sp</span> <hr/> <sup>3 </sup> <span style="font-size: 14.4444465637207px;">Sp</span> <hr/> <sup>3 </sup> <span style="font-size: 14.44444465637207px;">Sp</span> <hr/> <sup>5</sup>
4	Which of the following has least mass?	A. 2 gram atom of nitrogen B. 3 x 10 <sup>23</sup> atoms of C C. 1 mole of S D. 7.0 g of Ag.
5	Most common reactions of benzene and its derivatives are	A. Electrophilic addition reactions     B. Electrophilic substitution reactions.     C. Nucleophilic addition reactions     D. Nucleophilic substitution reactions
6	Rusting of iron is catalysed by	A. Fe B. O <sub>2</sub> C. Zn D. H <sup>+</sup>
7	Which of the following statement is correct if the intermolecular forces in liquids A, B and C are in the order A < B < C?	A. B evaporates more readily than A B. B evaporates less readily than C C. A and B evaporates at the same rate D. A evaporates more readily than C
8	A certain liberate 0.5 g of hydrogen in 2 h. How many grams of copper can be liberated by the same current flowing for the same time in a copper sulphare solution?	A. 12.7 gm B. 15.9 gm C. 31.8 gm D. 63.5 gm
9	Which of the following method is most appropriate for the manufacture of methane?	A. By reduction of CH2CL2 B. Wurtz reaction C. Liquification of natural gas D. None of these
10	Which one of the following compounds does not exist?	A. NCI <sub>5</sub> B. AsF <sub>5</sub> C. SbCI <sub>5</sub> D. PF <sub>5</sub>
11	The osmotic pressure of solution increases if	A. Temperature is decreased B. Solution constant is increased C. Number of solute molecules are increased D. Volume is increased
		A. <span style="font-size:&lt;br&gt;14.44444465637207px;">Two inches</span> B. <span style="font-size:&lt;br&gt;14.44444465637207px;">Three</span>

12	Ammonia gas used directly as a fertilizer is injected into the soil at a depth of about	incnes C. <span style="font-size: 14.44444465637207px;">Five inches</span> D. <span style="font-size: 14.44444465637207px;">Six inches</span>
13	Al is more reactive than Fe but Al is less easily corroded than Fe Because	A. It is a noble metal B. Oxygen forms a protective reaction easily with water C. Iron undergoes reaction easily with water D. Fe form mono and divalent ions.
14	The symbol of the element whose atoms have the outer most electronic configuration $2\text{s}^2$ $2\text{p}^3$ is	A. N B. Li C. P D. Na
15	Inert pair effect plays an important role in case of	A. F B. Al C. Si D. Tl
16	The kinetic theory of gases predicts that total kinetic energy of a gaseous assembly depends on	A. Pressure of the gas B. Temperature of the gas C. Volume of the gas D. Pressure temperature and volume of the gas
17	Which of the following statement regarding catalyst is not true?	A. A catalyst remains unchanged in composition and quantity at the end of the reaction B. A catalyst can initiate a reaction C. A catalyst dose not alter the equilibrium in a reversible reaction D. Catalysts are sometimes very specific in respect of reaction
18	Causticisation process is used for the preparation of	A. Caustic soda B. Caustic potash C. Baryata solution D. Slaked lime
19	If $N_A$ is Avogadro's number then number of valence electrons in 4.2 g of nitride ions $N^{3-}$ is	A. 2.4 N <sub>A</sub> B. 4.2 <span style="font-size: 14.44444465637207px;">N</span> <sub>A</sub> C. 1.6 <span style="font-size: 14.44444465637207px;">N</span> <sub>A</sub> D. 3.2 <span style="font-size: 14.44444465637207px;">N</span> <sub>A</sub> C. 1.6 <span style="font-size: 14.44444465637207px;">N</span> <sub>A</sub>
20	Maximum number of active hydrogens are present in	A. Acetic-acid B. Glycerol C. Methane D. Methanol