

PPSC Chemistry Part III Inorganic Chemistry Online Test

| Sr | Questions | Answers Choice |
|----|---|---|
| 1 | In which pair of species, the Lewis formula contain same number of Lone pairs and bond pairs but they are not iso electronci. | A. O2 B2 B. SO2, O3 C. PCl3, BF3 D. SOCl2, COCl2 |
| 2 | In the Lewis formula of which of the following species, the number of single double and dative bonds are equal. | A. N2O3 B. HNO3 C. SO2 D. SOCI2 |
| 3 | The total number of bond pairs around sulphur and total number of lone pairs around oxygen atoms in the Lewis structure of sulphate ion are respectively. | A. 4, 12 B. 8,12 C. 12,4 D. 6,12 |
| 4 | Which of the following element has six electrons in the valence shell but cannot exhibit a maximum co valency of six. | A. Sulphur B. Oxygen C. Selenium D. Both A and B |
| 5 | Which element out of the following can ehibit a maximum con valency of seven. | A. Chlorine B. Sulphur C. Fluorine D. both Cl and F |
| 6 | The Lewis formula of SOCI2 the total number of bond pairs and lone pairs of electrons around sulphur are. | A. 2,1 B. 2 ,2 C. 3 ,1 D. 3 ,0 |
| 7 | In which pair of species, the Lewis formulae contain same number of ion pairs and bond pairs but they are not isoelectronic. | A. O2, N2 B. SO2, O3 C. PCI3, BF3 D. SOCI2, COCI3 |
| 8 | In the Lewis formula of which of the following species, the number of single double and dative bonds are equal | A. N2O5 B. HNO3 C. SO2 D. SOCI2 |
| 9 | In the electronic structure of acetic acid, the total number of shared and unshaped pair of electrons are respectively. | A. 16 ,8 B. 8 ,4 C. 12 ,8 D. 8 ,12 |
| 10 | Pi bond is formed | A. By the overlapping of atomic orbitals on internuclear axis B. By transference of electrons C. By sidewise overlapping to half filled p orbitals D. By overlapping of s-orbitals with p orbitals |
| 11 | Which of the following is an example of super octet molecules. | A. C1F3 B. IF7 C. PCI5 D. All the three |
| 12 | For covalent bond to form between two atoms A and B | A. Transference of electrons must take place from A to B B. A pair of electrons of A is shared by both A and B C. A and B contribute equal no. of electrons for mutual sharing by A and B D. One of the atom A or B must already have octet of electrons. |
| 13 | The force responsible for dissolution of ionic compounds in water are | A. Hydrogen bonds B. lon dipole forces C. lonic bonds D. Van Der Waal forces |
| 14 | Which element among the following cannot exhibit variable electronvalency | A. ₂₉ Cu B. ₅₀ Sn |

| ÷ ÷ | | C. ₂₅ Mn D. ₃₈ Sr |
|-----|---|---|
| 15 | Which of the following configuration of an ionic species represents psedue noble gas configuration. | A. ns2 B. ns2 np6 C. ns2 np6 nd 10 D. ns2 np3 |
| 16 | The electrolysis of molten metal hydride will produce dihydrogen gas. | A. At cathode B. At anode C. At both the electrodes D. At none of the electrodes |
| 17 | Which name is associated with the rules which help in predicting the portability of anion. | A. Soddy B. Slater C. Fajan D. Linus pauling |
| 18 | Which halide of cesium will be highly ionic in nature. | A. K+ B. Ag+ C. Rb+ D. Ca+ |
| 19 | Which of the following parameter is not involved in calculations based on Born Haber Cycle. | A. lonization enthalpy B. Electron gain enthalpy C. Electronegativity D. Bond dissociation energy |
| 20 | The carbonate of which of the following will have highest lattice energy. | A. Barium B. Magnesium C. Calcium D. Strontium |