

CHEMISTRY-11	Chapter#06 (Complete) Test-5		
	Name:	Class:	ID:
Date: / /	Marks Total: 40	Marks Obtained:	
Time Allowed: 75 Min.			

Maximum Marks: 08

(OBJECTIVE TYPE)

Time Allowed: 10 Min.

NOTE: Tick The Correct Option:

- An ionic compound $A^+ B^-$ is most likely to be formed when:
 - The ionization energy of A is high and electron affinity of B is low.
 - The ionization energy of A is low and electron affinity of B is high.
 - Both the ionization energy of A and electron affinity of B are high.
 - Both the ionization energy of A and electron affinity of B are low.
- The compromise bond distance of two Hydrogen atoms is:
 - 74.4 pm
 - 75.4 pm
 - 71.4 pm
 - 78.4 pm
- The molecule which cannot form co-ordinate covalent bond with H^+ ion is:
 - NH_3
 - H_2O
 - PH_3
 - CH_4
- The bond angle between two H-S bonds in H_2S is:
 - 180°
 - 104.5°
 - 109.5°
 - 92°
- Carbon atom in CH_4 is hybridized:
 - sp^3
 - sp^2
 - sp
 - dsp^2
- The bond order of N_2 molecule is:
 - 1
 - 2
 - 3
 - 4
- The most electronegative element in the periodic table is:
 - F
 - Cl
 - O
 - He
- Coordinate covalent bond is also called:
 - Electrovalent bond
 - Electron pair bond
 - Dative covalent bond
 - All

Maximum Marks: 32

(SUBJECTIVE TYPE)

Time Allowed: 65 Min.

SECTION-I

Q.2: Give brief answers to the following questions: (20)

- Define bond distance?
- Why anionic size is greater than the parent atom?
- Why is second I.E. greater than the first one?
- Why is first electron affinity usually negative, while second electron affinity is always positive?
- Why CO_2 has linear shape?
- Draw the geometry of SO_2 and SO_3 molecules on the basis of VSEPR theory.
- Explain the structure of NH_3 on the basis of VSEPR theory.
- Why anti-bonding molecular orbital has greater energy than bonding molecular orbital?
- Prove that bond order of He_2 is zero. Or Why He_2 molecule is not possible?
- The dipole moment of CO_2 is zero but that of H_2O is 1.85 D. Why?

SECTION-II

NOTE: Attempt All Questions:

(12)

Q.3: Define electron affinity. Name the factors affecting it. How does it vary in the periodic table?

Q.4: Discuss sp^3 hybridization in detail. Draw the structure of methane molecule.

Q.5: What is dipole moment? Give its applications.