

Islamic University of science and Technology

Department of Chemistry

The entrance question paper will contain sixty (60) Multiple Choice Questions based on the chemistry syllabi of first, second and third year of graduation of the Kashmir University.

Model/Sample Question Paper

Total No of Question: 60


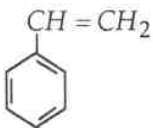
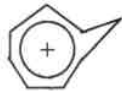
- Q1. The compound drawn strongly into the magnetic field
- TiCl_4
 - FeCl_3
 - CuCl_3
 - None of the above
- Q2. What is the geometry of $[\text{AuCl}_4]^-$ complex ion
- Square Planer
 - Tetrahedral
 - Trigonal pyramidal
 - None of the above
- Q3. The best technique to quantify the known impurity in drug substance
- HPLC
 - IR
 - UV
 - NMR
- Q4. Which of the will not absorb IR radiation
- Cl_2
 - CO
 - H_2O
 - None of the above
- Q5. Glycogenesis is the
- Formation of glucose
 - Formation of glycogen
 - Breakdown of glucose
 - Breakdown of glycogen
- Q6. Mg^{+2} is isoelectronic with
- Ca^{2+}
 - Na^+
 - Zn^{2+}
 - Cu^{2+}
- Q7. Enthalpy Change on mixing H_2O and alcohol at room temperature is

- a. Zero
- b. Negative
- c. Positive
- d. Depends upon proportion of alcohol

Q8. If the bond is along the x-axis, which of the following combinations cannot form a Molecular orbital

- a. p_x and s
- b. p_x and p_y
- c. p_z and p_z
- d. p_z and s

Q9. The antiaromatic system

- a. 
- b. 
- c. 
- d. None of the above

Q10. The no of vibration degrees of freedom for a non-linear molecule of benzene

- a. 16
- b. 30
- c. 18
- d. 22

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Q60. The potential of Hydrogen electrode at pH 10 is

- a. 0.59 V
- b. 0.00 V
- c. -0.59 V
- d. -0.059 V