

Section-B

(Short Questions)

Note: Answer any SIX of the following:

- Q.2 Define any two of the following:
Allotropy Electrophile Enzymes
- Q.3 Differentiate SN_1 & SN_2 reactions.
- Q.4 Complete and balance the equations.
(a) $Al_4C_3 + H_2O \rightarrow Al_2O_3 +$

- (b) $PCl_3 + H_2O \rightarrow \dots\dots\dots + HCl$
 (c) $MgN + H_2O \rightarrow Mg(OH)_2 + \dots\dots\dots$
 (d) $NaAlH_4 + H_2O \rightarrow Al(OH)_3 + \dots\dots\dots$

- Q.5 What are Alkylhalides? How are they classified?
 Q.6 Give the reason:

- (a) Diamond is bad conductor of electricity.
 (b) Ionization potential decreases down the group.
 (c) Transition metals form coloured compounds.
 (d) PH_3 is weaker base than NH_3 .

Q.7 What is Atomic hydrogen? How it is prepared?

Q.8 Define and explain the Homologous series.

Q.9 Write the structure of following:

- (a) m-nitrobenzoic acid (b) Ethyl-acetate (c) Glycerol (d) Chloroform

Q.10 Write a short note on corrosion.

Section-C

Descriptive Answer

Note: Answer any TWO of the following questions.

Q.11 Explain Modern periodic Law. Describe various type of elements based on electronic configuration?

Q.12 What are transition elements? Describe following properties of transition elements.

- (a) Atomic size (covalent radii)
 (b) Melting and boiling point

Q.13 Write the IUPAC names of the following:

