INDIAN SCHOOL NIZWA - WORKSHEET

CHEMISTRY

CH: 13 BIOMOLECULES

Name: _____ Date:_____ Class: XII Sec: ___

I **Answer the following**

1. Define a) polysaccharides b) invert sugar c) anomers d) amino acids e) zwitter ion f) vitamins
2. What is the essential difference between α form of glucose and β form of glucose? Explain.
3. What do you understand by secondary structure of protein.
4. What is meant by pyranose structure of glucose?
5. Aminoacids have comparatively higher melting points than corresponding haloacids. Why?
6. Define zwitter ion.
7.. Amino acids may be acidic, alkaline or neutral. How does this happen?
8. Name the chemical components which constitute nucleotides .Write any 4 functions of nucleotides in a cell.
9.. Name the three major clases of carbohydrates and give an example each of these classes.
10. Name the two components of α glucose which constitute starch.How do they differ from each other?
11. What is the basic structural difference between glucose and fructose?
12. Write the products obtained after hydrolysis of lactose.
13. Differentiate between
    ab) peptide linkage and glycosidic linkage
    c) fibrous protein and globular protein
14. Write chemical reactions to show that open structure of D-glucose contains the following.
    a) straight chain
    b) five alcohol groups
    c) aldehyde as carbonyl group
15. Account for the fact that sucrose is a non reducing sugar and lactose is a reducing sugar.