

PON VIDYASHRAM, VALASARAVAKKAM
PERIODIC TEST - 1
BIOLOGY – WORK SHEET
CLASS – IX

I. Answer in one or two words:-

1. Who coined the term protoplasm and when?
2. Name the biggest cell and longest cell in human body.
3. What are the types of Endoplasmic Reticulum?
4. Which cell organelle is known as “Protein factory” and where are they located in a cell?
5. Are plastids present in all cells? What are its types?
6. What is histology?
7. Why do animals tissue require more energy as compared to plant tissue?
8. What are the elements of Xylem?
9. Where do you find Parenchyma and Collenchyma cell in plants?
10. Mention any two important characteristics of Epithelial layer.

II. Answer the following:-

1. What do you mean by Endocytosis? How does amoeba obtain its food?
2. Why are lysosomes known as suicidal bags?
3. What are the conditions for Osmosis?
4. Distinguish between cell wall and cell membrane.
5. List the functions of nucleus.
6. Write about the location and function of Apical and Lateral Meristematic tissue.
7. Give the functions of epidermis.
8. List any two differences between striated and cardiac muscle with respect to their structure and function.
9. Give reason for following:-
 - (i) Intercellular spaces are absent in sclerenchymatous tissue.
 - (ii) Branches of a tree move and bend freely in high wind velocity.
10. Why are Xylem and Phloem called complex tissues? How are the different from one other?

III. Write the Short Note:-

1. What would happen if the plasma membrane ruptures or breaks down and why it is called as selectively permeable membrane. (3 m)
2. (i) Draw the structure of Nerve cell and label the following
a. Axon b. Dendrites c. Nucleus d. Nerve endings (2 m)
(ii) Mention the structural importance of Neuron. (1m)
3. Differentiate between Parenchyma and Sclerenchyma tissue. Draw a well labeled diagram. (3 m)

IV. Answer the following:-

1. (i) Define Osmosis. What are the different types of Osmosis. (2m)
Give examples . (1 m)
(ii) What happens to a cell when placed in the following medium. (2m)
(i) Salt solution.
(ii) Water
2. What about the structure and location of following Epithelial tissue. (5 m)
 - a. Stratified Squamous Epithelium
 - b. Columnar Epithelium
 - c. Ciliated columnar Epithelium
 - d. Cuboidal Epithelium
 - e. Glandular Epithelium
