Bharathiar University M.Sc BioTechnology, CELL AND MOLECULAR BIOLOGY 2010 paper

Time: Three hours

Maximum:75 marks

Answer all questions

SECTION A - (10 X 1 = 10 MARKS)

1. Golgi bodies.

2. Cytoplasm.

3. Micro tubules

4. Endocytosis

5. Endo cytosis

6. tRNA

7. Cell junctions.

8. Oncogenes

9. AIDS

10.Kalazar

SECTION B - (5 X 5 = 25 MARKS)

11.(a) Write down the functions of mitochondria in animal cell.
Or
(b) Write a note on structure of nucleus.

12.(a) Write the structure and functions of micro tubules.
Or
(b) Explain receptor mediated endocytosis.

13.(a) Describe the types of DNA replication.
Or
(b) Define and explain the steps involved in non cyclic phosphorylation.

14.(a) Define and explain passive transport with examples.
Or
(b) Write down the characteristics and causes of cancer.

15.(a) Write a note on development of filariasis in man and mosquito.
Or
(b) Explain gemato genesis. in animals.

SECTION C - (5 X 8 = 40 marks)

16.(a) Describe the structure and functions of endoplasmic reticulum.
Or
(b) Explain the methods for separation and purification of cell structure and molecules.

17.(a) Give an account on membrane protein.
Or
(b) Describe the structure and functions of chloroplast.

18.(a) Explain RNA transcription and precessing.
Or
(b) Describe electron transport chain in mitochondria.

19.(a) Define cell junction and explain the major cell junctions in vertebrates.
Or
(b) Write a note on tumor suppressor genes with examples.

20.(a) Write down the types,symptoms and pathogenesis of Malaria.
Or

(b) Define and explain parthenogenesis.