

Subject Code: B133101/R13

III B. Pharmacy I Semester Regular/Supple Examinations, May – 2017

PHARMACEUTICAL BIOCHEMISTRY

Time: 3 hours

Max. Marks: 70

Question Paper Consists of **Part-A** and **Part-B**
Answering the question in **Part-A** is Compulsory,
Three Questions should be answered from **Part-B**

PART-A

1. (a) Write the biochemical pathway of Glycolysis.
(b) Enlist the biomolecules. Explain Biochemical role of biomolecules.
(c) Discuss briefly about hormonal regulation of lipid metabolism and disorders.
(d) Write about metabolic disorders of carbohydrates.
(e) Give a note on essential and non essential amino acids.
(f) Give biochemical functions of Proteins. [4+3+4+4+4+3]

PART-B

2. (a) Describe the molecular constituents of cell membrane.
(b) Give a note on Active transport process across the cell membrane. [10+6]
3. (a) Write the HMP shunt path way and its significance.
(b) Classify carbohydrates with examples. Add a note on biological significance of carbohydrates. [8+8]
4. (a) Discuss the β –oxidation of fatty acids and give its energetic.
(b) Describe the bio synthesis of fatty acids. [8+8]
5. (a) Discuss the reactions of Urea cycle and write the metabolic disorders of urea cycle.
(b) Write the reactions involved in the metabolism of phenylalanine. [9+7]
6. (a) What are the factors affecting the enzymes action?
(b) Briefly outline the energy rich compounds. Add note on Phosphate metabolism. [8+8]
7. (a) Discuss the structural aspects of DNA and tRNA.
(b) Describe the metabolic pathway for the synthesis of Pyrimidine nucleotide. [8+8]