

Rajiv Gandhi University of Health Sciences, Karnataka

Second year B.Pharm Degree Examination – August 2010

Time: Three Hours**Max. Marks: 80 Marks**

PHARMACEUTICAL ORGANIC CHEMISTRY - II (Revised Scheme - 2)

Q.P. CODE: 1960

Your answers should be specific to the questions asked
Draw neat labeled diagrams wherever necessary

LONG ESSAYS (Answer any Two)**2 x 10 = 20 Marks**

1. Explain the composition and properties of oils and fats.
2. Give an account on the structures, synthetic methods, reactions and important medicinal compounds of Quinoline.
3. (a) What are essential amino acids? Name them.
(b) Write a note on stereochemistry of Biphenyl compounds?

SHORT ESSAYS (Answer any Eight)**8 x 5 = 40 Marks**

4. Give the classification of Heterocyclic compounds with examples
5. Write a note on element of symmetry?
6. Define acid value, Saponification value and Iodine value. How is Iodine value determined?
7. Describe the various methods used to find N-terminal residue in protein or polypeptides.
8. Write the chemical structure and medicinal uses for the following (i) Morphine (ii) INH (iii) Metronidazole (iv) Menadione (v) Propranolol.
9. Give an account on the aromaticity and basicity of pyridine.
10. What are R and S configurations? Explain with examples.
11. Outline the preparation and chemical reactions of Naphthalene.
12. Give the chemical name, structure and medicinal uses of the following compounds:
(i) Piperazine (ii) Diazepam (iii) Sulphadiazine (iv) Benzodiazepine (v) Nicotinic acid.
13. Define and classify carbohydrates by giving suitable examples.

SHORT ANSWERS**10 x 2 = 20 Marks**

14. What are epimers? Give example.
15. Define racemic modification.
16. What is Walden inversion?
17. What is conformational analysis?
18. Give acridine synthesis.
19. Distinguish between reducing sugars and Non-reducing sugars.
20. What are amino acids? Write any one method of preparation of Amino acids.
21. Define the following terms: (a) Chirality (b) Meso compounds.
22. Define Enantiomer. Give two examples.
23. How is glucose converted into fructose?
