PAPER III

(RS 2 & RS 3)

Q.P. CODE: 9233

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

LONG ESSAY (Answer any TWO) **2 X 20 = 40 Marks**

1. Discuss in detail about various parameters employed in QSAR studies.

2. (a) Classify immuno suppresents and immuno stimulants in detail.
   (b) Explain the design of non covalently binding enzyme inhibitors.

3. (a) WHAT are pro drugs? Explain the various aspects governing Pro-drug design.
   (b) Give an account of irreversible gastric-proton pump inhibitors.

SHORT ESSAY (Answer any FIVE) **5 X 10 = 50 Marks**

4. Briefly discuss the theoretical and practical aspects of microbial transformation.

5. Describe the molecular modeling in drug design.

6. Briefly describe about recombinant DNA technology.

7. Write about the importance of Bio-isosterism and steric features in drug design.

8. Describe in detail about epitope mapping and HIV – TAT inhibitor

9. Give the application of Hansch and free Wilson analysis in QSAR studies.

SHORT NOTES **2 X 5 = 10 Marks**

10. Describe the mechanism of Gastric Acid secretion and inhibition

11. Explain any one method for the calculation of partition co-efficient.

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PAPER IV

(RS 2 & RS 3)

Q.P. CODE: 9234

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

LONG ESSAY (Answer any TWO) **2 X 20 = 40 Marks**

1. Elucidate the structure of Reserpine.
2. Classify adrenal cortex hormones and give SAR and synthesis of Hydrocortisone.
3. What are the limitations of insulin therapy? How insulin is prepared, stored and released into blood stream

SHORT ESSAY (Answer any FIVE) **5 X 10 = 50 Marks**

4. Explain the metabolism of purine and pyrimidines
5. Explain nocardins and carbapenams as antibiotics?
6. Write a note on synthetic estrogens
7. Explain the biosynthetic pathway of male sex hormone
8. Discuss anti-pseudomonal penicillin
9. Explain the different classes of anticancer agents

SHORT NOTES **2 X 5 = 10 Marks**

10. Explain the active constituents and uses of Gymnema sylvestere
11. Write the structure and mechanism of action of any two antifungal agents

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