QP Code: 3311 Reg No:

M Pharm Part I Degree Examinations - June 2012 (Pharmaceutical Chemistry) Paper I - Drug Design

Time: 3 hrs Maximum Marks: 100

- Answer all questions
- Draw diagrams wherever necessary

Essays: (2x20 =40)

- 1. Discuss the different parameters used in QSAR and explain their influence on biological activity. Add a note on applications and limitations of Hansch equation
- 2. Explain in detail how recombinant DNA technology is used as a tool in developing new drugs. Add a note on site directed mutagenesis and receptors as drug targets.

Short Essays: (6x10=60)

- 3. Explain in detail about phase I and phase II metabolic reactions.
- 4. Write a note on combinatorial chemistry with special reference to parallel organic synthesis technology.
- 5. What is topliss decision tree analysis. Explain peptidomimetics in drug design
- 6. Explain in detail the various factors to be considered while designing analogs of original lead.
- 7. Discuss the various approaches adopted in prodrug design with at least two examples from each category.
- 8. Explain the terms Deconvolution High throughput screening.
