QP Code: 421006	Reg. No
<b>4</b>	

## Fourth Semester B.Pharm Degree Regular/Supplementary Examinations March 2023 Pharmaceutical Organic Chemistry III

## (2017 Scheme)

Time: 3 Hours Max. Marks: 75

- Answer all questions to the point neatly and legibly
   Do not leave any blank pages between answers
   Indicate the question number correctly for the answer in the margin space
- Answer all parts of a single question together Leave sufficient space between answers
- Draw diagrams wherever necessary

Essays (2x10=20)

- 1. Explain in detail about atropisomerism.
- 2. Discuss the reaction, mechanism and applications of Clemmensen reduction and Beckmanns rearrangement.

Short Notes (7x5=35)

- 3. Define resolution. Explain two methods of resolution.
- 4. Write short notes on nomenclature of heterocyclic compounds.
- 5. Explain aromaticity, basicity and reactions of pyrrole.
- 6. Give any three methods of preparations of quinoline.
- 7. Explain electrophilic substitution reactions of pyridine.
- 8. Write the synthesis of azepines. Mention one derivative containing azepine and its medicinal use.
- 9. Explain Birch reduction.

Answer Briefly (10x2=20)

- 10. Any two reactions of Furan.
- 11. Define optical activity.
- 12. Define Meso compounds.
- 13. Define enantiomers.
- 14. Mention any two synthetic reagents used for reduction reactions with chemical structure.
- 15. Define staggered and eclipsed conformations.
- 16. Draw the chemical structures of pyrazole, imidazole, oxazole and thiazole.
- 17. Define Dakin reaction.
- 18. Any one method of preparation of thiophene.
- 19. Any one medicinal drug having acridine nucleus.

\*\*\*\*\*\*