

**VINAYAKA MISSION'S RESEARCH FOUNDATION
(DEEMED TO BE UNIVERSITY), SALEM**

**B.PHARM. DEGREE EXAMINATION – July 2021
Third Semester**

PHARMACEUTICAL ORGANIC CHEMISTRY II

Time : Three hours

Maximum: 75 marks

I. Write essays on any **TWO** questions: (2 x 10 = 20)

1. Explain the aromaticity and resonance structures of benzene including Huckel's rule.
2. Define and classify the activating and deactivating group. Discuss the theory of effect of the substituent's on reactivity.
3. What are polynuclear aromatic hydrocarbons? Write the synthesis and properties of Diphenyl ethane and Naphthalene?

II. Write short answers on any **SEVEN** questions: (7 x 5 = 35)

4. Discuss the orientation in electrophilic aromatic substitution reaction.
5. Give the nomenclature and preparation of Cycloalkanes.
6. Write the general methods for the preparation of aromatic carboxylic acids.
7. Explain the influence of substituent's on basic property of aromatic amines.
8. Explain in detail about Coulson and Moffitts modification.
9. Write the preparation, important reaction and uses of Phenol.
10. Discuss the reaction and mechanism of Nitration and sulphonation.
11. Write the preparation of triphenyl methane and its derivatives.
12. Discuss the determination of acid and iodine value.

III. Write short notes on : (10 x 2 = 20)

13. Write the structure and uses of Saccharin.
14. Qualitative tests for hydroxyl benzene.
15. Acetyl value.
16. Write the structure and uses of naphthol.
17. Write the structure and uses of cresols.
18. Give the example of fats and oil.
19. Preparation of Aromatic Amines.
20. Hydrogenation is fatty acid.
21. Diazotization.
22. Write the structure and uses of chloramines.
