

# C.U.SHAH UNIVERSITY

## Winter Examination-2021

Subject Name: Pharmaceutical Organic Chemistry II - Theory

Subject Code: BP301T

Branch: B.Pharm

Semester: 3

Date: 13/12/2021

Time: 02:30 To 05:30

Marks: 75

Instructions:

- (1) Use of Programmable calculator & any other electronic instrument is prohibited.
- (2) Instructions written on main answer book are strictly to be obeyed.
- (3) Draw neat diagrams and figures (if necessary) at right places.
- (4) Assume suitable data if needed.

---

<b>Q-1</b>	<b>Attempt the following questions:</b>	<b>(20)</b>
	a) Explain $\beta$ – oxidation of fat and oil.	2
	b) Give example of drying, semi drying and nondrying oils.	2
	c) Explain Basicity of Aromatic Amines	2
	d) What do you mean by ionization of Aromatic Acids?	2
	e) Write down Schotten Baumann Reaction.	2
	f) Why Cyclopropane is least stable member then Cycloalkanes?	2
	g) Draw Boat & Chair conformation of Cycloalkanes.	2
	h) What is 2 + 2 addition reaction of cyclo alkanes?	2
	i) Out of Ortho & Para which isomer of Phenol have less Boiling point? Why?	2
	j) Explain: Williamson Synthesis	2

Attempt the following questions:

<b>Q-2</b>	<b>Attempt any two of following :</b>	<b>(20)</b>
<b>A</b>	Write down Structure, Synthesis, Chemical Reactions, and Uses of Anthracene.	<b>10</b>
<b>B</b>	Discuss Physical property & Special Reaction of Phenol.	<b>10</b>
<b>C</b>	Explain Baeyer's Strain Theory.	<b>10</b>
<b>Q-3</b>	<b>Attempt any Seven of following :</b>	<b>(35)</b>
<b>A</b>	Write Physical property of phenol. How do you prove that phenol is acidic in nature? Explain.	<b>5</b>
<b>B</b>	What do you mean by Ammonolysis? Synthesize 1°, 2° & 3° Aromatic Amines by Ammonolysis? Write disadvantages of this method.	<b>5</b>
<b>C</b>	Explain following reaction:	<b>5</b>
	i) Anisole from Phenol	
	ii) O- Cresol from aromatic amine derivatives	
<b>D</b>	Explain Coulson & Moffit's Theory with Proper Hybrid diagram.	<b>5</b>



- E** RM value and Iodine value. **5**
- F** Explain Hoffman Degradation with Mechanism. **5**
- G** Structure & Uses of Cresol & Naphthols. **5**
- H** What do you mean by Alkylation & Acylation? Explain with reference to Benzene with Reaction. **5**
- I** How will you prepare Benzoic acid from: 1° Alcohol, Nitrile, Alkyl Benzene, Dicarboxylic Acid & 1° Amine? Write down reactions of each. **5**

