

Day and Date: Thursday,20/01/2022
Time: 11.00 am to 12.30 Pm

Seat No :

Max. Marks- 50

Instructions:

- All Questions are compulsory.
- Figure to the right indicate full marks.
- Give suitable general Instructions
- Any other Course Specific Instructions.

BT	CO's	Q. No.	Attempt the following	Marks
		Q.1	Attempt the following	
		a	Derive an expression for first order reaction.	(7Mark)
		b	What are characteristics of catalysts?	(7Marks)
		c	Give an account of water system as one component system	(6 Marks)
		Q.2	Attempt the following	
		a	What are addition reactions? Explain its types	(7 Marks)
			OR	
		a	Explain Witt's theory of dyes with suitable examples	(7 Marks)
		b	How aromatic nitro compounds are prepared by direct nitration method? Explain with its mechanism.	(8 Marks)
		Q.3	Attempt the following	
		a	Explain the reactions of nitro groups in aromatic nitro compounds.	(7 Marks)
		b	Give an account of azo dyes & anthraquinone dyes with their reactions.	(8 Marks)
			OR	
		b	Explain modern theory of colours.	(8 Marks)
