O.P.Code: 18ME0308

**R18** 

H.T.No.

## SIDDHARTH INSTITUTE OF ENGINEERING & TECHNOLOGY:: PUTTUR (AUTONOMOUS)

B.Tech II Year II Semester Supplementary Examinations May/June-2024 MANUFACTURING PROCESSES

(Mechanical Engineering)

Time: 3 Hours  Max. Marks:			
PART-A			
		(Answer all the Questions $5 \times 2 = 10$ Marks)	
1	a	Write the requirements of good pattern.	<b>2M</b>
		How does brazing differ from braze welding?	<b>2M</b>
	c	How are seamless tubes produced?	<b>2M</b>
	d	What is punching operation?	2M
	e	List the advantage of cold forming of plastics?	2M
		PART-B	
		(Answer all Five Units 5 x $10 = 50$ Marks)	
		UNIT-I	
2	a	Describe CO2 Process.	5M
	b	What do you understand by external hot tears? How they are caused?	5M
		OR	
3		Describe the defects in casting?	5M
	b	Sketch and explain different types of patterns used in foundry.	5M
		UNIT-II	
4	a	Write short notes on submerged arc welding and write its applications.	5M
	b	Write short note on Heat Affected Zone (HAZ) in welding.	5M
		OR	
5	a	Explain the working of oxy acetylene gas welding.	5M
	b	Explain the working of submerged Arc welding briefly.	5M
		UNIT-III	
6	a	Explain hot working process with, applications& limitations	5M
		Explain cold working process with applications& limitations	5M
		OR	
7	a	What is closed, impression die forging? Give its processes	6M
		What are the characteristics of forging processes? Write Processes	4M
		UNIT-IV	
8	a	What are the types of shearing?	<b>6M</b>
		Sketch& explain the Drawing operation.	4M
		OR	
9	a	Write short notes on Introduction of explosive forming with	its 5M
		applications.	
	b	Explain the Magnetic pulse forming operations.	5M
	~	UNIT-V	
10		Explain the working principles and application of Transfer Moulding.	10M
10		OR	IUIVI
11	a	Explain the various methods of Bonding of Thermoplastics	5M
11		What are the major considerations in the design of plastic parts?	5M
	IJ	what are the major considerations in the design of plastic parts?	31/1