

GOVT. POLYTECHNIC MAYURBHANJ

ACADEMIC SESSION-2022-23

LESSON PLAN

Discipline : Mechanical ENGG.		Semester: 3rd Sem	Name of the Teaching Faculty : Mihir mohanta
SUBJECT- Production Technology		No. of Days / per week class allotted :	Semester From date : 15.09.2022 To Date : 21.01.2023
MONTH	Week	Day	Topics
SEPTEMBER	3RD	4TH	1. Metal Forming Processes: Discuss about metal forming process
		5TH	Extrusion: Definition & Classification
	4TH	1ST	Differentiate between cold rolling and hot rolling process, List the different types of rolling mills used in Rolling process
		1ST	List the different types of rolling mills used in Rolling process
		4TH	Revision
	5TH	5TH	2.Welding : Define welding and classify Various welding processes. Explain fluxes used in welding
		1ST	Explain Oxy-acetylene welding process.
		1ST	Explain various types of flames used in Oxy-acetylene welding process.
		4TH	Explain Arc welding process.
		5TH	Specify arc welding electrodes
OCTOBER	3RD	1ST	Define resistance welding and classify it, Describe various resistance welding processes such as butt welding, spot welding,
		1ST	Describe flash welding, projection welding and seam welding
		4TH	Explain TIG and MIG welding process
		5TH	State different welding defects with causes and remedies.
	4TH	1ST	Revision
		1ST	Revision
		4TH	Class test-1
		5TH	Class test-1
	5TH	4TH	3.Casting : Define Casting and Classify the various Casting processes
		5TH	Explain the procedure of Sand mould casting and different types of molding sands with their composition and properties.
1ST	4TH	4TH	Classify different pattern and state various pattern allowances
		5TH	Classify core.
	1ST	1ST	Describe construction and working of cupola
		1ST	Explain die casting method.

NOVEMBER	2ND	4TH	Explain centrifugal casting such as true centrifugal casting, centrifuging with advantages, limitation and area of application.
		5TH	Explain various casting defects with their causes and remedies
	3RD	1ST	Revision
		1ST	Revision
		4TH	4. Powder Metallurgy: Define powder metallurgy process.
		5TH	State advantages of powder metallurgy technology technique
	4TH	1ST	Describe the methods of producing components by powder metallurgy technique.
		1ST	Describe the methods of producing components by powder metallurgy technique.
		4TH	Explain sintering.
		5TH	Economics of powder metallurgy.
5TH	1ST	Revision	
	1ST	Revision	
DECEMBER	1ST	4TH	5.Press Work: Describe Press Works
		5TH	Describe Press Works: blanking, piercing and trimming.
	2ND	1ST	List various types of die and punch
		1ST	Explain simple, Compound ,Explain Progressive dies
		4TH	Describe the various advantages & disadvantages of above dies
		5TH	Describe the various advantages & disadvantages of above dies
	3RD	1ST	Revision
		1ST	Revision
		4TH	Internal Exam
		5TH	Internal Exam
	4TH	1ST	Jigs and fixtures: Discuss about Jigs and Fixture
		1ST	Define jigs and fixtures
		4TH	State advantages of using jigs and fixtures, State the principle of locations
5TH		State advantages of using jigs and fixtures, State the principle of locations	
JANUARY	1ST	1ST	Describe the methods of location with respect to 3-2-1 point location of rectangular jig
		1ST	Describe the methods of location with respect to 3-2-1 point location of rectangular jig
		4TH	Describe the methods of location with respect to 3-2-1 point location of rectangular jig
		5TH	Revision
	2ND	1ST	Revision
		1ST	Revision
		3RD	Classtest-2
		5TH	Revision

3RD	1ST	Revision
	1ST	Previous Year Question Discussion
	4TH	Previous Year Question Discussion
	5TH	Previous Year Question Discussion

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