

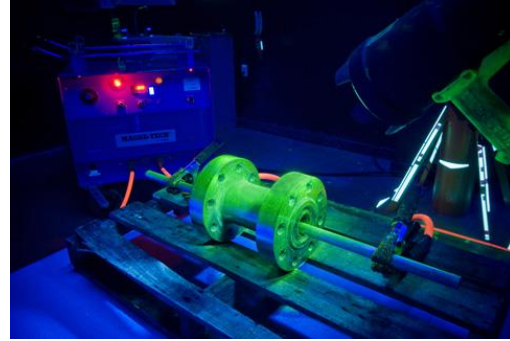


Gyanmanjari Institute of Technology (GMIT)

Mechanical Engineering Department

SDP Course Content

Name of Course : Non Destructive Testing



Course Objective:

- The objective of this short term course is to understand different methods of NDT i.e. die penetration testing, magnetic particle testing etc.
- Its usefulness in the field of quality control of the industrial product which can be analyzed without rupture of material.

Syllabus

Sr.No.	Contents	Hrs.
1.	Introduction	2
2.	Contract sensitivity, principle	2
3.	PT materials, Penetrant, Emulsifiers, Developers	2
4.	Methods and techniques	2
5.	Practical performance	2
6.	Introduction	2
7.	Magnetism, Magnetic Field, Electromagnet	2
8.	Equipments & Materials	2
9.	Practical performance	2
10.	Practical performance	2
Total Hrs.		20

Coordinator details and timing:

Course Duration	20 Hrs.
Course Coordinator	
Batch Size	20
Course Fee	NIL
Targeted Audience	4th sem student from manufacturing domain

Resource requirement:

Infrastructure requirement	Class room with projector, workshop
Hardware / Software	NIL
Consumable	Die penetrant testing kit, Kerosence, personal protractive equipments
Special Equipment	Magnetic partical testing machine, dark room

Assessment criteria

Sr. No.	Criteria	Marks
1	Test (MCQ + Numerical)	50
2	Practical Exam	50
Passing criteria: More than 50% marks in all component		

Course Outcome:

- Its additional knowledge of NDT will enhance student's skills
- NDT plays a crucial role in everyday life and is necessary to assure safety and reliability.
- NDT is a Quality Assurance management tool which can give impressive results when used correctly.
- Student can appear for NDT level-2 certification.
- After getting level – 2 certification he/she can be authorized person.