



## FACULTY OF ENGINEERING & TECHNOLOGY

Effective from Academic Batch: 2022-23

**Programme:** Bachelor of Technology (Electrical Engineering)

**Semester:** V

**Course Code:** 202090522

**Course Title:** Project Management

**Course Group:** Open Elective-II

**Course Objectives:** The course is intended to impart basic skills of Project management & its various aspects to undergraduate students.

### Teaching & Examination Scheme:

Contact hours per week			Course Credits	Examination Marks (Maximum / Passing)					
Lecture	Tutorial	Practical		Theory		J/V/P*		Total	
				Internal	External	Internal	External		
3	0	0	3	50 / 18	50 / 17	--	--	100 / 35	

\* J: Jury; V: Viva; P: Practical

### Detailed Syllabus:

Sr.	Contents	Hours
1	<b>Initiating and Planning Projects</b> Definition of project, Identification of the key characteristics of a project and primary project constraints, Role and responsibilities of the project manager, Project Organizational Structures, Definition of a project stakeholder, Definition of responsibility for managing stakeholders and controlling their engagement, Purpose of using a project charter, Key elements of a project plan, Scope statement ,Work Breakdown Structure (WBS),Difference between authority and influence ,Identification of common sources of conflict within a project environment.	8
2	<b>Budgeting the Project</b> Methods of budgeting, Cost estimating, Improving Cost Estimates, Budget Uncertainty and risk management	6
3	<b>Scheduling the Project</b> PERT and CPM Networks, Project uncertainty and risk management, Simulation, The Gantt chart, Extensions to PERT/CPM	15



<b>4</b>	<b>Resources allocation to the project</b> Expediting a Project, Resource Loading, Resource Leveling, Allocating Scarce resources to projects, Allocating several resources to the several projects, Goldratt's critical chain	<b>6</b>
<b>5</b>	<b>Monitoring and Controlling the Project</b> The plan-monitor-control cycle, Data collection and reporting, Earned value, Project control, Designing the control system, Scope creep and change control	<b>6</b>
<b>6</b>	<b>Evaluating and Terminating the Project</b> Evaluation, Project Auditing, Project Termination	<b>4</b>
		<b>Total</b> <b>45</b>

#### Reference Books:

<b>1</b>	Project Management in Practice by Jack R. Meredith, Scott M. Shafer, Samuel J. Mantel, Jr. , (WILEY)
<b>2</b>	Project Management and Appraisal by Sitangshu Khatua (Oxford)
<b>3</b>	A Guide to the Project Management Body of Knowledge , Project Management Institute, Inc. Pennsylvania

#### Supplementary learning Material:

<b>1</b>	NPTEL Resources
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#### Pedagogy:

- Direct classroom teaching
- Audio Visual presentations/demonstrations
- Assignments/Quiz
- Continuous assessment
- Interactive methods
- Course Projects

#### Internal Evaluation:

The internal evaluation comprised of written exam (40% weightage) along with combination of various components such as Certification courses, Assignments, Mini Project, Simulation, Model making, Case study, Group activity, Seminar, Poster Presentation, Unit test, Quiz, Class Participation, Attendance, Achievements etc. where individual component weightage should not exceed 20%.

#### Suggested Specification table with Marks (Theory) (Revised Bloom's Taxonomy):

Distribution of Theory Marks in %						R: Remembering; U: Understanding; A: Applying; N: Analyzing; E: Evaluating; C: Creating
R	U	A	N	E	C	

Note: This specification table shall be treated as a general guideline for students and teachers. The actual distribution of marks in the question paper may vary slightly from above table.



## Course Outcomes (CO):

Sr.	Course Outcome Statements	%weightage
CO-1	Learning how to initiate and plan projects	19
CO-2	Understanding of budgeting and scheduling of project	44
CO-3	Learning how to allocate resources to techniques	14
CO-4	Monitoring and Controlling the Project	14
CO-5	Evaluating and Terminating the Project.	09

## Curriculum Revision:

Version:	2.0
Drafted on (Month-Year):	June-2022
Last Reviewed on (Month-Year):	--
Next Review on (Month-Year):	June-2025