IMT- 26

PROJECT MANAGEMENT

Notes:
   a.   Write answers in your own words as far as possible and refrain from copying from the text books/handouts.
   b.   Answers of Ist Set (Part-A), IInd Set (Part-B), IIIrd Set (Part – C) and Set-IVth (Case Study) must be sent together.
   c.   Submit the assignments in IMT CDL H.O. along with the assignments Question Papers for evaluation .
   d.   Only hand written assignments shall be accepted.

A. First Set of Assignments	5 Questions, each question carries 1.5 marks.
B. Second Set of Assignments	5 Questions, each question carries 1.5 marks.
C. Third Set of Assignments	5 Questions, each question carries 1.5 marks. Confine your answers to 150 to 200 Words.
D. Forth Set of Assignments	Two Case Studies : 7.5 Marks. Each case study carries 3.75 marks.

SECTION - A

1. What are the characteristics of the project? What are the main sources of risk in any project?

2. Explain in detail the concept of Project Planning, Analysis and Control.

3. What is synergy? How can a company lay foundation for generation of ideas that create synergy for value enhancement.

4. Explain the relationship between project classification and organization for project management.

5. What is Situation Analysis? For an Economy passenger Car Project , what critical Success factors would be Important?

SECTION - B

1. What is technical analysis? List various inquiries that must be carried out during technical analysis?

2 .A company has borrowed a sum of Rs.1500/- at an interest rate of 15% per year. Interest is payable every year and the principal sum at the end of five years from now. The applicable tax rate is 35%.What is the cost of borrowing?

3. Explain the process of developing a cut off rate for the project.

4. Following is the data of a project cash flow estimated by a firm:

Year	Cash Flow
0	25000
1	(10000)
2	(10000)
3	(7000)
4	(5000)

a. Calculate IRR of this project

b. Would you accept this project or reject it on financial grounds.

5. Explain various approaches to risk mitigation. How would you explain the term "Attitude towards risk.

SECTION - C

1. Explain in detail the activities and Importance of resource planning in project management. Highlight the relationship between resource planning and network analysis.

2. What is integration management? Explain its significance in the context of project management.

3. What are the main challenges in Project control function? What is dynamic response cycle?

4. Why is PCA required? Explain various techniques of Post Completion Audit?

5. As a first time entrepreneur , what issues would you face in choosing a form of business and in finding access to capital? Explain .

CASE STUDY - 1

Sona Limited is a leading manufacturer of automotive components. It supplies to the original equipment manufacturers as well as the replacement market. Its projects typically have a short life as it introduces new models periodically.

You have recently joined Sona Limited as a financial analyst reporting to Suresh Gopal, the CFO of the company. He has provided you the following information about three projects, A, B, and C, that are being considered by the Executive Committee of Sona Limited:

Project A is an extension of an existing line. Its cash flow will decrease over time.

Project B involves a new product. Building its market will take some time and hence its cash flow will increase over time.

Project C is concerned with sponsoring a pavilion at a Trade Fair. It will entail a cost initially which will be followed by a huge benefit for one year. However, in the year following that a substantial cost will be incurred to raze the pavilion.

The expected net cash flows of the three projects are as follows.

Year	Project A	Project B	Project C
0	(5000)	(5000)	(5000)
1	3500	1000	15000
2	2500	3000	(10000)
3	1500	4000	--

Suresh Gopal believes that all the three projects have risk characteristics similar to the average risk of the firm and hence the firm's cost of capital, viz. 12 percent, will apply to them.

You are asked to evaluate the projects.

a) What is payback period and discounted payback period? Find the payback periods and the discounted payback periods of Projects A and B.
b) What is net present value (NPV)? What are the properties of NPV? Calculate the NPVs of projects A, B, and C.
c) What is internal rate of return (IRR)? What are the problems with IRR? Calculate the IRRs for Projects A, B, and C.

CASE STUDY - 2

Consider a small project that involves the following activities.

	Preceding	Completion Times (days)		
Activity	Activity	Optimistic	Most Likely	Pessimistic
a	-	5	6	7
b	-	4	5	18
c	a	4	15	20
d	b,c	3	4	5
e	a	16	17	18

(a) Determine the expected value and the variance of the completion time for each activity.

(b) Use the expected times from (a) to find the critical path.

(c) Assuming that the normal distribution applies, determine the probability that the critical path will take between 18 and 26 days to complete.

(d) How much time must be allowed to achieve a 90% confidence of timely completion?