

# ***Project Profiling and Structuring***

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# PROJECT STRUCTURING

- **MARKET ANALYSIS**
- **TECHNICAL ANALYSIS**
- **FINANCIAL ANALYSIS**
- **ECONOMIC ANALYSIS**
- **SOCIAL COST-BENEFIT ANALYSIS**
- **ECOLOGICAL ANALYSIS**
- **RISK AND RETURN**

# MARKET ANALYSIS

- **Consumption trends in the past and the present consumption level**
- **Past and present supply position**
- **Production possibilities and constraints**
- **Structure of competition**
- **Cost Structure**
- **Elasticity of demand**
- **Consumer behaviour, Motivations, Preferences and Requirements**
- **Administrative, Technical and Legal Constraints**

# TECHNICAL ANALYSIS

- Preliminary tests and studies
- Availability of materials, power and other inputs
- Optimal selected scale of operation
- Suitable construction process
- Identification of appropriate equipment and machines
- Selection of auxiliary equipment and supplementary engineering works
- Provision for the treatment of effluence
- Sound layout of sites, buildings, plant, etc.
- Realistic schedules of work
- Selection of appropriate technology

# **FINANCIAL ANALYSIS**

- **Investment outlay and cost of project**
- **Means of financing**
- **Projected profitability**
- **Break-even point**
- **Cash flows of the project**
- **Investment worthwhileness judged in terms of various criteria of merit**
- **Projected financial position**
- **Level of risk**

# FINANCIAL ANALYSIS

- **Realistic Estimation of all Capital Costs,**
- **Realistic Estimation of Revenue,**
- **Realistic Estimation of O & M Costs,**
- **Realistic Estimation of Savings (if any),**
- **Formulation of Cash Flow Statement,**
- **Assessment of Project FIRR, etc.**
- **Assessment of Gestation Period,**
- **Application of PERT & CPM methods, etc.**

# ECONOMIC ANALYSIS

- To quantify direct economic benefits and costs of the project,
- Impact of the project on the distribution of income in the economy,
- Impact of the project on the level of savings and investment in the economy,
- Contribution of the project towards self-sufficiency, employment, etc.
- Loss to the economy due to the project.

# **SOCIAL COST-BENEFIT ANALYSIS**

- **Judging the project from a larger social point of view**
- **Social order**
- **Rehabilitation programme and costs**

# **ECOLOGICAL ANALYSIS**

- **Likely damage caused by the project to the environment**
- **Cost of restoration / rehabilitation, measures, etc.**

# RISK AND RETURN

- **Uncertainties**
- **SWOT ANALYSIS (i.e., Strength, Weakness, Opportunity, Threat Analysis).**

# **PROJECT PROFILING**

***PLANNING***

***ANALYSIS***

***SELECTION***

***FINANCING***

***IMPLEMENTATION***

***REVIEW***

# PROJECT PROFILING

## Planning

- Once a project proposal is identified, it needs to be examined – Feasibility Study – includes whether the project is *prima facie* worthwhile to justify Feasibility Study.

# PROJECT PROFILING

## Analysis

- If the project is found *prima facie* worthwhile – a detailed analysis needs to be done on :
  - **Marketing**
  - **Technical**
  - **Financial**
  - **Economic and**
  - **Ecological Aspects.**

# PROJECT PROFILING

## Selection

Following are the primary criteria considered with selection :

Criterion	Accept	Reject
Payback period (PBP)	$PBP < \text{target period}$	$PBP > \text{target period}$
Accounting rate of return	$APR > \text{target rate}$	$APR < \text{target rate}$
Net Present Value (NPV)	$NPV > 0$	$NPV < 0$
Internal Rate of Return (IRR)	$IRR > \text{cost of capital}$	$IRR < \text{cost of capital}$

These criteria are essentially a function of the mix of financing and the level of project risk.

# Financing

- Once a project is selected, suitable financing arrangements have to be made.
- Flexibility, Risk, Income, Control and Taxes (acronym FRICT) are the key business considerations that influence the capital structure, i.e., debt-equity ratio.

# Implementation

- Project and Engineering Designs
- Negotiations and Contracting
- Construction
- Training
- Commissioning

# Review

- Once the project is commissioned – performance review should be done to compare actual performance with projected performance.



■ **Any More Questions please ?**

**THANK YOU FOR BEING WITH ME  
IN THIS SESSION.**