Total Marks: 100 **Paper Code: BMHDE2154F**

INVESTMENT AND PORTFOLIO MANAGEMENT

Course Objective:

The aim of this course is to provide a conceptual framework for analysis from an investor's perspective of maximizing return on investment – a sound theoretical base with examples and References: related to the Indian financial system.

Learning Outcomes:

On successful completion of the course students will be able to

1. Value financial assets such as stocks and bonds
2. Measure the risk and return of a stock or a portfolio position
3. Understand and evaluate investment advice from brokers and the financial press

Detailed Syllabus:

Unit 1.1: Basics of Risk and Return **(5L+8L+5L=18L)**

- Concept of returns, application of standard deviation, coefficient of variation, beta, alpha.

Unit 1.2: Bonds

- Present value of a bond, yield to maturity, yield to call, yield to put, systematic risk, price risk, interest rate risk, and default risk. Yield curve and theories regarding shape of yield curve. Unsystematic risk and non-risk factors that influence yields. Duration and modified duration, immunization of a bond portfolio

Unit 1.3: Fundamental Analysis

- EIC framework; Economic analysis: Leading lagging & coincident macro-economic indicators, Expected direction of movement of stock prices with macroeconomic variables in the Indian context; Industry analysis: stages of life cycle, Porter's five forces model, SWOT analysis, financial analysis of an industry; Company analysis.

Unit: 2.1: Share Valuation **(5L+10L+5L=20L)**

- Dividend discount models- no growth, constant growth, two stage growth model, multiple stages; Relative valuation models using P/E ratio, book value to market value.

Unit 2.2: Technical Analysis

- Meaning, assumptions, difference between technical and fundamental analysis; Price indicators- Dow Theory, advances and declines, new highs and lows- circuit filters. Volume indicators- Dow Theory, small investor volumes. Other indicators- futures, institutional activity, Trends: resistance, support, consolidation, momentum- Charts: line chart, bar chart, candle chart, point & figure chart. Patterns: head & shoulders, triangle, rectangle, flag, cup & saucer, double topped, double bottomed, Indicators: moving averages. Concept of Relative Strength Index (RSI)

Unit 2.3: Efficient Market Hypothesis

- Concept of efficiency: Random walk, three forms of EMH and implications for investment decisions. (No numerical in EMH and technical analysis)

Unit 3: Portfolio Analysis (10L)

- Portfolio risk and return, Markowitz portfolio model: risk and return for 2 and 3 asset portfolios, concept of efficient frontier & optimum portfolio. Revision of Covariance, Standard Deviation and Correlation.

- Market Model: concept of beta systematic and unsystematic risk. Investor risk and return preferences: Indifference curves and the efficient frontier,

- Traditional portfolio management for individuals: Objectives, constraints, time horizon, current wealth, tax considerations, liquidity requirements, and anticipated inflation, Asset allocation: Asset allocation pyramid, investor life cycle approach, Portfolio management services: Passive- Index funds, systematic investment plans. Active - market timing, style investing.

Unit 4.1: Capital Asset Pricing Model (CAPM) (7L+10L=17L)

- Efficient frontier with a combination of risky and risk free assets. Assumptions of single period classical CAPM model, Sharpe Index model, Characteristic line, Capital Market Line, Security market Line. Expected return, required return, overvalued and undervalued assets, Understanding Sharpe Ratio and Alpha.

Unit 4.2: Mutual Funds

- Introduction, classification of mutual fund schemes by structure and objective, advantages and disadvantages of investing through mutual funds. Calculation of Net Asset Value(NAV) of a Fund; Calculation of if return is reinvested and if return is not reinvested; Calculation of Absolute return, Annualized return, Total return; Performance Evaluation using Sharpe's Treynor's and Jensen's measures.

Unit 5: Derivatives (5L)

- Concept of forwards, futures, swaps and options

References:

1. Fischer, D.E. & Jordan, R.J.: Security Analysis & Portfolio Management, Pearson Education.
2. Sharpe, W.F., Alexander, G.J. & Bailey, J.: Investments, Prentice Hall of India.
3. Singh,R: Security Analysis & Portfolio Management . Excel Books.
4. Frank K Reilly & Keith C Brown: Investment Analysis and Portfolio Management, Cenage India Pvt. Ltd.
5. P Chandra, Investment Analysis and Portfolio, McGraw Hill Education India Pvt. Ltd.