## Department of Commerce M.Com.

CMS556: Optional (FMAIS): PORTFOLIO MANAGEMENT

Work load: 3 hours lecture and 2 hours tutorial per week: total 4 credits

## **Learning Objectives:**

• The objective of this course is to provide students with an insight of constructing and managing portfolio.

## **Course Outcomes:**

- 1. Explains the usefulness of the fundamental and technical analysis and makes aware of the various portfolio management techniques.
- Unit-1: Portfolio Construction: Markowitz Model Efficient Frontier Graphical Presentation Portfolio Diversification Indifference curves Utility Analysis. Sharpe"s Single Index Model Diversification Constructing Optimal Portfolio.
- Unit-2: Capital Market Theory: Capital Asset Pricing Model (CAPM): Assumptions of CAPM Risk Free Asset Risk Free Lending and Borrowing Capital Market Line (CML) Security Market Line (SML) Shifts in Security Market Line Empirical tests of CAPM Zero Beta Version of CAPM Imposing Restrictions on Risk Free borrowing Consumption Oriented CAPM, Multi Beta CAPM.
- **Unit-3**: **Factor Models**: Factor Models and Return Generating Process One Factor Models Multiple Factor Models Sector Factor Models Factor Models and Equilibrium.
- **Unit-4: Arbitrage Pricing Theory** Principle of Arbitrage-Constructing Arbitrage Portfolios-Pricing effects and interpreting APT Pricing Equation-Synthesis of APT and CAPM.
- Unit-5: Portfolio Performance Evaluation and Portfolio Revision: Measures of Return- Rupee Weighted Returns, Time Weighted Returns- Risk Adjusted Measures of Performance-Sharpe's measure, Treynor's measure, Jensen's measure and Fama's measure- Portfolio Revision- Formula Plans.

## **References:**

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- 3. Sharpe William F, Alexander Gordon J, Bailey Jeffrey V, Investments, (PrenticeHall)
- 4. Stevenson R.A. and Jennings E H, Fundamentals of Investments, (West PublishingCompany)
- 5. Luenberger David G, Investment Science, (Oxford UniversityPress)
- 6. Bolten Steven E, Security Analysis and Portfolio Management, (Holt, Rinehart and Winston)
- 7. Christy George A and Clendenin John C, Introduction to Investments, (McGrawHill)
- 8. Jones Charles P, Tuttle Donald L and Heaton Cherril, Essentials of Modern Investments, (Ronald Press Company, NY)
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- 11. Rebell L Arthur and Gordon Gail, Financial Futures and Investment Strategy, (Dow Jones IrwinIllinois)
- 12. Sheimo Michael D, Using Dow Theory, (VisionBooks)
- 13. Levy Haim and Sarnat Marshall, Investment and Portfolio Analysis, (Wiley Series in Finance)
- 14. Francis Jack Clark and Archer Stephen, Portfolio Analysis, (McGraw Hill series in Finance)
- 15. Van Horne James C, Financial Management and Policy, (PrenticeHall)
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- 17. Fischer Donald E and Jordan Ronald J, Security Analysis and Portfolio Management, (Prentice Hall)
- 18. Bodie Zvi, Kane Alex, Mrcus J Alan, Investments, (McGrawHill/Irwin)
- 19. Martin J Pring, Technical Analysis Explained, (McGrawHill)
- 20. Machiraju, Indian Financial System, (Vikas PublishingHouse)
- 21. Machiraju, The Working of Stock Exchanges in India, (Wiley)