

**NPTEL**

**Course Name: Security Analysis and Portfolio Management**

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**Session 35: Bond Portfolio Management Strategies-I**

1. What are the different types of Bond Portfolio Management Strategies?

Ans.

Alternative Bond Portfolio Strategies:

- **Passive portfolio strategies:** Buy and hold, Indexing. Buy and hold strategy simply involves buying a bond and holding it until maturity. Bond investors would examine such factors as quality ratings, coupon levels, terms to maturity, call features and sinking funds. Indexing involves attempting to build a portfolio that will match the performance of a selected bond portfolio index
- **Semi-Active Management Strategy:** It refers to bond portfolio management techniques that are used to service a prescribed set of liabilities. It can be Pure Cash Matched Dedicated Portfolios (a conservative approach) or Dedication With Reinvestment or can be both.
- **Active management strategies:** Potential sources of return from fixed income portfolio: Coupon income, Capital gain, Reinvestment income. Fundamental active strategies includes, Interest rate expectations strategy, Yield Curve strategies, Valuation analysis, Credit analysis, use of Bond swaps
- **Matched-funding techniques:** Horizon matching. It is a combination of cash-matching dedication and immunization. Important decision is the length of the horizon period

2. Write a short note on Immunization.

Ans.

The immunization technique attempts to derive a specified rate of return during a given investment horizon regardless of what happens to market interest rates.

Conditions for Immunizations:

- The Present value of the liabilities should be equal to present value of assets
- Duration of assets should be equal to duration of liabilities
- Convexity of assets in the portfolio should be greater than the convexity of liabilities

Immunization Strategies:

- Components of Interest Rate Risk: Price Risk, Coupon Reinvestment Risk
- Immunization is neither a simple nor a passive strategy. An immunized portfolio requires frequent rebalancing because the modified duration of the portfolio always should be equal to the remaining time horizon (except in the case of the zero-coupon bond)

1. Explain Indexing Strategy of Passive portfolio management.

Ans.

Its objective is to construct a portfolio of bonds that will equal the performance of a specified bond index. Performance is measured in terms of total return realized over the investment horizon

Advantages of Indexing Strategy:

- Poor and inconsistent performance of active bond portfolio managers
- Lower transaction cost
- Degree of control exercised by the investor

Factors affecting the Selection of the Index: Investor's Risk tolerance, Investment Objectives and Constraints imposed by the regulator.

Indexing Methodologies:

- Methods of Construction: Stratified sampling or Cellular Approach, Optimization Approach, Variance Minimization Approach
- Utmost care must be taken to minimize the tracking error caused by : Transaction costs in construction of the index, Differences in the composition of the indexed portfolio and the index itself, Discrepancies between prices used by the organization constructing the index and the transaction prices paid by the index manager