Portfolio Management

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Portfolio Management

(BFM Third Year : Fifth Semester)

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Preface

It is a matter of great pleasure to present first edition of the book on ***Portfolio Management*** to the students and teachers of Bachelor of Commerce – Financial Market course started by University of Mumbai. This book is written on lines of syllabus instituted by the University. The book presents the subject matter in a simple and convincing language.

I owe a great many thanks to a great many people who helped and supported me during the writing of this book which includes Principal, Co-coordinator, and students of K.M. College, DAV, Ratnam College, K.J. Somaiya, Vivekananda Education Society, Vikas College, R.J. College of the B.Com. BBI, BMS, BAF and BFM Section.

My deepest thanks to Mr. Manoj Sharma of the Nitin Godiwala College who has given strength to me always.

I would also thank all of them who have been a part of this and helped me knowingly or unknowingly. I also extend my heartfelt thanks to my family and well-wishers without whom this would have been a distant reality.

Rajiv Mishra

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	OR	
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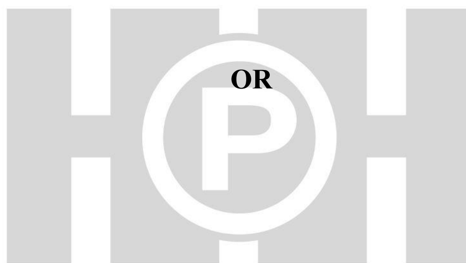

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WHAT IS SECURITY?

A security means a document that gives its owner a specific claim of ownership of a particular financial asset. Financial market provide facilities for buying and selling of financial claims and services. Thus, securities are financial instruments which are bought and sold in the financial market for investment. The important financial instruments are shares, debentures, bonds, etc. Other financial instruments are also known as securities such as Treasury Bills, Mutual Fund Units, Fixeds Deposits, Insurance Policies, Post Office Savings like National Savings Certificates, Kisan Vikas Patras, Public Provident Funds, etc. Some of these securities are transferable while some of them are not transferable.

INVESTMENT AVENUES

Varieties of investment avenues are available in India. An investor can himself select the best avenue after studying the pros and cons of different alternatives. Even financial advertising, newspaper supplements on financial matters and investment journals offer guidance to investors in the selection of suitable investment avenues. The following investment avenues are popular and used extensively in India:

(1) **Investment in shares, debentures and bonds** of different types issued by companies, corporations and public sector organizations.

(2) Postal savings schemes.

(3) **PF, PPF and other tax shelter savings schemes** such as National Savings Schemes, National Savings Certificates and Tax Saving Schemes of LIC, ICICI, Infrastructure Bonds and so on.

(4) **Investment in investment intermediaries** such as UTI and mutual funds run by LIC, banks and HDFC, etc.

(5) **Deposits in companies**, (Public deposits) or deposits in public sector organizations and banks.

(6) **Life insurance investment, i.e., investment** in different life policies such as whole life policy, endowment policy and so on.

(7) Investment in gold, silver, precious metals and antiques.

(8) Investment in real estates.

(9) **Investment in Gilt-edged securities** and securities of Government and Semi-government Organizations (e.g., Relief Bonds, Bonds of Port Trust, Treasury Bills, etc.)

It may be noted that there are some avenues/investment schemes where tax benefits are available. Such schemes are called tax savings schemes of investment. The tax liability reduces when investment is made in such schemes. The schemes are decided by government and announced along with the annual budget. The basic purpose of such schmes is to encourage investment in certain investment avenues. In some schemes, the enire investment is made tax free, i.e., it is deducted from yearly taxable income.

Popular tax savings investment schemes are as noted below:

(1) Public Provident Fund (PPF)

(2) Tax Sheltered saving schemes of post office such as, NSC, NSS, etc.

(3) Investment in infrastructure bonds of IDBI, ICICI.

(4) Life insurance schemes where insurance premium is given tax benefit.

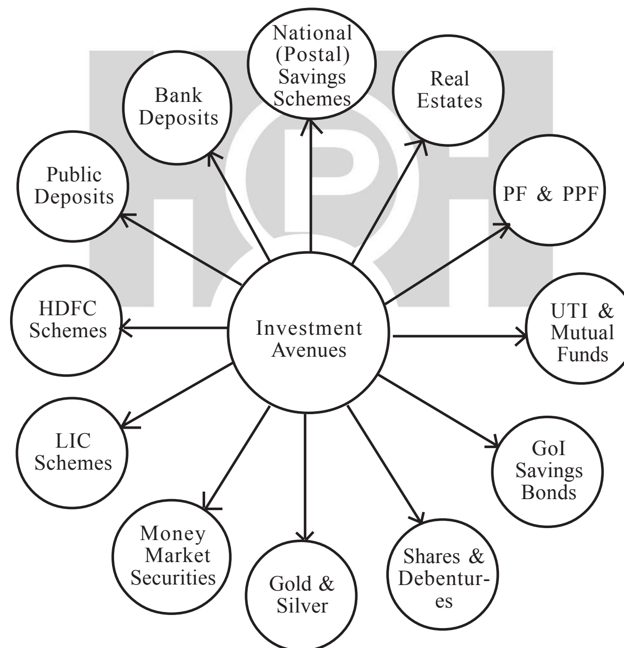
(5) Investment in mutual funds. Here, the tax benefit relates to income earned through such investment.

(6) Investment in Residential House Principal as well as interest provide tax benefit.

(7) Investment in pension plan of Life Insurance Companies.

(8) Mediclaim, i.e., Health Insurance.

The following figure indicates alternative avenues for investment.



INVESTMENT TRAITS

Every investor has certain specific objectives to achieve through his long-term/short-term investment. Such objective may be monetary/financial or personal in character. The objective include safety and security of the funds invested (principal amount), profitability (through interest, dividend and capital appreciation) and liquidity (convertibility into cash as and when required). These objectives are universal in character as every investor will like to have a fair balance of these three financial

objectives. An investor will not like to take undue risk about his principal amount even when the interest rate offered is extremely attractive. These objectives or factors are known as investment attributes.

There are personal objectives which are given due consideration by every investor while selecting suitable avenues for investment. Personal objectives may be like provisions for old age and sickness, provisions for house construction, provisions for education, marriage of children and finally provisions for dependence including wife, parents or physically handicapped member of the family.

Investment avenues selected should be suitable for achieving both the objectives decided. Merits and demerits of various investment avenues need to be considered in the context of such investment objectives.

(1) Period of Investment:

Period of investment is one major consideration while selecting avenues for investment. Such period may be short (up to 1 year), medium (1 to 3 years) or long (more than 3 years). Return/rate of interest is normally more in the case of longer term investment, while it is the less in the shorter period investment. The period of investment relates to liquidity, an investor has to decide when he needs money back and adjust the period accordingly. LIC policy is an investment for a very long period.

(2) Risk in Investment:

Risk is another factor which needs careful consideration while selecting the avenue for investment. Risk is the normal feature of every investment as an investor has to part with his money immediately and has to collect it back with some benefit in due course. The risk may be more in some investment avenues and less in other.

The risk in the investment may be related to nonpayment of principal amount or interest thereon. In addition liquidity risk, inflation risk, market risk, business risk, political risk, etc., are some more risk connected with the investment made. The risk in the investment depend on various factors. For example, the risk is more if period of maturity is longer and *vice versa.* In addition the risk is less if the borrower is creditworthy or the agency issuing security is creditworthy. The objective of investor should be minimize the risk and to maximize the return out of the investment made.

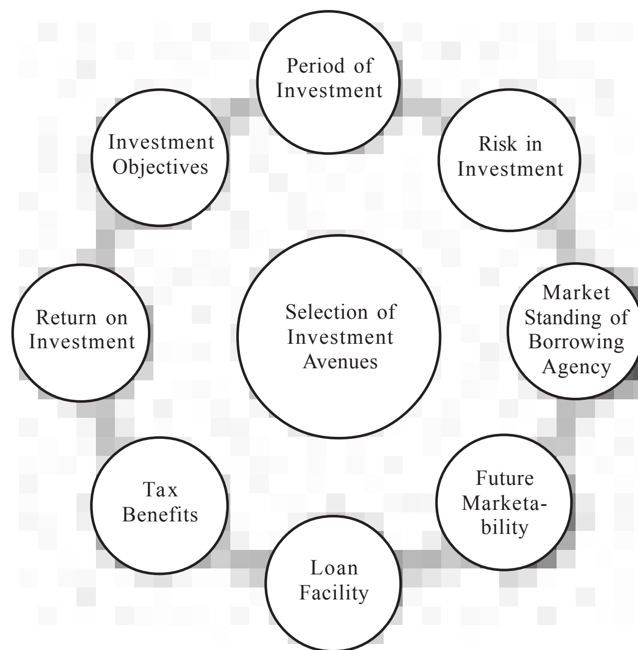
COMPARISON OF INVESTMENT AVENUES

Selecting of suitable avenue for investment depends in various factors. An integrated approach on the part of an investor is necessary in this regard. An investor also needs proper education, training and guidance for the selection of most convenient avenues for his investment. It is a delicate decision which needs knowledge, judgement and vision.

Investment decision need flexibility as per the situation in the capital and money market. They also need periodically review for suitable adjustment. And investor has to review the investment

portfolio and make suitable adjustment in the same periodically. Investment made in a particular avenue may become risky or unremunerative after a period of five or ten years. Such investment avenue needs to be replaced by selecting a better avenue. This suggests the importance of flexibility in investment decision. The following points are considered for selecting suitable investment avenue.

INVESTMENT OBJECTIVES



Investment is a widespread practice and many have made their fortunes the process. The starting point in this process is to determine the characteristics of the various investment and then matching them with the individuals need and preferences. All personal investing is designed in order to achieve certain objectives. These objectives may be tangible such as buying a car, house, etc., and intangible objectives such as social status, security, etc. Similarly; these objective may be classified as financial or personal objectives. Financial objectives are safety, profitability and liquidity. Personal or individual objectives may be related to personal characteristics of individual such as family commitments, status, etc.

The objectives can be classified on the basis of the investors approach as follows:

(a) Short-term high priority objectives: Some investors have high priority towards achieving certain objectives in short time. For example, a young couple will give high priority to buy a house.

(b) Long-term high priority objectives: Some investors look forward and invest on the basis of objectives of long-term needs. They want to achieve financial independence in long period. For example, investing for post-retirement period or education of child, etc.

(c) **Low priority objectives:** These objectives have low priority in investing. These objectives are not painful. After investing in high priorities assets, investors can invest in these low priority assets. For example, provision for tour, domestic appliance, etc.

(d) **Money making objectives:** Investors put their surplus money in this kind of investment. Their objective is to maximize wealth. Usually, the investors invest in shares of companies which provides capital appreciation apart from regular income from dividend.

INVESTMENT AND SPECULATION

"Speculation, is an activity, quite contrary to its literal meaning, in which a person assumes high risks, often without regard for the safety of his invested principal, to achieve large capital gains." The time span in which the gain is sought to be made is usually very short.

Investment involves putting money into an assets which is not necessarily in order to enjoy a series of returns. The investor sacrifice some money today in anticipation of a financial return in future. He indulges in a bit of speculation. There is an element of speculation involved in all investment decisions. However, it does not mean that all investment are speculative by nature. Genuine investments are carefully thought out decisions. On the other hand speculative investments, are not carefully thought out decisions. They are based on tips and rumours.

An investment can be distinguished from speculation in three ways–risk, capital gain and time period. Risk has definite financial meaning it is a possibility of incurring a loss in a financial transaction. Investment involves limited risk while speculation is considered as an investment of funds with high risk. Speculation involves buying a security at a low price and selling at a high price to make a capital gain. Investment involves longer-term allocation of funds, whereas speculation involves holding a security for a short-term and trading quickly for earning higher gain.

Speculation involves a higher level of risk and a more uncertain expectation of return. Investments are not risk-free but the risk can be calculated. The expected return is consistent with the risk of investment.

ELEMENTS OF INVESTMENT

(a) **Return:** Investors buy or sell financial instruments in order to earn return on them. The return on investment is the reward to the investors. The return includes both current income and capital gains or losses, which arises by the increase or decrease of the security price.

(b) **Risk:** Risk is the chance of loss due to variability of returns on an investment. In case of every investment, there is chance of loss. It may be loss of interest, dividend or principal amount of investment. However, risk and return are inseparable. Return is a precise statistical term and it is measurable. But the risk is not precise statistical term.

(c) **Time:** Time is an important factor in investment. It offers several different courses of action. Time period depends on the attitude of the investors who follows a 'buy and hold' policy. As time moves on analysts believe that conditions may change and investors may revaluate expected return and risk for each investment.

FINANCIAL MARKETS

Financial system is set of complex and closely intermixes financial; institutions, markets, instruments, services, practices, and procedures. It plays a positive and important role by providing finance or credit through creation of credit in anticipation of savings. The investment financed through credit generated the appropriate level of income which in turns lead to an amount of savings which are equal to the investment already undertaken. A well developed financial system facilitates the normal production process and exchange of goods and to enlarge markets over space and time. Thus, the financial system enhances the efficiency of the function of medium of exchange and thereby helps in economic development.

Currency and exchange form an essential part of any financial system. The financial system of any country consists of specialized and non-specialized financial institutions. The financial institution are divided into banking and non-banking institution. The financial system deals with financial service and claims or financial assets.

STRUCTURE OF FINANCIAL SYSTEM

The financial system implies a set of complex and closely connected institutions, agents, practices and markets. The following is a typical structure of financial system in any economy.

(a) Financial institutions:

Financial institutions are business organizations who act as mobilizers and depositories of savings, and suppliers of credit or finance. These institutions provide various financial services to the business organization and common people. Financial institutions can be divided into banking and non-banking institutions. Banking institutions deal is financial assets such as deposits and loans, securities, etc., and non-financial institutions deal in a real assets such as-machinery, equipment, stock of goods and real estate.

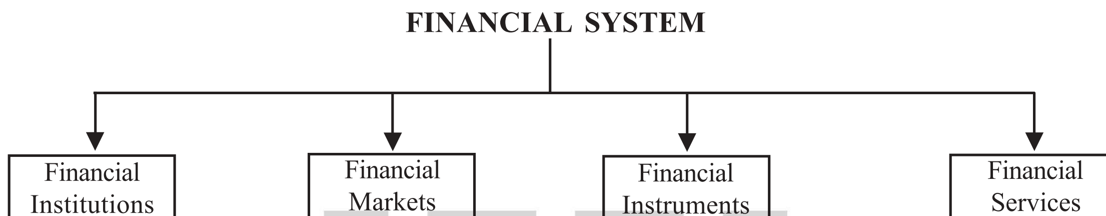
(b) Financial Markets:

Financial market are the centre which provide facilities for buying selling of financial claims and services. The participants in the financial market are financial institutions, brokers, dealers, borrowers and investors. The primary market which deals in new financial claims or instruments. It is also called as New Issue Market. The secondary market deals in securities which are already issued by the companies. Stock exchange is an example of secondary market.

Financial market are also classified as capital market and money market. The money market deals in the short-term claims with a maturity period less than a year and a capital market deals in the long-term claims securities. The financial markets may be classified as organized or unorganized, formal or informal and domestic or foreign market.

(c) Financial Instruments:

Financial instruments are claims to the payment of some of money in future or a periodic interval. For example, the important financial instruments are shares, debentures, bonds, fixed deposits, etc. These instruments are classified as primary or secondary instruments. The primary instruments are issued by the ultimate investors directly to the ultimate savers such as equity shares, debentures. Secondary instruments are issued by financial intermediaries to the ultimate savers such as bank deposits, units and insurance policies. The financial instrument differ from each other in respect of their investment characteristics. The important characteristics are liquidity, transferability, volatility, maturity, risk and return.



(d) Financial Services:

A financial services is any kind of a financial nature offered by a financial services provider. All banking and insurance related services are included in this concept. These services are intangible and invisible. These services cover a wide range of economic activity. Financial services have developed to meet the needs of companies. Banking and insurance are traditional financial services. In India, these services have started during 1980s. These services play a significant role in the changed business services.

MEANING OF PORTFOLIO

Portfolio means combined holding of many kinds of financial security that is shares, debentures, government bonds, units and other financial assets. The term investment portfolio refers to the various assets of an investor which are to be considered as a unit. It is not merely a collection of a unrelated assets but a carefully blended asset combination within a unified framework. It is necessary for investors to take all decisions as regards their wealth position in a portfolio context. Making a portfolio putting one's egg in different baskets with varying elements of a risk and return. Thus, a portfolio is a combination of various instrument of investment. It is also combination of securities with different risk return characteristics. A portfolio is built-up out of the wealth or income of the investors over a period of time with a view to manage the risk return preferences. The analysis of the risk return characteristics of individual securities in the portfolio is made from time-to-time and changes that may take place in combination with other securities are adjusted accordingly. The object of portfolio is to reduce risk by diversification and maximize gains.

PROTFOLIO MANAGEMENT

Portfolio management means selection of securities and constant shifting of the portfolios in the light of varying attractiveness of the constituents of the portfolio. It is a choice of selecting and revising spectrum of securities to it in which the characteristics of an investor. Marko Wiz analyzed the implications of the fact that the investors, although seeking high expected returns, generally wish to avoid risk. It is the basis of all scientific portfolio management. Although the expected return on a portfolio is directly related to the expected return on component securities, it is not possible to deduce a portfolio riskiness simply by knowing the riskiness of individual securities. The riskiness of portfolio depends upon the attributes of individual securities as well as the interrelationship among securities.

A professional, who manages other people's or institution's investment portfolio with the object of profitability, growth and risk minimization is known as portfolio manager. He is expected to manage the investors assets prudently and choose particular investment avenues appropriate for particular times aiming at maximization of profit. Portfolio management includes portfolio planning, selection and construction, review and evaluation of securities. The skill in portfolio management lies in achieving a sound balance between the objectives of safety, liquidity and profitability.

Timing is an important aspect of portfolio revision. Ideally, investors should sell at market tops and buy at market bottoms. They should be guarded against buying at high prices and selling at low prices.

PORTFOLIO MANAGEMENT PROCESS

Portfolio management is a dynamic process which involves the following basic steps:

(a) Identification of the objectives, constraints and preferences of invstors for formulation of investment policy.

(b) Develop and implement strategies in tune with investment policy formulated. It will help the selection of asset classes and securities in each class depending upon their risk return attributes.

(c) Review and monitoring of the performance of the portfolio by continuous overview of the market conditions and performance of the companies.

(d) Evaluation of the portfolio for the result to compare with targets and make some adjustments for the future.

OBJECTIVES OF PORTFOLIO MANAGEMENT

The basic objective of portfolio management is to maximize yield and minimize risk. The other objectives are as follows:

(a) **Stability of income:** An investor considers stability of income from his investment. He also considers the stability of purchasing power of income.

(b) **Capital growth:** Capital appreciation has become an important investment principle. Investors seek growth stocks which provide a very large capital appreciation by way of right, bonus and appreciation in the market price of shares.

(c) **Liquidity:** An investment is a liquid asset. It can be converted into cash with the help of a stock exchange. Investment should be liquid as well as marketable. The portfolio should contain a planned proportion of high grade and readily saleable investment.

(d) **Safety:** Safety means protection for investment against loss under reasonably variations. In order to provide safety, a careful review of economic and industry trends is necessary. In other words, errors in portfolio are unavoidable and it requires extensive diversification.

(e) **Tax incentives:** Investors try to minimize their tax liabilities from the investment. The portfolio manager has to keep a list of such investment avenues along with the return risk, profile, tax implications, yield and other return.

CONSTRUCTION OF PORTFOLIO

Portfolio construction means determining the actual composition of portfolio. It is a critical stage because asset mix is the single most determinant of portfolio performance. Portfolio construction requires a knowledge of the different aspects of securities. The components of portfolio construction are:

(a) Assets allocation meaning setting the asset mix.

(b) Securities selection involving choosing the appropriate security to meet the portfolio targets.

(c) Portfolio structure involving setting the amount of each security to be included in the portfolio.

Investing in securities presupposes risk. A common way of reducing risk is to follow the principle of diversification. Diversification is investing in a number of different securities rather than concentrating in one or two securities. The diversification assures the benefit of obtaining the anticipated return on the portfolio of securities. In a diversified portfolio some securities may not perform as expected but other securities may exceed expectations with the effect that the actual results of the portfolio will be reasonably close to the anticipated results.

APPROACHES TO CONSTRUCTION OF PORTFOLIO:

(1) Interior Decorating Approach:

Interior decorating approach is tailor-made to the investment objectives and constraints of each investor. In case of exterior building or room structure, the furnishing and interior decoration to be carried out inside the structure will depend upon the purpose for which it is to be used. Similarly, the portfolio will consists of securities which will suit the individuals investment objectives and constraints. A serious minded investor will have to consider the following important categories of investment opportunities.

(a) Protective investment: These investment protect the investors against the uncertainties in life. The life insurance policy is a good example of this type of investment opportunity.

(b) Tax oriented investment: Some investment provide tax incentives to the investors. For example, public provident fund, National Savings Certificates, etc.

(c) Fixed income investment: These investment yield a fixed rate of return on the investment. For example, investment in preference shares, debentures, bank deposits, etc.

(d) Emotional investment: These investment are made for the purpose of emotional security and satisfaction. Investors get some satisfaction from these investment. For example, investment made in house property, jewellery, household appliances, etc.

(e) Speculative investment: These investment are made for the propose of speculation. The motive behind it is to make quick gains out of fluctuations in the market. For example, investment in real estates, shares, commodity trading etc.

(f) Growth investments: These investment are made for the purpose of earning capital gains. These are not made for getting regular income. For example, investment in growth shares, real estates, land, gold, etc.

With the help of this variety of investments, we can attempt to develop a matrix for matching the individual characteristics of specific investments so that a suitable portfolio can be developed for each investor. In real life, building up a good portfolio is a simple thing. A young family which may have lot of insurance and considerable growth portfolio should add some real estate by the time it reaches the mid-street. At the middle age sets, the investors should avoid making risky and speculative investment. They should make the necessary emotional investments which will provide security and mental peace in the old-age.

(2) Markowitz Approach:

Markowitz approach provides a systematic search for optimal portfolio. It enable the investors to locate minimum variance portfolio that is portfolios with the least amount of risk for different levels of expected return. It is the process of combining assets that are less than perfectly positively correlated in order to reduce portfolio risk without sacrificing portfolio returns. It is more analytical than simple diversification because it considers corelations between assets returns for lowering risk. There are computer based packages available for determining the efficient portfolios.

PORTFOLIO COMPOSITION

The principle objective of the traditional approach is to select the portfolio of securities that most appropriately meets the investors' needs. The investor will attempt to maximize expected returns subject to the level of risk involved. The first step is to obtain the pertinent facts about the individual. This information aids the portfolio manager in portfolio objectives. If the major objective is income, the portfolio will be made up of high quality long-term bonds. If safety principle is the objective, the portfolio will be made up of high quality short-term debt instrument. Objectives for common stock portfolios are more complex and range from income to rapid appreciation.

COLLECTING THE BASIC DATA

Initially, the portfolio manager has to devote a great deal of attention to basic consideration such as pensions plans, life insurance and educational funds for children. Usually, the basic needs must be satisfied before making an investment programme. Every individual investor has a priority of expenditure. The following list of priority expenditure is probably representative.

(a) Food, clothing, housing and transportation.

(b) Life insurance.

(c) Pension plan.

(d) Savings for emergency.

(e) Investment.

Investments in securities can be considered only after basic family needs are satisfied. The type of data that can be collected about the investors includes the following items:

(a) Stated purpose for the portfolio.

(b) Age and health of the family.

(c) Marital status and responsibilities.

(d) Occupation.

(e) Approximate income, sources and expected duration.

(f) Saving habits.

(g) Property ownership.

(h) Current security holdings.

If all priority expenditures have been satisfied, the portfolio manager has greater freedom to pursue a more aggressive policy.

FORMULATING THE PORTFOLIO OBJECTIVES

The portfolio objectives can be determined by ascertain the constraints on portfolio. The greater the number of constraints and the more binding these constraints, the more conservative the portfolio must be. The following are the six possible portfolio constraints which are evaluated to determine the appropriate objectives:

(1) Need for current income to meet the living expenses.

(2) Need for constant income to face inflation.

(3) Need for safety principle to liquidate the investments on short notice.

(4) Need for safety principle to reduce the effect of purchasing power.

(5) Need for tax exemption.

(6) Temperament.

PRINCIPLES OF PORTFOLIO CONSTRUCTION

The portfolio managers have to follow certain principle while constructing a portfolio. These principles are as follows:

(1) Safety principles: The safety principles means that the portfolio must maintain its principal value in the event of forced liquidation. Normally, the investor does not want to accept a loss of principal amount of investment. There are two important considerations involved in determining the need for safety principal-tenure of ownership and the effect of inflation. If the tenure of ownership is weak, the portfolio may be liquidated to meets some contingencies. Another is the effect of rising price level on the principal invested initially in the portfolio. For this purpose, many portfolio managers attempt to hedge against inflation by including at least a portion of the portfolio in common stock.

(2) Need for income: In formulating the objective for a portfolio the starting point is usually to establish an amount of income the portfolio must generate. This involves two stages. In the first stage it is necessary to determine the amount of income that the portfolio must provide based on current conditions. The second stage is to determine how much income must be provided by the portfolio of securities, as inflation is fact of life it is necessary to estimate its impact and attempt to provide a stream of income from a security portfolio that offsets it, as well as possible.

(3) Taxation: There may be strong incentive for many investors in the high tax brackets to invest in tax-exempt securities rather than common stock it offers investors to combine a high effective yield with relatively low risk. Those investors who qualify tax exempt securities may constitute a worthwhile investment.

(4) Temperament: A higher return may be expected from a well diversified portfolio of common stock than a portfolio of bonds, some investors may not be willing to accept the greater risk associated with common stock. Thus temperament is the most important principle of the formulation of portfolio objectives. It indicated the investor's willingness to accept the risk. Some investors are able to aspect risk. Common stock prices are volatile temperament may be the overriding constraint in arriving at an appropriate portfolio policy for the investors.

WEIGHING CONSTRAINTS

The last stage in determining portfolio policies is to establish the constraints on the portfolio. This involves weighing each constraints individually and determining its important by using a ranking scale. We can use a ranking scale of one to five for each constraint as follows:

Need for current income	1	2	3	4	5
Need for safety principal (liquidity)	1	2	3	4	5
Need for safety principal (inflation)	1	2	3	4	5
Taxability	1	2	3	4	5
Temperament	1	2	3	4	5

A low ranking (1 or 2) would mean that the particular constraint is not that important. A high ranking would mean that the constraint is quite important. Once check list is completed, it becomes a matter of weighing the trade-off among the various constraints to determine the appropriate need for safety principal objectives.

EXERCISE

1. Choose the right answer

(a) Which of the following is not a financial investment?

(i) Purchase of shares (ii) Purchase of bonds

(iii) Purchase of car (iv) Purchase of debentures

Ans: (iii)

(b) Which of the following is a tax saving investment?

(i) Fixed deposit (ii) Shares

(iii) NSC (iv) PPF

Ans: (iv)

(c) The fundamental analysis approach has been associated with

(i) Uncertainties (ii) Certainties

(iii) Ratios (iv) Balance sheet

Ans: (i)

(d) The object of portfolio is to reduce _______________ by diversification

(i) Return (ii) Risk

(iii) Uncertainty (iv) Percentage

Ans: (ii)

2. Answer the following questions

1. What is an investment? What are the objectives of investment? (April 06)
2. What is an investment? How it is different from speculation? (April 09)
3. What is portfolio? What are the objectives of construction of portfolio? (April 07)
4. What is an investment decision? What are the approaches to investment decision-making? (Nov 05)
5. What is the difference between investor and speculator?
6. What is a security? What are the important securities traded in the stock market? (April 08)

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