| Unit | Topics |
|---|---|
| 1 | Investment: Concept, Objectives and types, Investment and Speculation, Factors of Sound Investment,<br>financial Markets : Meaning and types, Investment opportunities available inIndia |
| 2 | Concept of Return and Risk : Sources and types of Risk, Measurement of Risk, Concept of Portfolio Management, Portfolio selection, Markowitz Model, capital Asset Pricing Model |
| 3 | Fundamental Analysis: Economic Analysis, Industry Analysis and Company Analysis, Technical Analysis: Dow Theory, Elliott Wave Theory, Charting, Efficient Market Hypothesis |
| 4 | Stock Exchange in India : BSE, NSE, OTC, Interconnected Stock, Exchange in India, Stock Indices and their computation,<br>SEBI:Their powers and functions |
| 5 | Emerging Trends in Indian Capital Market: Depositories and script less trading, Book Building, Stock Lending Scheme, Rolling Settlement, Green Shoe Option, Responsibilities and code of conduct for pot folio manager |

**Unit-1**

Investment : An investment is an asset or item accrued with the goal of generating income or recognition. In an economic outlook, an investment is the purchase of goods that are not consumed today but are used in the future to generate wealth. In finance, an investment is a financial asset bought with the idea that the asset will provide income further or will later besold at a higher cost price for a profit.

Investment is elucidated and defined as an addition to the stockpileof physical capital such as:

- Machinery
- Buildings
- Roads etc.,

i.e. anything that sums up to the future productive ability of the economy and changes in the catalogue (or the stock of finished commodities) of a manufacturer. Note that 'investment commodities' (such as machines) are also part of the final commodities – they are not intermediate commodities like raw materials. Machines manufactured in an economy in a given year are not 'used up' to produce other commodities but yield their services over a number of years.

Investment decisions by manufacturers, such as whether to buy new machinery, rely to a large extent, on the market place rate of interest.

However, for simplicity, we presume here that enterprises plan to invest the

same amount every year. We can write the ex-ante investment demand as:

$I = \bar{I}$

Whereas, $\bar{I}$ is a positive constant which represents the autonomous (given or exogenous) investment in the economy in a given year.

## Investment Objectives

The investment objectives are mainly of two types:

## Risk Objective

Risk objectives are the factors associated with both the willingness andthe ability of the investor to take the risk. When the ability to accept all types of risks and willingness is combined, it is termed risk tolerance. When the investor is unable and unwilling to take the risk, itindicates risk aversion.

The following steps are undertaken to determine the risk objective:

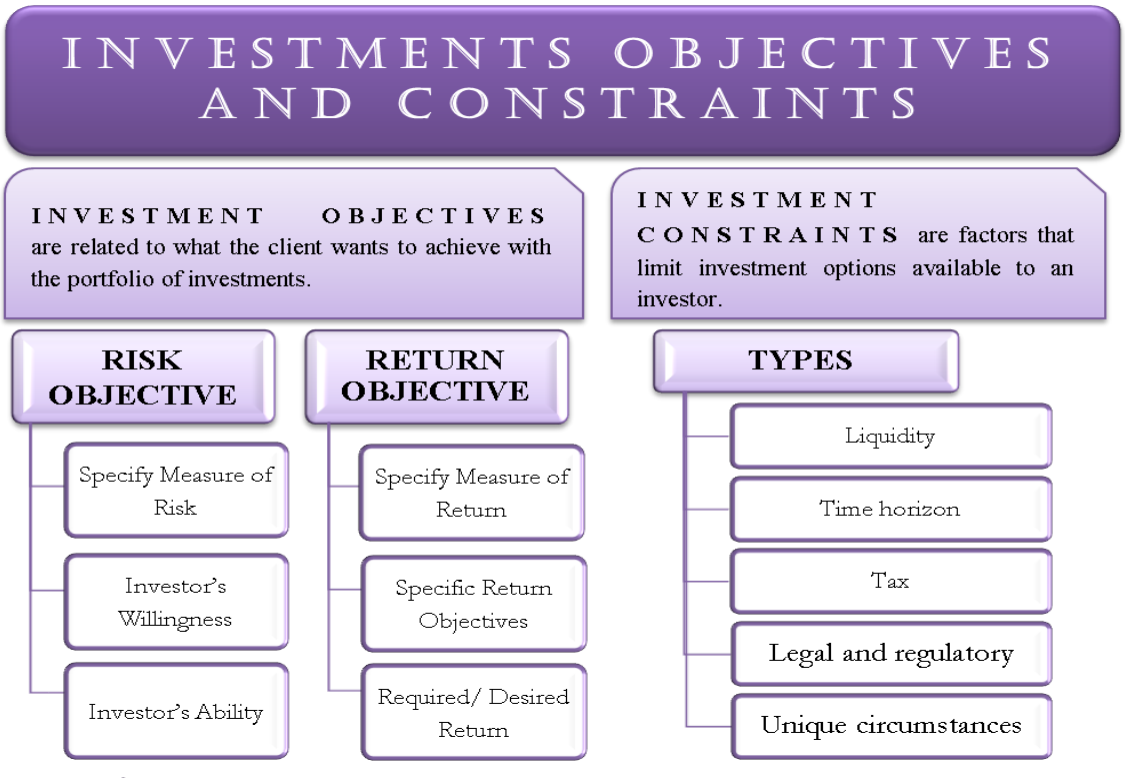
1. **Specify Measure of Risk:** Measurement of risk is the most important issue in portfolio management. Risk is either measuredin absolute or relative terms. Absolute risk measurement will include a specific level of variance or standard deviation of total return. Relative risk measurement will include a specific tracking risk.
2. **Investor's Willingness:** Individual investors' willingness to takerisks is different from institutional investors. For individual investors, willingness is determined by psychological or behavioral factors. Spending needs, long-term obligations or wealth targets, financial strength, and liabilities are examples of factors that determine an investor's willingness to take the risk.

3. **Investor's Ability**: An investor's ability to take risk depends on financial and practical factors that bound the amount of risk taken by the investor An investor's short-term horizon will negatively affect his ability. Similarly, if the investor's obligationand spending are less than his portfolio, he clearly has more ability.

## Return Objective

The following steps are required to determine the return objective ofthe investor:

1. **Specify Measure of Return:** A measure of return needs to be specified. It can be specified in an absolute term or a relative term. It can also be specified in nominal or real terms. Nominalreturns are not adjusted for inflation, whereas real returns are. One may also distinguish pre-tax returns from post-tax returns.
1. **Desired Return:** A return desired by the investor needs to be determined. The desired return indicates how much return is expected by the investor. E.g., higher or lower than average returns.
2. **Required Return:** A return required by the investor also needsto be determined. A required return indicates the return which needs to be achieved at the minimum for the investor.
3. **Specific Return Objectives:** The investor's specific return objectives also need to be determined so that they are consistent with his risk objectives. An investor having a high return objective needs to have a portfolio with a high level of expected risk.




## Investment and Speculation

**Comparison Table – Investment vs Speculation**

| | Investment | Speculation |
|---|---|---|
| Definition | Money allocation for an asset purchase. | Short-term bets on financial assets to gain quickly. |
| Aim | The investor's main objective is to achieve small recurring returns in the long term, such as the payment of dividends. | The speculator seeks to achieve small profits in the short term. |
| Time | Generally, the investor keeps the assets in his portfolio for a long time, years and even a lifetime. | Speculators usually change assets in the short term, in minutes, hours, or a few days. |
| Analysis | Thorough analysis of fundamental factors, including company ratios, competitive and industry conditions, and technical factors throughout the asset's history. | Technical analysis mainly combined with fundamental and market sentiment. |
| Income Certainty | Stable. | Erratic. |
| Risks | Moderate risk. The lower the risk, the lower the return. | High risk. The higher the risk, the higher the potential gains. |

**Factors of Sound Investment**

Sound investments typically have several factors in common:

- Research and Knowledge: Understanding the investment thoroughly, including its risks, potential returns, and marketconditions.
- Diversification: Spreading investments across different assets orindustries to reduce risk.
- Long-Term Perspective: Investing with a long-term goal in mindand not reacting impulsively to short-term market fluctuations.
- Risk Management: Assessing and managing risks associated withthe investment.
- Liquidity: Considering how easily an investment can be convertedto cash if needed.
- Costs and Fees: Being aware of any fees or costs associated withthe investment and how they may impact returns.
- Tax Efficiency: Understanding the tax implications of the investment and optimizing for tax efficiency when possible.
- Monitoring and Rebalancing: Regularly reviewing the investmentportfolio and making adjustments as needed based on changing market conditions or investment goals.

**Financial Markets: Meaning and types**,

The financial market is a broad term that refers to a marketplace wherebuyers and sellers participate in the trade of financial assets such as stocks, bonds, currencies, and derivatives. These markets facilitate the allocation of capital and risk between investors and borrowers.

There are several types of financial markets, including:

- Stock Market (Equity Market): This market enables the buying andselling of shares of publicly traded companies. It allows companiesto raise capital by issuing stocks and provides investors with an opportunity to own a portion of the company.

- Bond Market (Debt Market): In this market, government entities,municipalities, and corporations raise funds by issuing bonds. Investors purchase these bonds, effectively lending money to theissuer in exchange for periodic interest payments and the return of the bond's face value at maturity.

- Foreign Exchange Market (Forex): The forex market is where currencies are traded. It is one of the largest and most liquid financial markets globally, with trading occurring 24 hours a day,five days a week.

- Commodity Market: This market deals with the trading of physicalgoods such as gold, oil, agricultural products, and other raw materials. Commodity markets can be further divided into spot markets (for immediate delivery) and futures markets (for future delivery).

- Derivatives Market: Derivatives are financial contracts whose value is derived from an underlying asset or group of assets. Examples include options, futures, and swaps. The derivativesmarket is used for hedging risks, speculation, and arbitrage.

- Money Market: This market deals with short-term borrowing and lending, typically for periods ranging from a few days to a year. It includes instruments like Treasury bills, certificates of deposit, andcommercial paper.

- Capital Market: The capital market is where long-term financial instruments such as stocks and bonds are traded. It facilitates theflow of long-term funds from investors to businesses and governments.

These markets can be further categorized as primary markets (wherenew securities are issued) and secondary markets (where existing securities are traded among investors). Additionally, they can be classified based on the level of organization, such as organized exchanges (like stock exchanges) and over-the-counter (OTC) markets.

**Investment opportunities available in India**

India offers a range of investment opportunities across various sectors.Some of the key sectors with promising investment potential include:

- Technology: India's tech industry is booming, with opportunitiesin areas like software development, IT services, and startups focusing on emerging technologies like AI, IoT, and blockchain.

- Renewable Energy: Given India's push towards renewable energy,there are opportunities in solar and wind energy projects, as well as manufacturing of related equipment.

- Infrastructure: India has significant infrastructure developmentneeds, presenting opportunities in areas like roads, railways, airports, and smart cities.

- Manufacturing: The government's "Make in India" initiative aims to boost manufacturing, offering opportunities in sectors like automotive, electronics, and pharmaceuticals.

- Healthcare: With a growing population and increasing focus on healthcare, there are opportunities in areas like hospitals, medicaldevices, and telemedicine.

- E-commerce: India's e-commerce market is expanding rapidly, creating opportunities for investment in online retail, logistics,and related services.

- Agribusiness: Agriculture is a key sector in India, and there areopportunities in areas like food processing, agri-tech, and agricultural exports.

- Financial Services: India's financial services sector is growing, offering opportunities in banking, insurance, fintech, and microfinance.

These are just a few examples, and the Indian market offers a wide range of opportunities across various sectors. It's important to conductthorough research and due diligence before making any investment decisions

## Assignment questions

- Investment Concept, Objectives and types, Investment and Speculation, Factors of Sound Investment, financial Markets: Meaning and types, Investment opportunities available in India
- Identify and describe the main types of financial markets, including money markets, capital markets, primary markets, and secondary markets. Provide examples of instruments traded in each market.

- Compare and contrast the risk-return profiles of investment and speculation. How do these profiles impact the decision-making process of investors?

**UNIT-2**

**Concept of Return and Risk**

## Relationship between risk and return :

The risk and return relationship form the entire basis of investment decisions. Investors are risk averse; i.e., given the same expected return, they will choose the investment for which that return is more certain. Therefore, investors demand a higher expected return for riskier assets. Note that a higher expected return does not guarantee a higher realized return. Because by definition returns on risky assets are uncertain, an investment maynot earn its expected return. The risk in holding deviates from actual return from the expected return maybe upward or downside. The mean (average) annual return increases as the dispersion of returns increases.

## Types of risks :

The distinction between different types of risks is elaborated as under -

1) **Unsystematic risk :** Also known as specific risk, it is a measure of risk associated with a particularsecurity; also known as diversifiable risk. It is the type of uncertainty that comes with the company with which you invest or the industry where you invest. This risk can be mitigated by holding a diversified portfolio of many different stocks in many different industries.
2) **Systematic risk/ market risk :** It is a risk faced by all investors due to market volatility and this risk cannot be diversified away. This is the type of risk most people are referring to when they casually usethe term 'risk' when discussing investments.
3) **Political risk :** It is the risk to an investment due to changes in the law or political regime. Potential changes in tax law or changes in a country's structure of governance are sources of political risk.
4) **Inflation risk :** Stocks, bonds and cash are all subject to the risk that one's investment will not keep pace with inflation. This risk can be mitigated by investing in inflation-protected Treasury

bonds.

5) **Financial risk :** This risk is due to the **capital structure of a firm**. Corporate debt magnifies
financial risk to a company's stocks and bonds.

6) **Management risk :** Investors using actively managed funds are exposed to the risk that fund or portfolio managers will under-perform benchmarks due to their management decisions or style. Investorscan avoid this risk by selecting passively-managed index funds.

7) **Interest rate risk :** It is the risk associated with changes in asset price due to changes in interest rates. Bonds andbond funds face this type of risk. As interest rates rise, prices on existing bonds decline and vice versa. Interest raterisk is greater for bonds with longer maturities, and vice versa.

8) **Credit Risk / Default Risk :** It is the risk of default on account of non-payment. Holders ofcorporate and municipal bonds face this risk.

9) **Call risk :** It is the risk that a bond issuer, after a decline in interest rates, may redeem a bond early,forcing the bond holder to find a replacement investment that may not pay as well as the original bond.

10) **Reinvestment risk :** The risk that earnings from current investments will not be reinvested at the same rate of return as current investment yields. Coupon payments from a bond may suffer reinvestmentrisk if they cannot be reinvested at the same rate as the bond's yield.

11) **Currency risk :** Investors in international stocks and bonds are also exposed to the risk caused fromchanges in currency exchange rates. Investments in currencies other than the one in which the investor purchases most goods and services are subject to currency risks.

12) **Longevity risk :** It is the risk an investor will outlive his/her money.

13) **Shortfall risk :** It is the risk the portfolio will not provide sufficient returns to meet the investor's
goal

**14) Diversifiable Risk :** This risk is **Company Specific or Non Systematic** and is connected withthe random events of respective company whose stocks are being purchased. Diversification can reduce diversifiable risk. The good random events influencing one stock will be cancel out by the bad random events that influence another stock of the portfolio.

**15) Market Risk :** This risk is also called **Beta Risk or Non--Diversifiable Risk** and is connected with socio-political and macro-economic events that occur on global basis such as Macro Market InterestRates, Inflation, War and Recession etc. **Market risk can never reduce through diversification**. **Total Risk of Stock** = General Risk + Specific Risk

= Market Risk + Issuer Risk

= Systemic Risk + Non Systemic Risk

**Measurement of Risk and Return :**

Risk is the uncertainty of future returns. Risk can be measured as the difference between expected return and actual return. Expected returns are the anticipated returns for a future period. Risk is measured as **the difference between expected return and actual realized return**.

There are different techniques/tools of measuring risk -

**1. Volatility :**

Volatility is the range of price fluctuations as compared to the expected level of return. The more the changes in price the more volatile a stock is. Volatility brings uncertainty and hence greater risk. The pastvolatility data provides an insight into the risk of a stock.

**2. Standard Deviation :**

This is the most common measure of risk in investments in terms of variance or standard deviation. Standard Deviation indicates the likely volatility in the returns from the mean value of returns. It can beeither in the form of an increase or a decrease from the mean.

**3. Probability Distribution :**

Probabilities indicate the likelihood of different outcomes and are in the form of decimals.

Past occurrences are taken to estimate the probability with consideration for any changes

expected in the future. To determine the single most outcomes from a specific probability distribution, the expected value is computed. Expected return orEx-ante return is the mean return found by using probability distribution of expected return

**Definition of Portfolio Analysis :**

Portfolio Analysis is the process of reviewing or assessing the elements of the entire portfolio of securities or products in a business. The review is done for careful analysis of risk and return. Portfolio analysis conducted at regular intervals helps the investor to make changes in the portfolio allocation and change them according to the changing market and different circumstances. The analysis also helps in proper resource / asset allocation to different elements in the portfolio.

**Portfolio Management :**

Portfolio Management is the **art and science** of making decisions about investment mix and policy, matching investments to objectives, asset allocation for individuals and institutions, and balancing risk against performance. **The art of selecting the right investment policy for the individuals in terms of minimum risk and maximum return is called as portfolio management.** It also refers to managing an individual's investments in the form of bonds, shares, cash, mutual funds, etc. so that he earns the maximum profits within the specific time frame. Portfolio management refers to managing money of an individual under the expert guidance of portfolio managers. **It is done by analyzing the strengths, weaknesses, opportunities and threats** in different investment alternatives to have a risk return trade off. Portfolio management is all about strengths, weaknesses, opportunities and threats in the choice of debt v/s. equity, domestic v/s. international, growth v/s. safety, and many other tradeoffs encountered in the attempt to maximize return at a given appetite for risk.

Portfolio is nothing but the combination of various stocks in it. **Understanding the dynamics ofmarket is the essence of Portfolio Management.**

This means Portfolio Management basically deals with three critical questions of investment planning.

1. Where to Invest?
2. When to Invest?

3. How much to Invest?

**Portfolio selection**

## Portfolio Selection :

Portfolio Selection is the process of finding out the optimal portfolio which would be one generating highest returnwith the lowest risk. This is done with the objective of maximizing the investor's return. **Diversification is done for reducing the risk in a portfolio**. The investor usually combines a limited number of securities thereby creating a large number of portfolios and in different proportions. This is known as portfolio opportunity set. Every portfolio in the opportunity set is characterized by an expected return and some risk in terms of variance or standard deviation. Some portfolios in a portfolio opportunity set are of interest to an investor depending upon the risk and return as measured by standard deviation. A portfolio will dominate over others if it has a lower **standard deviation**. These portfolios which are dominated by other portfolios are known **as inefficient portfolios**. **Efficient portfolios** are the ones in which the investor is interested to invest.

**Markowitz Model**

There are **two main concepts** in Modern Portfolio Theory –

a) Any investor's goal is to maximize return for any level of risk.

b) Risk can be reduced by creating a diversified portfolio of unrelated assets.

Other names for this approach are **Passive Investment Approach** because you build the right risk toreturn portfolio for broad asset with a substantial value and then you behave passive and wait as it growth.

### Subject Matter of the Markowitz Theory :

Before the development of Markowitz theory, combination of securities was made through 'simplediversification'. The layman could make superior returns on his investments by making a randomdiversification in his investments.

A portfolio consisting of securities of large number will always bring a superior return than a portfolioconsisting of ten securities because the portfolio is more diversified.

The simple diversification would be able to reduce unsystematic or diversifiable risk. In securities, both diversifiable and un-diversifiable risks are present and an investor can expect 75% risk to be diversifiableand 25% to be un-diversifiable.

Simple diversification at random would be able to bring down the diversifiable risk if about 10 to 15 securities are purchased. Unsystematic risk was supposed to be independent in each security. Manyresearch studies were made on diversification of securities. It was found that 10 to 15 securities in aportfolio would bring adequate returns. Too much diversification would also not yield the expected return.

Some experts have suggested that diversification at random does not bring the expected return results.Diversification should be related to industries which are not related to each other. Many industries arecorrelated with each other in such a way that if the stock of 'X' increased in price the stock of 'Y' also increased and vice versa.

By looking at the trends, industries should be selected in such a way that they are unrelated to each other. A person having on his portfolio about 8 to 10 securities will reduce his risk but if he has too many securities as described above it would not lead to any gain.

If systematic risk is reduced by simple diversification, research studies have shown that an investor should spread his investments but he should not spread himself in so many investments that it leads to'superfluous (extra) diversification'. When an investor has too many assets on his portfolio he will have many problems. These problems relate to inadequate return.

It is very difficult for the investor to measure the return on each of the investments that he has purchased. Consequently, he will find that the return he expects on the investments will not be up to his expectationsby over diversifying.

The investor will also find it impossible to manage the assets on his portfolio because the management ofa larger number of assets requires knowledge of the liquidity of each investment, return; the tax liability and this will become impossible without specialized knowledge.

An investor will also find it both difficult and expensive to look after a large number of investments. This will alsohave the effect of cutting into the profits or the return factor on the investments.

If the investor plans to switch over investments by selling those which are unprofitable and purchasing those which will be offering him a high rate of return, he will involve himself in high transaction costs andmore money will be spent in managing superfluous diversification.

The research studies have shown that random diversification will not lead to superior returns unless it is scientifically predicted. Markowitz theory is also based on diversification. He believes in asset correlation and in combining assets in a manner to lower risk.

**Assumption of the Markowitz Theory :**

Markowitz theory is based on the modern portfolio theory under several assumptions.

i) The market is efficient and all investors have in their knowledge all the facts about the stock market and so an investor can continuously make superior returns either by predicting past behavior of stocks through technical analysis or by fundamental analysis of internal company management or by finding outthe intrinsic value of shares. Thus, all investors are in equal category.

ii) All investors before making any investments have a common goal. This is the avoidance of risk becausethey are risk averse.

iii) All investors would like to earn the maximum rate of return that they can achieve from theirinvestments.

iv) The investors base their decisions on the expected rate of return of an investment. The expected rate of return can be found out by finding out the purchase price of a security dividend by the income per year and by adding annual capital gains. It is also necessary to know the standard deviation of the rate of return expected by an investor and the rate of return which is being offered on the investment. The rate of return and standard deviation are important parameters for finding out whether the investment is worthwhile for a person.

v) Markowitz brought out the theory that it was a useful insight to find out how the security returns arecorrelated to each other. By combining the assets in such a way that they give the lowest risk maximumreturn could be brought out by the investor.

vi) From the above, it is clear that every investor assumes that while making an

investment he will combine his investments in such a way that he gets a maximum return and is surrounded by minimumrisk.

vii) The investor assumes that greater or larger the return that he achieves on his investments, the higherthe risk factor surround him. On the contrary, when risks are low the return can also be expected to below.

viii) The investor can reduce his risk if he adds investment to his portfolio.

ix) An investor should be able to get higher return for each level of risk 'by determining the efficient set ofsecurities'.

**Markowitz Model :**

Markowitz approach determines for the investor the efficient set of portfolio through three important variables

i.e. return, standard deviation and coefficient of correlation. Markowitz model is called the **'Full CovarianceModel'**

## Capital Asset Pricing Model (CAPM)

Capital asset pricing model or CAPM is a specialized model used in business finance to determine the relationship between the expected dividends and the risk associated with investing in particular equity. When assessing CAPM, one can understand that expected returns on specific security are equal to the risk-free returns plus the additionof a beta factor.

Assessing the capital asset pricing model requires a proper understanding of systematic and unsystematic risks. Systematic risks are general dangers, which are associated with the investment of any form. Wars, inflation rates, recessions, etc. aresome of the examples of systematic risks.

Unsystematic risks, on the other hand, refer to specific perils associated with investingin a particular stock or equity. Thus, unsystematic risks are not perceived as threats, which are shared by the general market.

CAPM deals mostly with systematic risks on securities, thereby predicting whetherthings can go wrong with particular investments.

UNIT-3

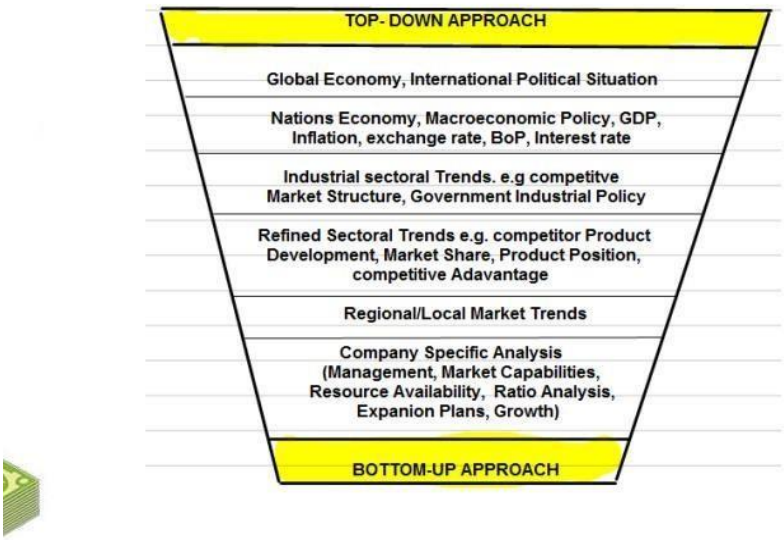
Fundamental Analysis

Fundamental analysis is a method of evaluating a security to measure its intrinsic stock value by examining related economic, financial and qualitative and quantitative factors. Some of the factors toconsider when analyzing the fundamentals of a company include:

1 Is the company making a profit? 2 Can the company repay its debt? 3 Is there potential for growth?

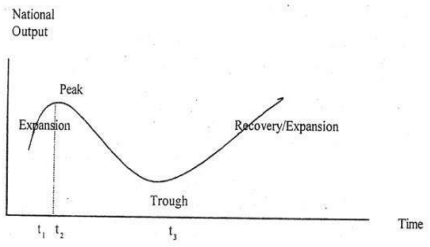
4 What is the management like?

Two Ways of Fundamental Analysis




**Economic Analysis**

All investment decisions are made within the economic environment after taking into account the economic prospect of the country. This environment varies as the economy goes through stages of prosperity. Why economy fails to have prosperity forever? There are several reasons. Often, when the economy is booming, companies over invest in projects and create excess capacity and thus lead-to slowdown of the economy. Further, government policies and external pressures also create complications to the economy. For instance, increase in oil prices on account of gulf war or war with neighboring countries creates pressures to the domestic economy. Government also can create problems to the economy by following wrong policies or failure to adopt right policies like failure in meeting disinvestment target. Different stages of economic prosperity are also referred to as the business cycle. The term cycle doesn't mean that there is some orderliness in the economic sequence such as the seasons of the year. The economy doesn't follow a regularly repeated sequence of events. It simply means how economic output and growth moves from period one to next periods. If the initial period is aperiod of rabid growth, it peaks out at some point of time and a recession sets in subsequently. After some point of slow growth, the economy bottoms out but by then, new demand accrues and fresh activities emerge. The economy now sets into recovery mode and then gets into expansion. The cycle moves on without any definite length of time between the stages because government and other agencies would like to extend the expansion stage while trying to cut down the recession or speed up the recovery phase.




**Industry Analysis**

After conducting analysis of the economy and identifying the direction it is likely to take in the short, intermediate and long term, the analyst must look into various sectors of the economy in terms of various industries. An industry is a homogenous group of companies. That is, companies with the similarcharacteristic can be grouped into one industrial group. There are many other bases on which grouping of companies can be done. For example, traditional classification is generally done product wise like pharmaceutical, cotton, textile, synthetic fiber industry, etc. Such a classification though useful does nothelp much in investment decision making. Some of the more useful bases for classifying industries from the investment decision point of view are as follows:

**Growth industry**: This is the industry, which is expected to grow persistently and its growth is likely toexceed the average growth of the economy. Cyclical industry: In this category of the industry, the firmsincluded are those which move closely with that rate of industrial growth of the economy and fluctuatecyclically as the economy fluctuates

**Defensive industry**: It is a grouping that includes firms which move steadily with the economy anddecline less than the average decline of the economy in a cyclical downturn.

**Declining industry**: This is that category of firms, which either generally decline absolutely or grow less than the average growth of the economy. Another useful criterion to classify industries is the various stages of their development. Industries with different stages of their life cycle development exhibit different characteristics. In fact, each development stage is unique. Grouping firms with similarcharacteristics of development helps investors to properly evaluate different investment opportunitiesin the companies. Basing on the stage in the life cycle, industries may be classified as follows:

**Pioneer's Stage**: This is the first stage in the industrial life cycle of a new industry. Being the first stage,the technology and its products are relatively new and have not reached a stage of perfection.

Experimentation is the order both in product and technology. However, there is a demand for its products in the market, thereby, the profit opportunities are in plenty. This is a stage where the venturecapitalists take a lot of interest and enter the industry and sometimes organize the business. At this stage, the risk of many firms being out of the industry is also more; hence, mortality rate is very high in the industry, with the result that if an industry withstands the risk of being out of the market, the investors would reap the rewards substantially or else substantial risk of loss of investment exist. A very pertinent example of this stage of industry in India was leasing industry which was trying to come-up during mid eighties. There was a mushroom growth of companies in this period. Hundreds of companiescame into existence. Initially, lease rental charged by them was very high. But as the competition grew among firms, lease rental reduced and come down to a level where it became difficult for a number of companies to survive. This period saw many companies that could not survive the onslaught of competition. Only those which tolerate this onslaught of price war could remain in the industry. Leasing industry today in India is much pruned compared to mid-eighties.

**Technical Analysis:**

Technical Analysis is concerned with a critical study of the daily or weekly price and volume data of the Index comprising several shares, like Bombay Stock Exchange Sensitive Index (SENSEX), or of a particularStock, like Infosys or Hindustan Lever. The objective of the technical analysis is to predict or forecast theshort, intermediate and long term price movements. It uses only the data generated from the market. Such market generated data includes price, volume, number of trades, 52-week high or low price, intra-day spread, dealers buy-sell quote spread, number of advances and declines, number of Stocks hitting the new high and low, open interest, etc. Some of the basic assumptions of the technical analysis are:

1. Market value is determined solely by the interaction of supply and demand.
2. Supply and demand are governed by numerous factors, both rational and irrational.
3. Stock prices tend to move in trends, which persists for an appreciable length of time.

4. Changes in trend are caused by shifts in demand and supply.
5. Shifts in demand and supply can be detected through chart analysis and some chart patterns repeatthemselves.

To appreciate technical analysis, one has to understand the above assumptions clearly. Technicalanalysis assumes that there is a sufficient lag between the arrival of information and its ultimate impact on the Stock prices. The analysis fails if the information never incorporated in the prices (inefficient market) or instantaneously reflected in the prices (efficient market). The perfect set upis temporarily inefficient such that initially a few investors or analysts are able to understand the impact of information on prices and entering into the Stock. Subsequently, more and more peopleare entering into the Stock. Technical analysts believe that charts will give them a clue about entryof more and more investors into the Stock and hence they can also enter into the Stock without doing such analysis. They are primarily moving with the crowd and exit from the market the moment the Stock prices started moving down. As such they are no long-term investors in a particular Stock though they invest in the market for a longer period. They move from one securityto another security.

**Dow Theory**

To start with, the Dow's Theory put forward six basic tenets as follows

1. THE AVERAGES DISCOUNT EVERYTHING: Daily prices reflect the aggregate judgement and emotions of all stock market participants. This process discounts (takes into account) everything known and predicable that can affect the demand-supply relationship of the stocks.
2. THE MARKET HAS THREE MOVEMENTS: Primary movements, secondary reactions, and minor movements. The primary movement is the long range cycle that carries the entire market up or down. The secondary reactions act as a restraining force on the primary movement and tends to correct deviations from it. Secondary reactions usually last from

several weeks to several months in length. The minor movements are the day-to-day fluctuations in the market. Minor movements have little analytic value because of their short duration and variations in amplitude.

3. PRICE BAR CHARTS INDICATE MOVEMENTS.
4. PRICE/VOLUME RELATIONSHIPS PROVIDE BACKGROUND.
5. PRICE ACTION DETERMINES THE TREND.
6. THE AVERAGES MUST CONFIRM: The movement of two different market indices must confirm eachother to confirm the trend.

**Elliott Wave Theory**

**Elliott's conclusion was that the prices move in alternating waves. In short, during an uptrend, there will be large upward movements that will be occasionally opposed by smaller downward movements.**

In the same way, during a downtrend, there will be large downward movements by price accompanied by smaller upward movements.

Collectively, these alternating price movements create a trend.

**Upon further observation, Elliott concluded that these cycles resulted from two factors:**

- Investor emotions.
- Mass psychology.

From these observations, Elliott was able to formulate an outstanding trading methodthat remains one of the most powerful trading approaches to this day.

Let's see how this principle works:

## Elliott Waves Basics

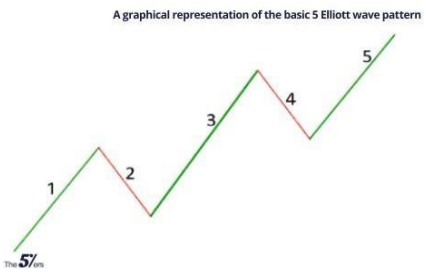
**According to this theory, a trending market moves in a 5-3 wave pattern. The "5" wave usually represents the trending phase, while the "3" phase is a reversal of the trend.**

In short, once the main trend is complete, a reversal is expected.

### The 5-wave Phase

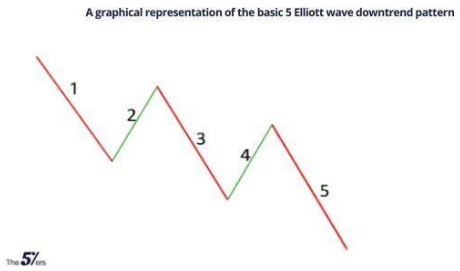
The first phase of the Elliott wave theory trading principle consists of 5 waves. Waves 1, 3 and 5 move in the direction of the main trend. They are collectively known as the *Impulse waves*. Waves 2 and 4 move against the main trend and are known asthe *Corrective waves*.

**A graphical representation of the basic 5 Elliott wave pattern looks like this:**




As we can see, Elliott found out that the markets move in alternating waves. During an uptrend, like the above, waves 1, 3 and 5 (impulse waves) are larger than waves 2 and 4 (corrective waves). Because of this, the prices move upwards.

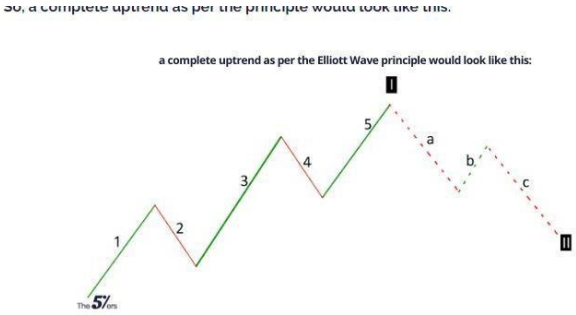
**A downtrend would look like this:**




**The 3-wave phase**

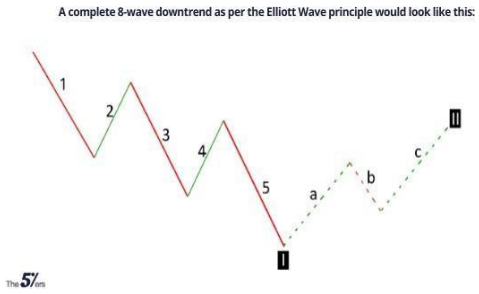
Once the 5-wave phase has completed, there is usually a reversal wave that opposes it. This time, the wave is made up of 3 smaller waves known as “a”, “b”, and “c.”

**So, a complete uptrend as per the principle would look like this:**




In a nutshell, an Elliott wave Theory is said to be complete once all the 8 waves have been formed. The wave marked “I” is the main trend while wave “II” is the reversal trend.

**A complete 8-wave downtrend looks like this:**




Similarly, after the first phase (wave I) ends, a reversal uptrend (wave II) forms.

**How to Identify an Elliott Wave**

**Good old Mr. Elliott did not end his discovery there. His invention was so perfect that he came up with 6 cardinal rules to help traders in identifying and validating the Elliott waves.**

By adhering to the rules, we can easily identify the perfect waves and use them in making our trading decisions.

**Let's look at each rule in detail.**

***Rule 1*: *Wave 2 should never retrace more than 100% into the territory of wave 1***

The end of wave 2 should not be equal or larger than the starting point of wave 1.

***Rule 2*: *Wave 3 should be the longest***

In most cases, wave 3 will be the longest. In addition, it should never be the shortest. If this happens, then the wave count is wrong.

***Rule 3*: *Wave 3 must extend past the height of wave 1***

During an uptrend, wave 3 should end above the high of wave 1. During a downtrend, wave 3 should end below the low of wave 1.

***Rule 4**: **Wave 4 should not retrace more than 100% of the end of wave* 1**

Wave 4 should not go into the territory of wave 1. As such, in a downtrend, wave 4 should end below wave 1's end. Again, in an uptrend, wave 4 should end above the high of wave 1.

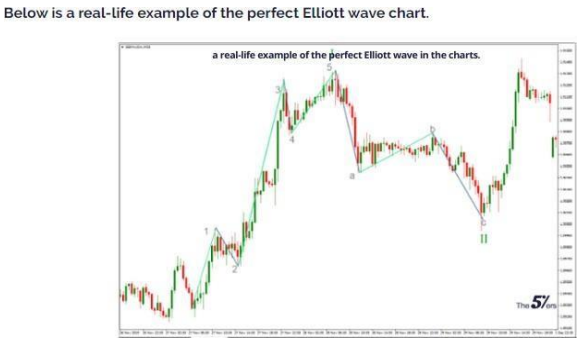
***Rule 5***: ***Wave 5 should extend above the end of wave 3***

The final phase of wave I (wave 5) should extend above the end of wave 3. In short, during a downtrend, wave 5 should form and end below the low of wave 3. Similarly, in an uptrend, wave 5 should form and end above the high of wave 3.

***Rule 6***: ***Wave II should not retrace more than the size of wave I***

If wave II retraces more than 100% of wave I, that whole wave becomes invalid and the counting should start again.

**Below is  a real-life example of the perfect Elliott wave chart.**



**Here is another one.**

Here is another one.


**As you can see;**

- **We have 2 main waves, I and II**
- **Wave I has 5 waves inside it (3 impulses and 2 correctives)**
- **Wave II is a reversal of wave I**

**All the waves adhere to the 6 cardinal rules of the Elliott Wave Forex trading method.**

The theory part is easy. Most Elliott Wave traders find the application part hard. This, however, is as a result of improper identification of the cycles.

Worry not; we are going to see the proper way of spotting and trading them today.

**You need to have a good understanding of Support and Resistance, trends and, better still, candlestick patterns. These three elements will go a long way in helping us to draw, validate and trade the Elliott wave forex method.**

**Efficient Market Hypothesis**

- The Efficient Markets Hypothesis (EMH) ismade up of three progressively stronger forms:
  - Weak Form
  - Semi-strong Form
  - Strong Form

Weak Form

- The weak form of the EMH says that past prices, volume, and othermarket statistics provide no information that can be used to predict future prices.
- Weak because security prices are the most easily available piece of information.
- Many financial analysts attempt to generate profits by studying exactly what this hypothesis asserts is of no value - past stock price series and trading volume data.This technique is called technical analysis.
- Prices should change very quickly and to the correct level when new information arrives (see next slide).
- This form of the EMH, if correct, repudiates technical analysis.

Semi-strong Form

- The semi-strong form says that prices fully reflect all publicly availableinformation(even those reported in the financial statements of the companies) and expectations about the future.
- This suggests that prices adjust very rapidly to new information, and that old information cannot be used to earn superior returns.
- The assertion behind semi-strong market efficiency is still that one should not be able to profit using something that "everybody else knows" (the information is public). Nevertheless, this assumption is far stronger than that of weak-form efficiency.

The semi-strong form, if correct, repudiates fundamental analysis

Strong Form

- The strong form says that prices fully reflect all information, whetherpublicly available or not.
- Even the knowledge of material, non-public information cannot beused to earn superior results.

The rationale for strong-form market efficiency is that the market anticipates, in an unbiased manner, future developments and therefore thestock price may have incorporated the information and evaluated in a much more objective and informative way than the insiders

Most studies have found that the markets are not efficient in this sense.

**UNIT-4**

**Stock Exchange in India :**

## Stock Exchange in India

Indian stock exchange is one of the oldest markets in Asia and is a yardstick to measure the health and progress of the economy of the country. Over the course of the period, the market has transitioned intothe electronic market and securities are dealt in dematerialization form.

There are two major stock exchanges in India- National Stock Exchangeof India (NSE) and Bombay Stock Exchange (BSE). National Stock Exchange was established in Mumbai in 1992 and started trading in 1994. Bombay Stock Exchange was established in 1875 in Mumbai.

Other stock exchanges are as follows-

1. Calcutta Stock Exchange in Kolkata
2. India International Exchange
3. Metropolitan Stock Exchange

## Market Indices

There are two major indices in the stock exchange of India – Sensex and Nifty. Sensex comprises of the weighted average of the market capitalization of stock of 30 well established and financially sound companies across different key sectors in India. Nifty comprises of top50 companies in 12 sectors of the Indian economy in one portfolio. It reflects the health of the Indian economy from a broader perspective.

SENSEX is an indicator of Bombay Stock Exchange and NIFTY is anindicator of National Stock Exchange of India.

## Functions of Stock Exchange in India

Stock exchange in India ensures –

1. Stability of prices of securities.
2. Convenient and transparent place to trade in securities.
3. Help companies to raise their funds.
4. Promote the habit of saving and investment
5. Provide forecasting service.

## Bombay Stock Exchange (BSE)

Bombay Stock Exchange was formed in 1875 and is one of the two principal large stock exchanges in India. The major objective of BSE is to provide an efficient and transparent market for trading currencies, equities, mutual fundsetc. As per the official website of BSE, its vision is to “Emerge as the premierIndian stock exchange with best-in-class global practice in technology, product innovation, and customer service.”

BSE has a wholly-owned subsidiary. Indian Clearing Corporation Limited acts as a central counterparty to all the trades that happen on the exchange and provides

settlements of the trades executed. Another subsidiary of BSE Limited is BSE Institute Limited which serves as a capital market educational institution in our country.

In the 1850s, 5 stockbrokers would gather under a banyan tree in front of the Mumbai Town Hall. Due to the increase in the number of brokers, the place ofmeetings kept changing before finally moving to Dalal Street in the year 1874.In order to measure the overall performance of the exchange, in 1986, the

BSE developed the S&P BSE SENSEX index.

Apart from the Sensex, BSE also has other important indices such as BSE100, BSE200, BSE MIDCAP, BSE SMALLCAP, BSEAuto, BSEPharma, BSEMetal, etc.

**National Stock Exchange (NSE)**

National Stock Exchange is the leading stock exchange in India. It was established in the year 1992 as the first dematerialized electronic exchange in the country. It was the first exchange to provide a fully-automated screen-

based trading system to the investors to facilitate easy trading. In the year 1993, NSE registered itself as a stock exchange under the Securities ContractRegulations Act. It operates with a vision to “to continue to be a leader, establish a global presence, facilitate the financial well-being of people .”

The benchmark index of NSE, Nifty 50 is used extensively by investors around the world to keep track of the Indian capital market. NSE had also played an important role in the creation of the National Securities Depository Limited. (NSDL) allows the investors to hold and transfer their shares electronically without any hassle. This eventually leads to holding the financialinstruments conveniently in electronic form thereby reducing the fake certificate issues.

The NSE commenced trading in derivatives with the launch of index futures in the year 2000. Since then, the futures & options have come a long way in becoming a popular financial product. In the Futures and Options segment, trading in the NIFTY 50 Index, NIFTY IT index, NIFTY Bank Index, NIFTYNext 50 index, and single stock futures is available.

Explore: Stock Market Basics

**Calcutta Stock Exchange (CSE)**

Calcutta Stock exchange is the second oldest stock exchange in Southeast Asia and was incorporated in the year 1908 with 150 members. Presently, CSE is located at the Lyons Range. It was granted recognition under the relevant provisions of the Securities Contract (Regulation) Act, 1956, and wasreplaced by the screen-based trading system only in the year 1997. The matter pertaining to the exit of the Calcutta stock exchange by SEBI is pending before the Calcutta High Court.

**Metropolitan Stock Exchange (MSE)**

The Metropolitan stock exchange was recognized as a "notified stock exchange" in the year 2012 by SEBI. MSE offers an electronic and hi-tech trading platform in Capital Markets, Debt Markets, Futures & Options.

MSE launched its SX40 index on February 9th, 2013, and commenced trading from February 11th, 2013. 'SX40', is a free-float based index consisting of 40 large-caps, liquid stocks representing diverse sectors of the economy.

MSE considers 'Information, Innovation, Education and Research' as its four cornerstones of the unique market development philosophy to support its mission of financial literacy across India.

**India International Exchange (India INX)**

India International Exchange Limited is India's first International FinancialServices Centre located in Gujarat. Its operations started in 2017 and is asubsidiary of BSE Limited.

The exchange offers a single segment approach for all asset classes such asequities, currencies, commodities etc. The exchange uses an advanced technology platform and is the fastest in the world with a turn-around time of 4microseconds. For global experts and market participants, India INX offers to be an offshore exchange that provides innovative products and services alongwith competitive advantages in terms of the tax structure.

explore our article on What are Common Stocks?

**NSE IFSC Limited**

On November 26th, 2016, NSE IFSC Limited (NSE International Exchange) was

incorporated by the Registrar of Companies, Gujarat. It is a fully owned subsidiary company of the National Stock Exchange of India Limited (NSE). Ithas received approval from the Securities and Exchange Board of India (SEBI) to establish an international exchange in Gujarat International FinanceTech City (GIFT) – International Financial Service Centre (IFSC) Gandhinagar.

The city, which is a special economic zone, is India's first IFSC. As a part ofthe advantages offered to the companies, Exchange and Financial Servicesunits located in GIFT IFSC are offered a competitive tax structure and facilitative regulatory framework. It offers benefits such as exemptions from dividend distribution tax, commodity transaction tax,

tax, capital gain tax waivers, and no income tax.

With an objective of increasing access to financial markets, NSE InternationalExchange has been launched to grow the financial market as well as expected to bring capital into India. Furthermore, Stock exchanges operating in the GIFT IFSC are permitted to offer trading in securities in any currency other than the Indian rupee.

**SEBI**

SEBI is chiefly concerned with the monitoring and regulating of the Indian capital and securities market, while taking measures to protect the best interest of the investors' community. It is also responsible for formulating regulations and guidelines which are to be followed by the concernedauthorities.

In any economy, the security market is a particular segment of a financial market that raises long- term capital by means of securities, bonds, shares, and mutual funds. This particular market is knownas the security market of that economy. In India, in order to regulate the security market, the government set up the SEBI. Besides, the security market also comprises stock exchanges, FIIs, different share indices, etc. The security market is further categorized into Primary and Secondary markets.

## Structure of the SEBI

The Securities and Exchange Board of India functions as a corporate framework that comprises various departments, each of which are managed by a departmental head. There are more than 20departments under the SEBI. Some of the include:

- Corporation Finance
- Investment Management
- Commodity Derivatives Market Regulation
- Economic & Policy Analysis
- Debt & Hybrid Securities

## Objectives of SEBI

Established under the Section 3 of the SEBI Act, 1992, the Securities and Exchange Board of India isentrusted with complete statutory responsibility of:

- Protecting the interests of all the investors in the securities market and providing ahealthy environment to them.
- Working for the regulation of the securities market by preventing any malpractices.
- Promoting the development of the securities market with proper and fair functioningby checking over brokers, underwriters, etc.

## Functions of SEBI

The functioning of the Securities Exchange Board of India is primarily divided into the following threecategories:

1. Protective Function
2. Regulatory Function
3. Development Function

**Protective Functions**

To protect the interest of the investors and other stakeholders can be considered as one of the primefunctions of SEBI. Some of the protective functions of include :

- Preventing insider trading
- Creating awareness among investors
- Promoting fair practices
- Prohibiting fraudulent/ unfair trade practices

**Regulatory Functions**

SEBI's regulatory functions are usually performed in order to keep tabs on the functioning of the

business across the financial markets. Few of its regulatory functions are:

- Performing and exercising powers
- Conducting inquiries and audit of exchanges
- Levying of fees
- Regulating takeover of companies
- Registering and regulating credit rating agencies

**Development Functions**

Apart from the above protective and regulatory functions, the SEBI is also responsible to undertake

certain development functions. The following are a few examples of SEBI's development functions:

- Carrying out research and development work
- Promoting of fair trading practices
- Reducing malpractices within the securities market
- Imparting training to intermediaries
- Buying-selling funds from the AMC directly through a broker

## UNIT -5

Capital market plays an extremely important role in promoting and sustaining the growth of aneconomy.

– It is an important and efficient conduit to channel and mobilize funds to enterprises, both private andgovernment.

– It provides an effective source of investment in the economy.

– It plays a critical role in mobilizing savings for investment in productive assets, with a view to enhancing a country's long-term growth prospects, and thus acts as a major catalyst in transforming theeconomy into a more efficient, innovative and competitive marketplace within the global arena.

– In addition to resource allocation, capital markets also provide a medium for risk management byallowing the diversification of risk in the economy

– A well-functioning capital market tends to improve information quality as it plays a major role in encouraging the adoption of stronger corporate governance principles, thus supporting a trading environment, which is founded on integrity.

– Capital market has played a crucial role in supporting periods of technological progress and economicdevelopment throughout history.

– Among other things, liquid markets make it possible to obtain financing for capital-intensive projectswith long gestation periods. This certainly held true during the industrial revolution in the 18th century and continues to apply even as we move towards the so-called “New Economy”.

– Capital markets make it possible for companies to give shares to their employees via ESOPs.

– Capital markets provide a currency for acquisitions via share swaps.

– Capital markets provide an excellent route for disinvestments to take place.

– Venture Capital and Private Equity funds investing in unlisted companies get an exit option when thecompany gets listed on the capital markets

– The existence of deep and broad capital market is absolutely crucial in spurring the growth our country. An essential imperative for India has been to develop its capital market to provide alternative sources of funding for companies and in doing so, achieve more effective mobilization of investors’ savings. Capital market also provides a valuable source of external finance.

For a long time, the Indian market was considered too small to warrant much attention. However, thisview has changed rapidly as vast amounts of both international and domestic investment have poured into our markets over the last decade. The Indian market is no longer viewed as a static universe but asa constantly evolving one providing attractive opportunities to the investing community.

**FUNCTIONS OF THE CAPITAL MARKET**

The major objectives of capital market are:

– To mobilize resources for investments.

– To facilitate buying and selling of securities.

– To facilitate the process of efficient price discovery

**Securities Market**

The Securities Market, refers to the markets for those financial instruments/claims/obligations that are commonly and readily transferable by sale. The Securities Market has two inter-dependent and inseparable segments, the new issues (primary) market and the stock (secondary) market.

**Primary Market**

The primary market provides the channel for sale of new securities, while the secondary market deals insecurities previously issued. The issuer of securities sells the securities in the primary market to raise funds for investment and/or to discharge some obligation.

In other words, the market wherein resources are mobilised by companies through issue of new securities is called the primary market. These resources are required for new projects as well as forexisting projects with a view to expansion, modernisation, diversification and upgradation.

The Primary Market (New Issues) is of great significance to the economy of a country. It is through the primary market that funds flow for productive purposes from investors to entrepreneurs. The latter usethe funds for creating new products and rendering services to customers in India and abroad. The strength of the economy of a country is gauged by the activities of the Stock Exchanges. The primary market creates and offers the merchandise for the secondary market.

**Secondary Market**

The secondary market enables those who hold securities to adjust their holdings in response to changesin their assessment of risk and return. They also sell securities for cash to meet their liquidity needs. Theprice signals, which subsume all information about the issuer and his business including associated risk generated in the secondary market, help the primary market in allocation of funds.

Secondary market essentially comprises of stock exchanges which provide platform for purchase andsale of securities by investors. The trading platform of stock exchanges are accessible only through brokers and trading of securities is confined only to stock exchanges.

The stock market or secondary market ensures free marketability, negotiability and price discharge. Forthese reasons the stock market is referred to as the nerve centre of the capital market, reflecting the economic trend as well as the hopes, aspirations and apprehensions of the investors.

This secondary market has further two components, First, the spot market where securities are traded for immediate delivery and payment, The other is futures market where the securities are traded for future delivery and payment. Another variant is the options market where securities are traded for conditional future delivery. Generally, two types of options are traded in the options market. A put option permits the owner to sell a security to the writer of the option at a

pre-determined price before acertain date, while a call option permits the buyer to purchase a security from the writer of the option ata particular price before a certain date

Depositories and script less trading, Book Building, Stock Lending Scheme, Rolling Settlement, Green Shoe Option, Responsibilities andcode of conduct for portfolio manager