BIJU PATNAIK INSTITUTE OF IT & MANAGEMENT STUDIES

MBA

SUMMER INTERNSHIP REPORT 2021

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"A Project Report on Portfolio Management of LKP Securities Ltd."

A FINAL SIP REPORT SUBMITTED

TO

BIJU PATNAIK UNIVERSITY OF TECHNOLOGY, ODISHA

(For The Partial Fulfilment of the Requirement of the Degree of MBA 2020-22)

SUBMITTED BY:

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BIJU PATNAIK INSTITUTE OF IT & MANAGEMENT STUDIES

BHUBANESWAR, ODISHA

(Recognized by AICTE, New Delhi & Affiliated to BPUT, Rourkela, Odisha)

CERTIFICATE OF INTERNAL GUIDE

This is certify that the Project work title “Portfolio Management of LKP Securities Ltd. Is a benefice work of Mr. SUBHAM AGRAWAL Reg.No.2006258214 carried out in partial fulfillment for the award of degree of MBA of Biju Patnaik University of Technology, Odisha under my guidance. This Project work is original and not submitted earlier for the award of any degree/ diploma or associate ship of any University/ Institution.

Signature of the Internal Guide

Date:

Place:

DECLARATION

I, SUBHAM AGRAWAL hereby declare that the project report titled "Study Report on Portfolio Management of LKP securities, Bhubaneswar" prepared by me under the guidance of Dr. ANKITA AGARWAL, Assistant Professor of (Marketing and Skill development) BIITM, Bhubaneswar and external assistance of Mr. RANJAN SANTI, HR Manager, LKP security Ltd, Bhubaneswar.

I also declare that this project work is towards the partial fulfilment of the university regulations for the award of degree of Master of Business Administration by Biju Patnaik University and Technology, Rourkela.

I have undergone a summer internship project for a period of 2 month. I further declare that this project is based on the original study undertaken by me and has not been submitted for the award of any degree/Diploma from any other University / Institution.

Date: **Signature of Student**

Place: **University Regd. No.**

ACKNOWLEDGEMENT

Any work visible is not the work of presenter only but there are many others behind the scene and my project report is not an exception to this. I feel happy and proud of mentioning those who motivated me and contributed directly or indirectly in making this project a success.

I take this opportunity to extend my profound thanks and deep sense of gratitude to the authorities of **LKP Securities Ltd.** for giving me an opportunity to undertake this project work in their esteemed organization. I profusely thank **Mr. Ranjan Santi** HR Manager, in particular for guiding me and helping me in successful completion of the project. I would also like to thank all the employees of the organization. I would like to thank my internal guide **Dr. Ankita Agarwal**, Assistant Professor of (Marketing and Skill development) BIITM, Bhubaneswar for providing me with facilities and help for the successful completion of my project. Last but not the least, I would like to thank my **Family, Friends** and all those who contributed directly or indirectly and helped me to overcome the hurdles I faced during the project and made the project a real success.

Date: SUBHAM AGRAWAL

Place:

EXECUTIVE SUMMARY

Portfolio management is very important to investors for their investments to earn a maximum return with minimum risk. Every investors are consider many parameters in Selection of securities to construct a good portfolio. The present project is on A Study on Portfolio Management which have been done in LKP Securities Ltd. for a duration of 2 Months which includes industry and The purpose of doing this project is to design an optimal portfolio and suggest to an customers of LKP Securities regarding proportion of investment to be made in each selected scrip using company LKP Securities Ltd. is situated in Bengaluru which is engaged in the business of multidimensional financial services. The services provided by a company include Equity broking in cash and derivative, Internet based trading, Demat services, Debt money market broking, merchant banking (category 1), Currency, Life insurance distribution and Commodity trading. The company is well versed with staff who are self-motivated and focused on their jobs. The main Sharpe's single index model. Ultimately this project helps LKP Securities Ltd. to give suggestions to its customers to have an optimal portfolio and make investment decisions.

The main benefits of implementing Portfolio Management tool will be visibility of work being done, resource allocation and planning, and other key information which can be used to ensure that resources are focused on work that provides the greatest value and contributes to the strategic goals.

A portfolio is a collection of investments held by an institution or a private individual. Portfolio management involves deciding what assets to include in the portfolio, given the goals of the portfolio owner and changing economic conditions. The study covers companies that are listed on the BSE. The present study Sensex is used as the benchmark index.

Study covers the calculation of correlations between the different securities in order to find out at what percentage of funds should be invested among the companies in the portfolio for better return. The methodology used is analytical research of 5 years data of 5 companies. The source of data used is secondary data. LKP offers a wide spectrum of services that includes Equity Broking in Cash and Derivatives, Internet based trading, Demit services & Research services.

When people deal with LKP people are dealing with a professional broker who has centralized risk Management system in place at Mumbai. LKP follows a hub & spoke model of Branch Management where in all the branches & franchise interact with the hub/regional office & In turn the regional/hub office talks to Head office. This company a great level of Flexibility in managing the risk level of the clients, which in turn benefit the client. LKP, is the first brokerage house to offer Direct Market Access (DMA) to Institutional Clients on FT Platform. They offer research based broking services on the equity as well as derivative segments to their institutional clients. It was also found that companies with high returns were not qualified for the portfolio construction as they involved high risk, which is not very helpful for investors and the aim of the study was selecting those companies which gave maximum return and minimum risk. The risk associated with the individual stock is not the same for all the years. It differs from time to time.

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INTRODUCTION

CHAPTER 1

1.1 INTRODUCTION ABOUT THE INTERNSHIP

Internships are individualized and tailored to the needs and interests of each student in the program. As part of the internship experience, students are expected to take an active role in finding an appropriate internship for themselves. This report is a short description of my 16 weeks internship. The internship is carried out in the LKP Securities Ltd., Bengaluru. The report contains information about the LKP Securities Ltd and the present internship is for a period of 16 weeks from 11 December 2016 to 31st March 2017. The report contains 5 chapters and first chapter is introduction followed by the industry and company profile followed by the theoretical background of the study followed by the analysis and interpretation of data collection and finally, the report wrap-up with a findings, suggestions and conclusion from the experience.

1.2 TOPIC CHOSEN FOR STUDY: PORTFOLIO MANAGEMENT

A portfolio is a collection of investments held by an institution or a private individual. Portfolio management involves deciding what assets to include in the portfolio, given the Goals of the portfolio owner and changing economic conditions. The unique goals andcircumstances of the investor must also be considered. Some investors are more risk averse than others. Thus, portfolio management is all about strengths, weaknesses, opportunities andthreats in the choice of debt vs equity, domestic vs international, growth vs safety and numerous other Trade-offs encountered in the attempt to maximize return at a given appetite for risk.

1.3 NEED FOR THE STUDY

The need for present study is based on the investor’s perspective, every investor having an aim to make diversification by having a large number of shares of companies in different industries or those producing different types of product lines to earn a good return. So it makes me to take this study which helps the investors to make better financial plan.

1.4 OBJECTIVES OF THE STUDY.

- To calculate the return and risk.
- To analyze the excess return to risk.
- To suggest the investment in each selected scrip.
- To understand the effect of diversification of investments.
- To suggest an optimal portfolio.

1.5 SCOPE OF THE STUDY

- The study is based on the data collected for the period from 2012 to 2016.
- The study covers companies that are listed on the BSE.
- In the present study Sensex is used as the benchmark index.
- The study considers the impact of a single market index on the different companies „Stock included in the index.
- The study covers the calculation of correlations between the different securities in order to find out at what percentage of funds should be invested among the companies in the portfolio.
- The present study would help an investor in selecting the securities for constructing an optimal portfolio that earns the maximum return at a minimum level of risk.

1.6 METHODOLOGY

The present study is empirical in nature. The data required for this study was collected from secondary sources. Data relating to stock prices were collected from the BSE website as the sample companies chosen for the study belonged to those listed on the BSE. The website used for data collection is www.bseindia.com. The data so collected was used for the

Selection of optimal portfolio. Data for a 5-year period (2010-2014) was used for portfolio construction. Sensex was used as the benchmark index. The data relating to Sensex points Are also collected from the website of BSE.

1.7 OBJECTIVES OF THE STUDY.

The literature review examines a few studies conducted in the area of optimal portfolio construction and also examines the utility of Sharpe’s single index model in optimal portfolio construction in the long run. R.Nalini (An Empirical Study on the Utility of Sharpe’s Single Index Model in Optimal Portfolio Construction, Indian Journal of Finance, September 2014, Volume 8) has made an attempt to help those investors who intend to invest in the companies and her study would help the investors to minimize their overall risk and maximize the return over a period of time. Dileep.S and Dr. G.V. Keara Rao (A Study on Suitability of William Sharpe’s Index Model in Sensex in the Indian Context, International Journal of Applied Management and Business Utility, October 2013, Volume 1) were concluded that William Sharpe’s Single Index Model will be sustainable and applicable to the Indian market and Their study suggested to the Indian investors that, they can get a better return in the secondary market for constructing a portfolio with more sectors for better diversification

1.8 LIMITATIONS OF THE STUDY

- The study is confined to the scrips included in the BSE Sensex only.
- The results of the study may not hold good for a long period of time due to volatility in the Indian stock market.
- The companies in the portfolio will change if the benchmark index is changed.
- Data relating to share prices were considered only for a period of 5 years for the construction of the portfolio.
- In this study specific data is collected and limited statistical tools are used.

CHAPTER-2

INDUSTRY AND COMPANY PROFILE

CHAPTER 2

INDUSTRY AND COMPANY PROFILE

1. INDUSTRY PROFILE

Evolution:

Indian Stock Markets are one of the oldest in Asia. Its history dates back to nearly 200 years ago. The earliest records of security dealings in India are meager and obscure. The East India Company was the dominant institution in those days and business in its loan securities used to be transacted towards the close of the eighteenth century. By 1830's business on corporate stocks and shares in Bank and Cotton presses took place in Bombay. Though the trading list was broader in 1839, there were only half a dozen brokers recognized by banks and merchants during 1840 and 1850.

The 1850's witnessed a rapid development of commercial enterprise and brokerage business attracted many men into the field and by 1860 the number of brokers increased into 60. In 1860-61 the American Civil War broke out and cotton supply from United States of Europe was stopped; thus, the 'Share Mania' in India begun. The number of brokers increased to about 200 to 250. However, at the end of the American Civil War, in 1865, a disastrous slump began.

At the end of the American Civil War, the brokers who thrived out of Civil War in 1874, found a place in a street (now appropriately called as Dalal Street) where they would conveniently assemble and transact business. In 1887, they formally established in Bombay, the "Native Share and Stock Brokers' Association" (which is alternatively known as "The Stock Exchange"). In 1895, the Stock Exchange acquired a premise in the same street and it was inaugurated in 1899. Thus, the Stock Exchange at Bombay was consolidated.

Other leading cities in stock market operations:

Ahmadabad gained importance next to Bombay with respect to cotton textile industry. After 1880, many mills originated from Ahmadabad and rapidly forged ahead. As new mills were floated, the need for a Stock Exchange at Ahmadabad was realized and in 1894 the brokers formed "The Ahmadabad Share and Stock Brokers' Association". The cotton textile industry was to Bombay and Ahmadabad, the jute industry was to Calcutta. Also tea and coal

Industries were the other major industrial groups in Calcutta. After the Share Mania in 1861-65, in the 1870's there was a sharp boom in jute shares, which was followed by a boom in tea shares in the 1880's and 1890's; and a coal boom between 1904 and 1908. On June 1908, some leading brokers formed "The Calcutta Stock Exchange Association".

In the beginning of the twentieth century, the industrial revolution was on the way in India with the Swadeshi Movement; and with the inauguration of the Tata Iron and Steel Company Limited in 1907, an important stage in industrial advancement under Indian enterprise was reached. Indian cotton and jute textiles, steel, sugar, paper and flour mills and all companies generally enjoyed phenomenal prosperity, due to the First World War.

In 1920, the then demure city of Madras had the maiden thrill of a stock exchange functioning in its midst, under the name and style of "The Madras Stock Exchange" with 100 members. However, when boom faded, the number of members stood reduced from 100 to 3, by 1923, and so it went out of existence.

In 1935, the stock market activity improved, especially in South India where there was a rapid increase in the number of textile mills and many plantation companies were floated. In 1937, a stock exchange was once again organized in Madras - Madras Stock Exchange Association (Pvt) Limited. (In 1957 the name was changed to Madras Stock ExchangeLimited). Lahore Stock Exchange was formed in 1934 and it had a brief life. It was merged with the Punjab Stock Exchange Limited, which was incorporated in 1936.

Indian Stock Exchanges - An Umbrella Growth:

The Second World War broke out in 1939. It gave a sharp boom which was followed by a slump. But, in 1943, the situation changed radically, when India was fully mobilized as a supply base.

On account of the restrictive controls on cotton, bullion, seeds and other commodities, those dealing in them found in the stock market as the only outlet for their activities. They were anxious to join the trade and their number was swelled by numerous others. Many new associations were constituted for the purpose and Stock Exchanges in all parts of the country

Were floated.

The Uttar Pradesh Stock Exchange Limited (1940), Nagpur Stock Exchange Limited (1940) and Hyderabad Stock Exchange Limited (1944) were incorporated. In Delhi two stock exchanges - Delhi Stock and Share Brokers' Association Limited and the Delhi Stocks and Shares Exchange Limited - were floated and later in June 1947, amalgamated into the Delhi Stock Exchange Association Limited.

Post-independence Scenario:

Most of the exchanges suffered almost a total eclipse during depression. Lahore Exchange was closed during partition of the country and later migrated to Delhi and merged with Delhi Stock Exchange. Bangalore Stock Exchange Limited was registered in 1957 and recognizedin 1963.

Most of the other exchanges languished till 1957 when they applied to the Central Government for recognition under the Securities Contracts (Regulation) Act, 1956. Only Bombay, Calcutta, Madras, Ahmadabad, Delhi, Hyderabad and Indore, the well-established exchanges, were recognized under the Act.
Some of the members of the other Associations were required to be admitted by the recognized stock exchanges on a concessional basis, but acting on the principle of unitary control, all these pseudo stock 20 exchanges were refused recognition by the Government of India and they there upon ceased to function.

Thus, during early sixties there were eight recognized stock exchanges in India (mentioned above). The number virtually remained unchanged, for nearly two decades. During eighties, however, many stock exchanges were established: Cochin Stock Exchange (1980), Uttar Pradesh Stock Exchange Association Limited (at Kanpur, 1982), and Pune Stock Exchange Limited (1982), Ludhiana Stock Exchange Association Limited (1983), Guwahati Stock Exchange Limited (1984), Kanara Stock Exchange Limited (at Mangalore, 1985), Magadh Stock Exchange Association (at Patna, 1986), Jaipur Stock Exchange Limited (1989), Bhubaneswar Stock Exchange Association Limited (1989), Saurashtra Kutch Stock Exchange Limited (at Rajkot, 1989), Vadodara Stock Exchange Limited (at Baroda, 1990) and recently established exchanges - Coimbatore and Meerut. Thus, at present, there are totally 23 recognized stock exchanges in India.

Trading Pattern of the Indian Stock Market:

Trading in Indian stock exchanges are limited to listed securities of public limited companies. They are broadly divided into two categories, namely, specified securities (forward list) and non-specified securities (cash list). Equity shares of dividend paying, growth-oriented companies with a paid-up capital of at least Rs.50 million and a market capitalization of at least Rs.100 million and having more than 20,000 shareholders are, normally, put in the specified group and the balance in non-specified group.

Two types of transactions can be carried out on the Indian stock exchanges:
(a) Spot delivery transactions "for delivery and payment within the time or on the date Stipulated when entering into the contract which shall not be more than 14 days following the date of the contract" &
(b) Forward transactions "delivery and payment can be extended by further period of 14 days each so that the overall period does not exceed 90 days from the date of the contract". The latter is permitted only in the case of specified shares. The brokers who carry over the outstanding pay carry over charges (cantango or backwardation) which are usually determined by the rates of interest prevailing.

A member broker in an Indian stock exchange can act as an agent, buy and sell securities for his clients on a commission basis and also can act as a trader or dealer as a principal, buy and sell securities on.

Bombay Stock Exchange (BSE):

The BSE is the oldest exchange in Asia, which is located at Mumbai and established in 1875. More than 5000 companies are listed on BSE, making it the world's top exchange in terms of listed members. In 1986, it developed the BSE SENSEX index, giving the BSE a means to measure overall performance of the exchange. In 2000, the BSE used this index to open its derivatives market, trading SENSEX futures contracts. The development of SENSEX options along with equity derivatives followed in 2001 and 2002, expanding the BSE‟s trading platform.

Over The Counter Exchange of India (OTCEI):

The traditional trading mechanism prevailed in the Indian stock markets gave way to many functional inefficiencies, such as, absence of liquidity, lack of transparency, unduly long settlement periods and benami transactions, which affected the small investors to a great extent. To provide improved services to investors, the country's first ring less, scrip less,electronic stock exchange - OTCEI - was created in 1992 by country's premier financial institutions - Unit Trust of India, Industrial Credit and Investment Corporation of India, Industrial Development Bank of India, SBI Capital Markets, Industrial Finance Corporation of India, General Insurance Corporation and its subsidiaries .compared to the traditional Exchanges, OTC Exchange network has the following advantages:

. • OTCEI has widely dispersed trading mechanism across the country which provides greater liquidity and lesser risk of intermediary charges.

• Greater transparency and accuracy of prices is obtained due to the screenbasedscripless trading.

• Since the exact price of the transaction is shown on the computer screen, the investor gets to know the exact price at which he/she is trading.

• Faster settlement and transfer process compared to other exchanges.

National Stock Exchange (NSE):

With the liberalization of the Indian economy, it was found inevitable to lift the Indian stock market trading system on par with the international standards. On the basis of the recommendations of high powered Pherwani Committee, the National Stock Exchange was incorporated in 1992 by Industrial Development Bank of India, Industrial Credit and Investment Corporation of India, Industrial Finance Corporation of India, all Insurance Corporations, selected commercial banks and others. NSE‟s flagship index, the CNX Nifty, is used extensively by investors in India and around the world as a barometer of the Indian capital markets

.

Trading at NSE can be classified under two broad categories:

(a) Wholesale debt market and

(b) Capital market.

Wholesale debt market operations are similar to money market operations –

Institutions and corporate bodies enter into high value transactions in financial instruments such as government securities, treasury bills, public sector unit bonds, commercial paper, certificate of deposit, etc.

There are two kinds of players in NSE:

(a) Trading members and

(b) Participants

Recognized members of NSE are called trading members who trade on behalf of themselves and their clients. Participants include trading members and large players like

Banks who take direct settlement responsibility.

Trading at NSE takes place through a fully automated screen-based trading mechanism which adopts the principle of an order-driven market. Trading members can stay at their 24 offices and execute the trading, since they are linked through a communication network. The prices at which the buyer and seller are willing to transact will appear on the screen. When the prices match the transaction will be completed and a confirmation slip will be printed at the office of the trading member.

NSE has several advantages over the traditional trading exchanges. They are as follows:

- NSE brings an integrated stock market trading network across the nation.

- Investors can trade at the same price from anywhere in the country since intermarket operations are stream lined coupled with the countrywide access to the securities.

- Delays in communication, late payments and the malpractices prevailing in the traditional trading mechanism can be done away with greater operational efficiency and informational transparency in the stock market operations, with the support of total computerized network.

Unless stock markets provide professionalized service, small investors and foreign investors will not be interested in capital market operations. And capital market being one of the major source of long-term finance for industrial projects, India cannot afford to damage the capital market path. In this regard NSE gains vital importance in the Indian capital market system.

COMPANY PROFILE

2.1 BACKGROUND AND INCEPTION OF THE COMPANY

LKP Securities (ISO 9002 certified) is a multi-dimensional financial services group in the field of equities markets, debt markets, corporate finance, investment banking, merchant banking, wealth management and commodities. It started as one of India's first securities brokerage houses in 1948.It is a non-banking finance company registered with RBI and a listed public limited company having a net worth of Rs142 crores as on FY 10.

It is listed on the BSE (Bombay Stock Exchange), the company has its headquarters in Mumbai. Mr. Mahindra V. Doshi is the executive chairman and is a promoter of the company. The company has a network of 414 outlets in 147 cities in India with 67,500 customers registered in retail. It has tied up Bajaj-Allianz, one of the leading insurance companies in India for distribution of their insurance products. In a 200 crore deal, LKP Forex and Thomas Cook India merged for the foreign exchange space in India. The current market capitalization stands at Rs 90.75 crore. The company has reported a consolidated sales of Rs 20.04 crore and a Net Profit of Rs 1.81 crore for the quarter ended June 2016.

LKP Securities Limited and its associates enjoy the following registrations & memberships:

- Category I Merchant Bankers with SEBI
- Membership of BSE & NSE (Capital & Debt Market)
- AMFI registered all India Mutual Fund Distributors
- Member of Commodity Exchanges MCX, NCDX and DGCX (Dubai)
- Member of NSE for Interest Rate Futures
- Member of MCX SX and NSE Currency

2.2 NATURE OF BUSINESS CARRIED

- **Equities:**

LKP offers a wide spectrum of services that includes Equity Broking in Cash and Derivatives, Internet based trading, Demat services & Research services. When people deal with LKP people are dealing with a professional broker who has centralized risk managementsystem in place at Mumbai. LKP follows a hub & spoke model of Branch management wherein all the branches & franchise interact with the hub/regional office & in turn the regional/huboffice talks to Head office. This company a great level of flexibility in managing the risk level of the clients, which in turn benefit the client.LKP is the first brokerage house to offer Direct Market Access (DMA) to Institutional Clients on FT Platform. They offer research based broking services on the equity as well as derivative segments to their institutional clients.

- **Fixed Income Securities:**

1) LKP understands Debt & Money Market in all its dimensions. Recognized as major dealer of Fixed Income Securities, they execute deals for Banks, Institutions, FIIs, MFs, Insurance companies, Primary Dealers, large Corporates, PSUs & PF Trust.

2)They are leading Merchant Banker for Primary Placement of short term & long term debts and leading intermediary on Secondary Wholesale Debt Markets

3) They deal in wide spectrum of debt instruments such as fixed and floating rate Debentures, Bonds, CDs, CPs, PTCs, Gsec, T-Bills & Oil / Fertilizer / Food Bonds

- **Retail Distribution:**

- Primary Market Division
- Mutual Funds & Insurance Advisory

- **Commodities:**

A sister concern of the renowned and trusted LKP Group, Alpha Commodities offers a complete bouquet of client- friendly services in the burgeoning Commodity Futures market. Dealing, investing or hedging in Commodity Futures which includes Bullions, Metals, Energy and Agro Commodities.

- **Currency:**

With the launch of currency derivatives, LKP offers its clients yet another segment for trading. Jointly regulated by SEBI and RBI provides traders with another lucrative trading avenue.

Currency derivative can be described as a future contract between two parties, to buy or sell the underlying at a future date, in this case the underlying being a currency.

2.3 PROMOTERS

SL.NO.	NAME	DESIGNATION
1	Mr. M.V Dhoshi	Chairman
2	Mr. V.N Suchanti	Director
3	Mr. G.B Innani	Company Secretary
4	Mr. M.S Bhise	Director
5	Mr. Pratik Doshi	Director
6	Mr. Hari Padmanabhan	Director
7	Mr. Sayanta Basu	Director
8	Mr. Anish Unadkat	Chief Executive Officer

2.4 VISION, MISSION AND QUALITY POLICY

Vision: "To become a globally renowned organization that provides state of the art trading solutions and infrastructure and to grow with latest technology and services, by delivering the best solutions by best-in-class people."

Mission: "To achieve our objectives in an environment of fairness, honesty, and courtesy towards our clients, employees, vendors and society at large."

Quality Policy: To achieve and retain leadership, LKP shall aim for complete customer satisfaction, by combining its human and technological resources, to provide superior quality financial services. In the process, LKP will strive to exceed Customer's expectations.

Quality Objectives:

As per the Quality Policy, LKP will:

• Build in-house processes that will ensure transparent and harmonious relationships with its clients and investors to provide high quality of services.

• Establish a partner relationship with its investor service agents and vendors that will help in keeping up its commitments to the customers.

• Provide high quality of work life for all its employees and equip them with adequate knowledge & skills so as to respond to customer's needs.

• Continue to uphold the values of honesty & integrity and strive to establish unparalleled standards in business ethics.

• Use state-of-the art information technology in developing new and innovative financial products and services to meet the changing needs of investors.

2.5 PRODUCTS/SERVICE PROFILE

LKP Securities is a well-established and dynamic broking house in India. Known for its state-of-the-art systems and innovative processes, LKP offers a single window advantage to its clients for all capital and money market related requirements. LKP is a one stop shop for all your financial requirements & offers a wide spectrum of services that includes

• Equity Broking in Cash and Derivatives

• Internet based trading

• Demat services

- Research
- Debt and Money Market Broking
- Merchant Banking (category 1)
- Currency
- Loan Against Shares And Margin Funding
- Merger and Acquisition (M&A)
- Commodity Trading
- AMFI registered all India Mutual Fund Distributors
- IPO (New Issue) distribution
- Life Insurance distribution

Value Added Services:

- Research and Advisory Services
- Margin Funding
- Technology that guarantees seamless connectivity for trading
- Flexibility of a local broking house and sophistication of corporate brokerage
- A dedicated Relationship Manager to help in sales and other business related queries

- 24x7 Online Back-office systems for the Partner as well as all their customers.

LKP is dedicated to serving the needs of their customers and, to that end, focuses on providing a high level of specialized and personal service. Their highly experienced broking teams, provide the trader with everything they need in a competitive market. Unlike most broking houses that rely either on Technical or fundamental analysis, they at LKP believe in a blend of both, which ensures the accuracy and quality of their research.

Over the years LKP has been able to deliver a consistently high level of service and professionalism whilst meeting customer requirements. This is in great part due to the stability of its management, broking, trading and administration teams.

2.6 AREAS OF OPERATION

The company is in the field of financial Services such as issue management, bill discounting, leasing and hire-purchase, full-fledged money changing and has also started providing travel related Insurance Policy to bound passengers, etc. It has presence in 147 cities through its network of longstanding franchisees and sub brokers.

2.7 INFRASTRUCTURE FACILITY

• Secured and sophisticated systems, operation processes and clear Risk management policies to handle high volumes business

• 1500+ Outlets across India Covering 200 cities in the country, including 7 regional offices at Delhi, Kolkata, Pune, Ahmedabad , Bangalore , Chennai and Gujarat

- Research covers a wide spectrum from macroeconomics forecasts to penetrating analysis of companies and sectors; the research is highly rated for its accuracy, clarity and comprehensive coverage which include Fundamental Analysis, Technical Analysis & daily research reports. Research also covers Fixed Income Markets, Mutual Fund, and Schemes & Commodities Markets.

• A broad-based team of more than 300 personnel

2.8 COMPETITORS INFORMATION

1. VLS FINANCE LTD:

VLS Group is a multi-faceted multi-divisional integrated financial services group with major presence in almost all areas of financial services such as Asset Management, Strategic Private Equity Investments, and Arbitrage and more particularly in Stock broking and Corporate Consulting & Advisory Services. The current market capitalization stands at Rs177.07 crore. The company has reported a standalone sales of Rs 896.82 crore and a Net Profit of Rs 1.76 Crore for the quarter ended September 2016.

2.BNK SECURITIES PRIVATE LTD:

BNK Securities Pvt. Ltd. (ISO 9001:2008 Certified) is the member of National Stock Exchange, Bombay Stock Exchange, DP with CDSL and the company is also the member of MCX-SX and Calcutta Stock Exchange (CSE).

It provides broking and depository services to a lot of high net worth investors, corporate and business houses, financial institutions, banks and mutual funds. It is also involved in distribution of financial products. The current market capitalization stands at Rs 48.85 crore. The company has reported a standalone sales of Rs 0.74 crore and a Net Profit of Rs 2.71 Crore for the quarter ended September 2014.

3.GEOJIT BNP PARIBAS:

Geojit BNP Paribas has membership in, and is listed on, the National Stock Exchange (NSE) and the Bombay Stock Exchange (BSE).

The company rides on its rich experience in the capital market to offer its clients a wide portfolio of savings and investment solutions.

The gamut of value-added products and services offered ranges from equities and derivatives to Mutual Funds, Life & General Insurance and third party Fixed Deposits. The current market capitalization stands at Rs 869.44 crore. The company has reported a consolidatedsales of Rs 66.38 crore and a Net Profit of Rs 17.65 crore for the quarter ended December 2016.

4. R K GLOBAL SHARES & SECURITIES LTD:

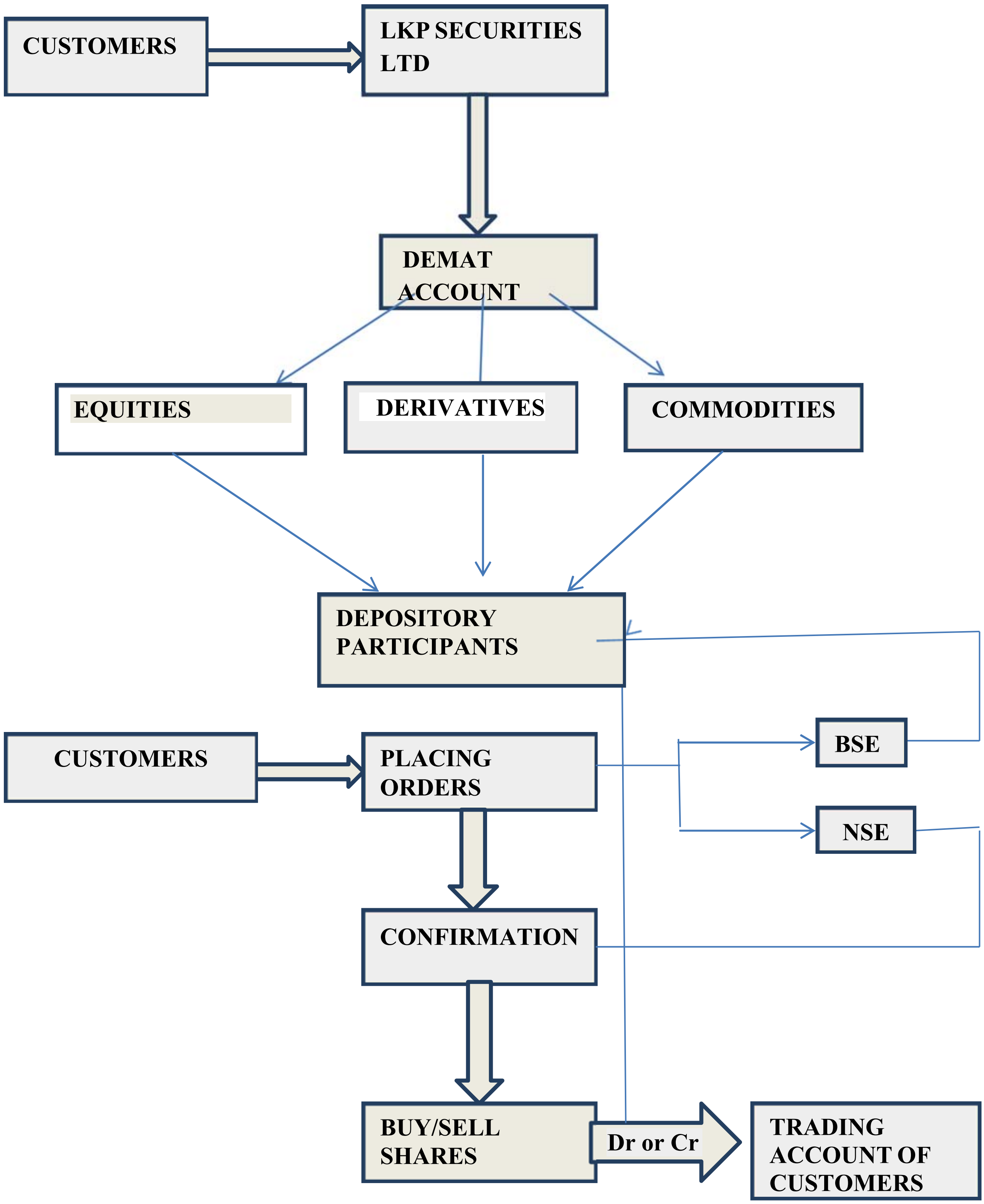
R K Global is India based fastest growing Share and Commodity Broking Company. RK Global launched its retail brokering business in year 2004 and since then grown exponentially. Company today provides services under Equities, Derivatives, Commodities, Currency, Depository, IPO Distribution, Mutual Fund Distribution and Consultancy areas. RK Global today has Pan India presence with its product offerings in over 150 cities across India though its business associates.

5. ZERODHA:

Zerodha is a Bangalore, India based Flat Free Share Broker for trading in Stock, Commodity and Currency Derivative. It charges brokerage of 0.01% or Rs.20 per executed order, whichever is lower, irrespective to number of shares or their prices . Zerodha is first and No. 1 discount broker in India by volume, number of customers and growth. Like other online stock trading companies, Zerodha offers trading services to buy & sell stocks, futures & options (in Equity, Currency & Commodity segments). Zerodha's share trading platform is powered by Omnesys 'NEST Trader'.

2.9 WORK FLOW MODEL

LKP SECURITIES BENGALURU (Branch Office)



2.10 ACHIEVEMENT/AWARD

- LKP Forex, a division of the company has entered into a strategic tie-up with the Joint frequent flyer program of Air India and Indian Airlines.

- LKP is India"s first financial group to be awarded the prestigious ISO 9002 certified KPMG Quality Registrar, USA, for certain businesses.

2.11 FUTURE GROWTH AND PROSPECTS

In an ever-evolving market, they constantly seek value for their clients and they intend to add more services to their existing Investment Banking bouquet and be the preferred choice for clients for their fund raising and advisory needs. Some of their plans include:

- Value-based proactive Portfolio Management Services (PMS) to Resident and Non-Resident Indians.

- Significant market-share in Commodities Futures Trading Segment in India.

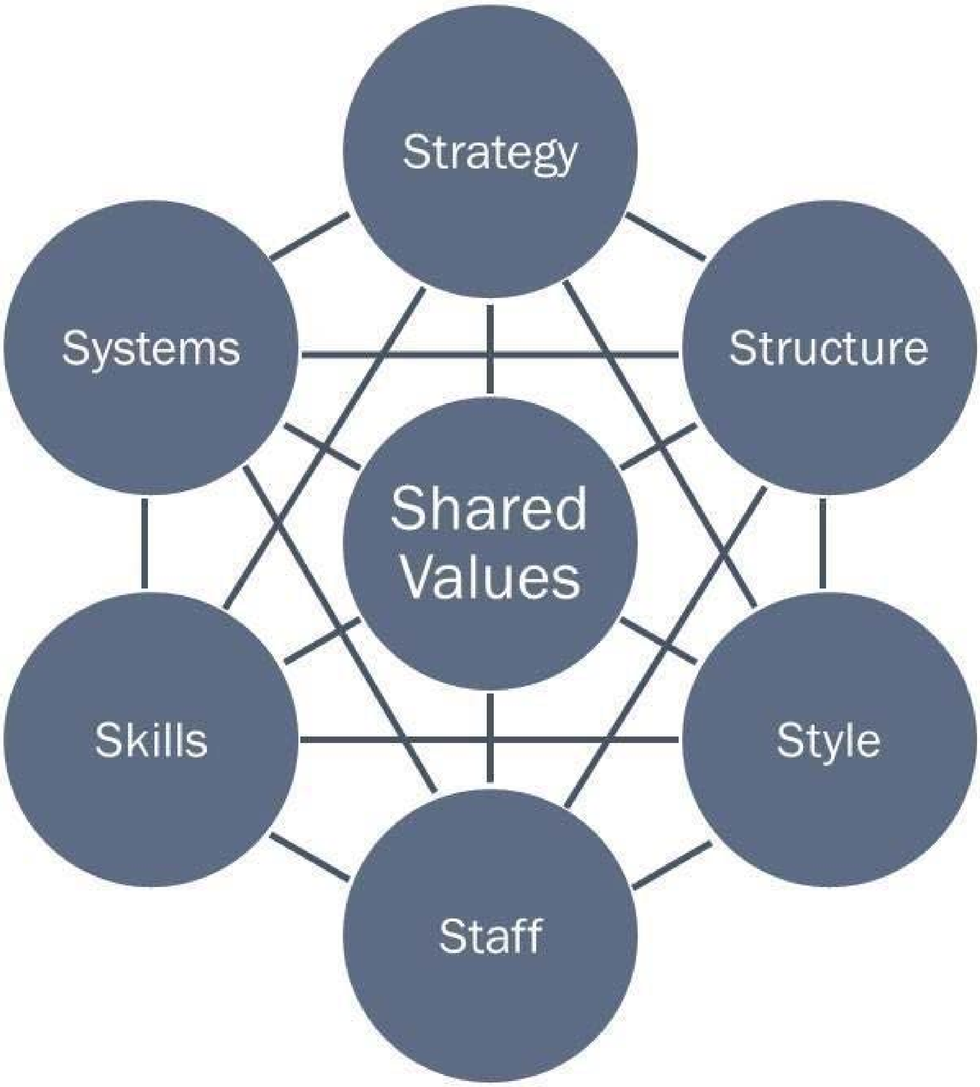
- Value based Global Portfolio and Asset Allocation access to Resident Indians.

- Clearing, execution and custodian services for Non-Resident Indians, Foreign Institutional Investors and Overseas Corporate Bodies.

- Debt market trading in both Retail and Whole-sale segment for resident investors as well as overseas bodies.

2.12 McKINSY'S 7S FRAME WORK MODEL

The McKinsey 7S framework is developed in the early 1980s by Tom Peters and Robert Waterman, two consultants working at the McKinsey & Company consulting firm, the basic premise of the model is that there are seven internal aspects of an organization that need to be aligned if it is to be successful. The 7S model can be used in a wide variety of situations where an alignment perspective is useful. These factors affect an organization's ability to implement new strategies.



SYSTEMS:

Here the company follows the system of "Team Leadership" here the management gives the authority for the team leader and carry on the work under their guidance and several team leaders are linked to one manager or the superior person. Other than these the other systems of the company are Managing / sharing customer information, unified reporting of digital marketing effectiveness, Campaign planning approach- integration.

STRUCTURE:

It prescribes the formal relationship that should exist among various position and activities. It is the duty of the top management to design the organization structure of an organization. It is one of the critical tasks. The designing of the super structure involves issues like division of organization tasks and allocation of responsibilities between various departments.

STYLE:

Style stands for the patterns of actions taken by the top management over a period of time. In LKP Securities, the decisions are taken by the top management concerning matters related to the organization. The decisions relating to department matters are taken by the departmental heads. LKP follows a participative leadership style which allows the ideas, suggestions etc. for the betterment of the company. The team members are cooperative rather than being competitive.

STAFF:

Each incumbent should have a specific academic qualification to match the position he is going to hold and also necessary skills to execute the assignment. The departments in the organization consist of Senior Manager, Officers, Clerks and sub-staff. Specialized trainings to the Senior Management level/ Top level executives are conducted based on the requirement.

SKILLS:

Skill is an ability or proficiency in performing particular task. Training policies and programs are suitably designed, modified and updated on a continuous basis to upgrade the knowledge levels and skills of its Executives, Officers, and Workmen on par with the best in the industry. While several new programs are introduced in tune with the corporate goals, the existing programs are made more interactive and learner friendly.

STRATEGY:

A company of LKP Securities stature cannot afford to work without objectives. An overall group objective is already set and all the employees are driven towards LKP Securities believes that no individual is big as the organizational itself. Competition is the key to survival and for giving diversification for the given product as such competition is always good. LKP Securities updates itself to the surrounding competitions and bring out changes are services and related products to be in competitors.

SHARED VALUES:

Values refer to the institutional standards of behavior that strengthen commitment to the objectives, and guide strategy formulation and purposive action. The core values are shaped around the belief that enterprises exist to serve society. In terms of this belief, profit is a means rather than an end in itself a compensation to owners of capital linked to the effectiveness of contribution to society and the essential ingredient to sustain such enlarged societal contribution.

2.13 SWOT ANALYSIS

STRENGTHS:

Company provide a superior customer service

- LKP‟s having an innovative range of financial products
- LKP is known for transparent functioning
- Emphasis on building stronger bond with customers by a company
- Company with well diversified portfolio.

WEAKNESS:

- LKP‟s having a limited sales executives
- Low advertisements from the company

OPPORTUNITY:

- Growing consumer awareness about equity related product
- Positive outlook of people towards financial products
- Growing rural market is the best opportunity for the company.

THREATS:

- Uncertainty of the market volatility and fluctuations in the stock prices
- Threat from new entrants into the field of stock broking
- Stringent economic measures by Government and RBI

2.14 FINANCIAL STATEMENT ANALYSIS

PROFIT AND LOSS STATEMENT

PARTICULARS	2014	2015	2016
I. Revenue from operations	21,01,28,282	34,55,39,116	35,24,85,449
II. Other income	1,19,40,331	7,72,145	32,31,142
III. Total Revenue	**22,20,68,613**	**34,63,11,261**	**35,57,16,591**
IV. Expenses:			
Employee benefits expense	4,15,43,868	3,52,53,883	5,06,78,423
Finance costs	7,68,80,452	16,75,79,216	19,44,90,307
Depreciation	4,46,304	9,82,526	15,74,568
Other expenses	2,55,10,346	3,72,63,364	3,82,09,040
Provision for standard assets	31,75,949	21,25,660	-
V. Total Expenses	**14,75,56,919**	**24,32,04,650**	**28,49,52,338**
VI. Profit before tax	**7,45,11,694**	**10,31,06,612**	**7,07,64,252**
VII.Tax expense for the year	**2,58,68,461**	**3,56,18,834**	**(40,05,191)**
VIII. Profit after tax	**4,86,43,233**	**6,74,87,778**	**7,47,69,443**

BALANCE SHEET

Particulars	2014	2015	2016
I. EQUITY AND LIABILITIES			
1 Shareholder's funds			
a) Share capital	13,07,74,890	12,34,39,940	12,19,80,230
(b) Reserves and surplus	142,16,86,701	142,12,08,388	146,00,24,775
2 Non-current liabilities			
(a) Long-term borrowings	4,04,74,724	8,10,95,893	15,72,092
(b) Long-term provisions	31,75,949	53,01,609	38,62,341
(c) Deferred tax liability	-	-	1,31,822
3.Current liabilities			
(a) Short-term borrowings	105,51,38,428	133,60,22,790	79,06,91,548
(b) Trade payables	5,54,52,366	3,19,67,280	2,97,47,330
(c) Other current liabilities	56,69,677	19,58,19,880	1,49,22,284
(d) Short-term provisions	3,03,97,969	2,86,17,190	2,83,53,695
TOTAL	**274,27,70,704**	**322,34,72,970**	**245,12,86,117**
II. ASSETS			
1 Non-current assets			
a) Fixed assets (Tangible Assets)	45,24,494	83,08,968	76,24,150
(b) Non-current Investments	66,48,49,021	40,70,77,610	36,84,44,230
c) Deferred tax asset	3,60,49,414	1,68,127	-
(d) Long-term loans and Advances	6,70,000	2,20,000	3,85,000
2 Current assets			
(a) Inventories (Securities)	48,29,92,120	42,94,18,522	29,32,61,883
(b) Trade receivables	4,40,34,188	5,42,078	37,89,972
(c) Cash and cash Equivalents	28,39,75,884	25,98,61,075	23,70,19,442
(d) Short-term loans and Advances	122,56,75,583	211,78,76,590	154,07,61,440
TOTAL	**274,27,70,704**	**322,34,72,970**	**245,12,86,117**

RATIOS

LIQUIDITY RATIOS:

SL. NO.	RATIO	FORMULA	2014	2015	2016
1	**Current Ratio**	Current assets/ Current liabilities	2036677775/ 1146658440 =1.78	2807698265/ 1592427140 =1.76	2074832737/ 863714857 =2.40
2	**Quick Ratio**	Liquid assets/ Current liabilities	1553685655/ 1146658440 =1.35	2378279743/ 1592427140 =1.49	1781570854/ 863714857 =2.06
3	**Cash Ratio**	Cash/ Current liabilities	283975884/ 1146658440 =0.25	259861075/ 1592427140 =0.16	237019442/ 863714857 =0.27

LEVERAGE RATIOS:

SL. NO.	RATIO	FORMULA	2014	2015	2016
1	**Debt-Equity Ratio**	**Debt/Equity**	1190309113/ 1552461591 =0.77	1678824642/ 1544648328 =1.09	869281112/ 1582005005 =0.55
2	**Debt to Assets Ratio**	**Debt/Total assets**	1190309113/ 3742770704 =0.43	1678824642/ 3223472970 =0.52	869281112/ 2451286117 =0.35
3	**Net worth Ratio**	**Net worth/Total assets**	1552461591/ 2742770704 =0.57	1544648328/ 3223472970 =0.48	1582005005/ 2451286117 =0.65

PROFITABILITY RATIOS:

SL. NO	RATIO	FORMULA	2014	2015	2016
1	Earnings Margin Ratio	Profit after tax/ Turnover $\times 100$	48643233/ 210128282 $\times 100$ =23.15%	67487778/ 345539116 $\times 100$ =19.53%	1582005005/ 2451286117 $\times 100$ =21.21%
2	Return on capital	Profit before tax Capital /employed $\times 100$	74511694/ 1596112264 $\times 100$ =4.67%	103106612/ 1631045830 $\times 100$ =6.32%	70764252/ 1587571260 $\times 100$ =4.46%
3	Return on equity	Profit after tax/ Shareholder's fund $\times 100$	48643233/ 1552461591 $\times 100$ =3.13%	67487778/ 1544648328 $\times 100$ =4.37%	74769443/ 1582005005 $\times 100$ =4.73%

ANALYSIS:

From the above financial statement analysis, the LKP securities is in growth stage. The liquidity ratios are increased in 2016; it shows the company can more easily make its short term debt payments.

In leverage ratios analysis, the debt-equity ratio is decreased from 1.09 in 2014 to 0.55 in 2016, it implies a more financially stable business or less risky to creditors and investors.And the debt to assets ratio is 0.35 in 2016, it shows 35% of company assets have been financed by debt and there is a lower the degree of financial risk. And net worth ratio is increased from 0.57 in 2014 to 0.65 in 2016; this increase in net worth indicates good financial health of a company.

In profitability ratios analysis, the earnings margin ratio is decreased from 23.15% in 2016 to 19.53% in 2015 which in turn increased to 21.21% in 2016, it measure how effectively a company can convert turnover into net income. An extremely low profit margin would indicate the expenses are too high and the management needs to budget and cut expenses.And return on capital employed ratio is decreased from 6.32% in 2015to 4.46% in 2016, it indicates that less favorable because fewer rupees of profits are generated by each rupee of capital employed. And return on equity ratio is gradually increased from 3.13% in 2014 to 4.37% and 4.73% in 2015 and 2016 respectively, it shows a company can use the money from shareholders to generate profits and grow the company. Therefore, the overall financial

Statement analysis shows a LKP Securities Ltd is in good financial position and well performed growing company.

2.15 LEARNING EXPERIENCE

The opportunity of undergoing an in plant training for ten weeks duration is being capitalized by me for increasing my knowledge base by working at LKP Securities Ltd. I am privileged to highlight some of the learning experience got from this training.

- It helped to link the theories, techniques and practices of management with different activities of the organization in trading operations.
- It increased my conceptual understanding of the subject security analysis and its trading tools.

CHAPTER-3

THEORETICAL BACK GROUND OF THE STUDY

CHAPTER 3

THEORETICAL BACKGROUND OF THE STUDY

INTRODUCTION:

Constructing an investment portfolio depends on the nature of the investor. Understanding market instruments and market movements can help one understand the market. Portfolio management is the process of combining the broad asset classes to yield optimum return with minimum risk.

Individual securities have risk-return characteristics of their own. The return expected from a security is variable, and this variability of returns is termed as „risk". Investors do not invest their entire wealth in a single security. If the price of that security falls, the investor may have to incur heavy losses. Investors vary depending upon their risk bearing ability, and can be categorized as high risk bearing, moderate risk bearing, and low risk bearing investors.

The portfolios are created depending upon the risk bearing potential of the investors. The process of creating a portfolio is called diversification. While creating a portfolio, investors do not invest in securities belonging to only one industry. However, they invest in different types of industries to spread their risk. This results in diversification of risk. If one of the industry's share prices fall, and the returns from those securities are affected, it may be compensated through the returns from the securities belonging to other sectors. Another important question pertains to how many portfolios may be constructed. From a given set of securities, any number of portfolios can be constructed, and the investor has to decide about the portfolio that needs to be selected.

Rational investors search for the most efficient of these portfolios. This leads to the construction of optimal portfolios. The major objective of optimal portfolio construction is to design a portfolio that provides the highest return with the lowest risk. Such a portfolio is known as an „optimal portfolio". The conceptual framework for determining the optimal portfolio is disciplined, and the same has been provided by Harry Markowitz in his pioneering work on portfolio analysis (Markowitz, 1952, 1959). His method of portfolio selection came to be known as the Markowitz model. Markowitz's works mark the beginning

Of today’s modern portfolio theory. Markowitz showed that for a given level of expected return and for a given security universe, finding a specific portfolio that dominates the others requires knowledge of the co-variance or correlation matrix between all possible security combinations. Subsequent to the publication of his paper, numerous investment firms and portfolio managers began to program “Markowitz Algorithms”, which prescribed portfolio proportions so as to minimize portfolio variance. Even today, the term Markowitz diversification refers to portfolio construction accomplished using security covariance. If a risk-free asset is included in a portfolio, the investor can invest part of his money in it and theremaining in the risky asset. It is assumed that the investor would be able to borrow money at the risk-free rate of interest. When a risk-free asset is included in the portfolio, the feasible efficient set of the portfolios gets altered.

PORTFOLIO ANALYSIS:

Various groups of securities when held together behave in a different manner and give interest payments and dividends also, which are different to the analysis of individual securities. A combination of securities held together will give a beneficial result if they are grouped in a manner to secure higher return after taking into consideration the risk element. There are two approaches in construction of the portfolio of securities. They are

- ## TRADITIONAL APPROACH:

Traditional approach was based on the fact that risk could be measured on each individual security through the process of finding out the standard deviation and that security should be chosen where the deviation was the lowest. Traditional approach believes that the market is inefficient and the fundamental analyst can take advantage of the situation. Traditional approach is a comprehensive financial plan for the individual. It takes into account the individual need such as housing, life insurance and pension plans. Traditional approach basically deals with two major decisions.
They are

a) Determining the objectives of the portfolio

b) Selection of securities to be included in the portfolio

➢ MODERN APPROACH:

Modern approach theory was brought out by Markowitz and Sharpe. It is the combination of securities to get the most efficient portfolio. Combination of securities can be made in many ways. Markowitz developed the theory of diversification through scientific reasoning and method. Modern portfolio theory believes in the maximization of return through a combination of securities. The modern approach discusses the relationship between different securities and then draws inter relationships of risks between them. Markowitz gives more attention to the process of selecting the portfolio. It does not deal with the individual needs.

When the number of securities considered for portfolio construction increase, the required number of covariance to be computed also increase. This is the major disadvantage of the Markowitz model. So, in order to overcome the disadvantage associated with the Markowitz model, the Single index model was developed by William J. Sharpe. His model is computationally easy as it compares securities performances with a benchmark, rather than with one another. It requires only one beta statistics per security rather than numerous pair wise comparisons. Thus, Sharpe's single index model is very useful for optimal portfolio construction. The present study is aimed at studying the utility of Sharpe's single index model in optimal portfolio construction.
The popular Sharpe's single index model was used to test its utility in optimal portfolio construction. The basic equation underlying the Sharpe's single index model is:

$R_i = \alpha_i + \beta_i(R_m) + e_i$
Where,
R_i= Expected return on security I,
α_i= Intercept of the straight line,

R_m= Rate of return on market index,

β_i= Slope of straight line

e_i= the error term

This model assumes co-movement of share prices and index

- **Stock Return:** The total gain or loss experienced on an investment over a given period of time is calculated by dividing the assets cash distributions during the period plus change in value by its beginning of period investment value is termed as return.

Stock Return =

$$\frac{\text{Current year price} - \text{Previous year price}}{\text{previous year price}} \times 100$$

- **Market Return:** Market return is the return on the market portfolio of all traded securities.

Market Return =

$$\frac{\text{Current year index} - \text{Previous year index}}{\text{previous year index}} \times 100$$

❖ **Arithmetic Mean Return (AM) :** Statistics useful in portfolio construction deal with a series of holding period returns. It is important that all the holding periods be of Equal length. The arithmetic average of these is called arithmetic mean return.AM =

$$\frac{\Sigma R_i}{N}$$

Where,

N= Number of year,

R_i= Return of stock or market index

Risk: According to Sharpe's single index model, risk is divided into two that is, systematic risk and unsystematic risk. Systematic risk is $\beta_i^2 \times \sigma_m^2$ and unsystematic risk is σ_{ei}^2. The stock variance includes both systematic and unsystematic risk.

$$\sigma_i^2 = \beta_i^2 \sigma_m^2 + \sigma_{ei}^2$$

The unsystematic risk can found out as follows:

$$\sigma_{ei}^2 = \sigma_i^2 - \beta_i^2 \sigma_m$$

- **Beta and its Interception:** Beta is the relative measure of non-diversifiable risk. It is an index of degree of movement of an assets return in response to a change in the Market return. In the present study, the following formula was used to compute beta:

$$\beta_i = (\Sigma R_i - \bar{R}_i)(\Sigma R_m - \bar{R}_m) / \Sigma (R_m - \bar{R}_m)^2$$

- **Risk-free Rate of Return (R_f):** It is the required return on a risk-free asset. For the study, the risk free rate of return is assumed as 5%, which is the rate on a 10 year Bond in India.

- **Sharpe's Single Index Model:** The essence of Sharpe's single index model is that stocks vary together because of the common movement in the stock market. The movement of stocks with a market index may be studied with the help of a simple linear regression analysis, taking the returns on an individual security as the independent variable (R_i) and the returns on the market index (R_m) as the independent variable.

- **Excess Return to Beta Ratio:** Excess return to beta ratio shows the return from the investment in excess to the risk taken by the investor.

Excess return to beta =

$$\frac{R_i - R_f}{\beta_i}$$

Where,

R_i= The expected return on stock „I‟,

R_f= The return on ariskless asset,

β_i= Systematic risk of stock „i‟.

The following 5 companies listed on the BSE have been included in the study such as,

- Maruti Suzuki India Ltd.

- Larsen Toubro Ltd

.

- Hero Motocorp Ltd.

- Cipla Ltd.

- Bharat Petroleum Corporation Ltd. (BPCL)

CHAPTER-4

DATA ANALYSIS AND INTERPRETATION

CHAPTER 4

DATA ANALYSIS AND INTERPRETATION

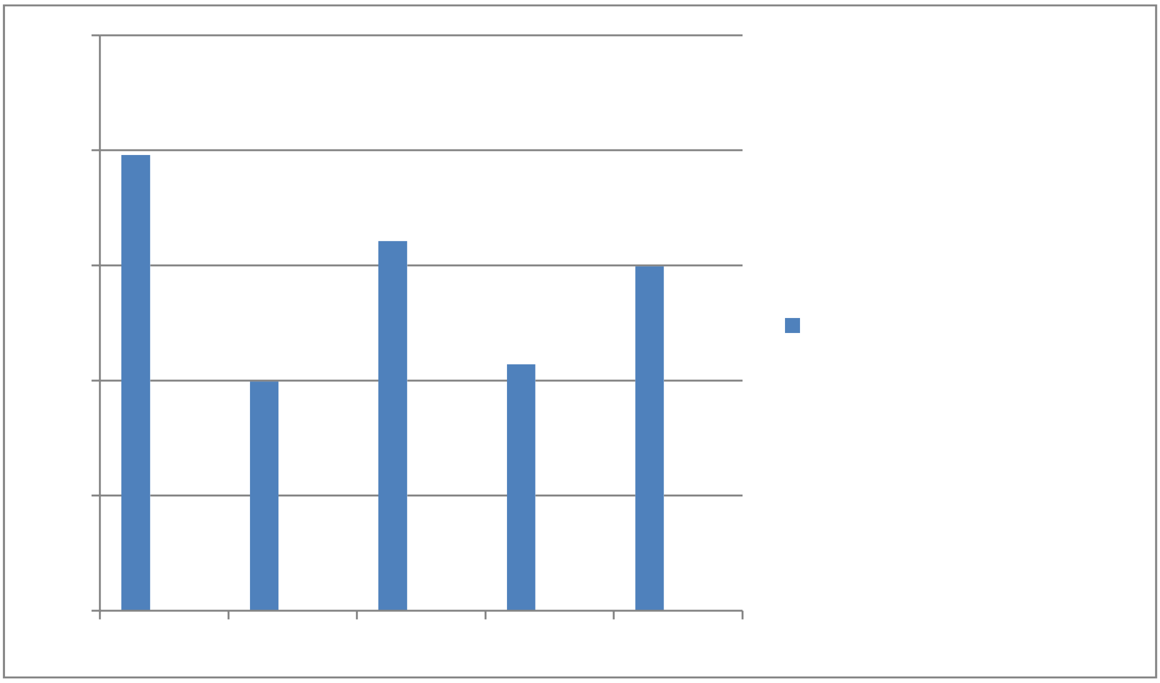
Tables Showing Calculation of Return and Risk

TABLE4.1:CLOSING STOCK OF MARUTI SUZUKI INDIA LTD:

YEAR	CLOSING PRICE	R_i	$(R_i - \bar{R}_i)$	$(R_i - \bar{R}_i)^2$	$(R_m - \bar{R}_m)$	$(R_i - \bar{R}_i)(R_m - \bar{R}_m)$
2012	1420.60	-8.92	-33.89	1148.53	5.96	-201.98
2013	920.05	-35.24	-60.21	3625.24	-36.11	2174.18
2014	1488.95	61.83	36.86	1358.66	14.23	524.52
2015	1763.00	18.41	-6.49	42.12	-2.49	16.16
2016	3328.30	88.79	63.82	4072.99	18.42	1175.56
		ΣR_i =124.87		**$\Sigma(R_i - \bar{R}_i)^2$ =10247.55**		**$\Sigma(R_i - \bar{R}_i)(R_m - \bar{R}_m)$ =3688.44**

$\bar{R} = \Sigma R_i / N = 24.97$ $\sigma_i = \sqrt{(R_i - \bar{R}_i)^2} = \sqrt{2049.51} = 45.27 = 2049.51 - (1.95\times1.95\times377.49) = 614.10$

GRAPH 4.1: SHOWING CLOSING STOCK OF Maruti Suzuki India LTD.



GRAPH 4.1 : SHOWING CLOSING STOCK OF MARUTI SUZUKI INDIA LTD

INTERPRETATION: Closing stock for the year 2016 is the highest comparatively which shows the unsold stock of the business for the particular year *helpful to arrive cost of goods sold in a periodic inventory system ,thus sales for the year lacks from Rs3328.30. The unsold stock will be carried to next* year as the opening stock same as the closing stock for the company, sales of 2013 and 2014 is better compared to rest of the years.

TABLE 4.2.CLOSING STOCK OF LARSEN TOUBRO LTD:

YEAR	CLOSING PRICE	R_i	$(R_i - \bar{R}_i)$	$(R_i - \bar{R}_i)^2$	$(R_m - \bar{R}_m)$	$(R_i - \bar{R}_i)(R_m - \bar{R}_m)$
2012	1979.05	17.84	10.20	104.04	5.96	60.79
2013	995.10	-49.72	-56.92	3239.89	-36.11	2055.38
2014	1605.85	61.38	54.18	2935.47	14.23	770.98
2015	1069.90	-33.37	-40.57	1645.92	-2.49	101.02
2016	1496.50	39.87	32.67	1067.33	18.42	601.78
		ΣR_i **=36.00**		$\Sigma(R_i - \bar{R}_i)^2$ **=8992.65**		$\Sigma(R_i - \bar{R}_i)(R_m - \bar{R}_m)$ **=3589.95**

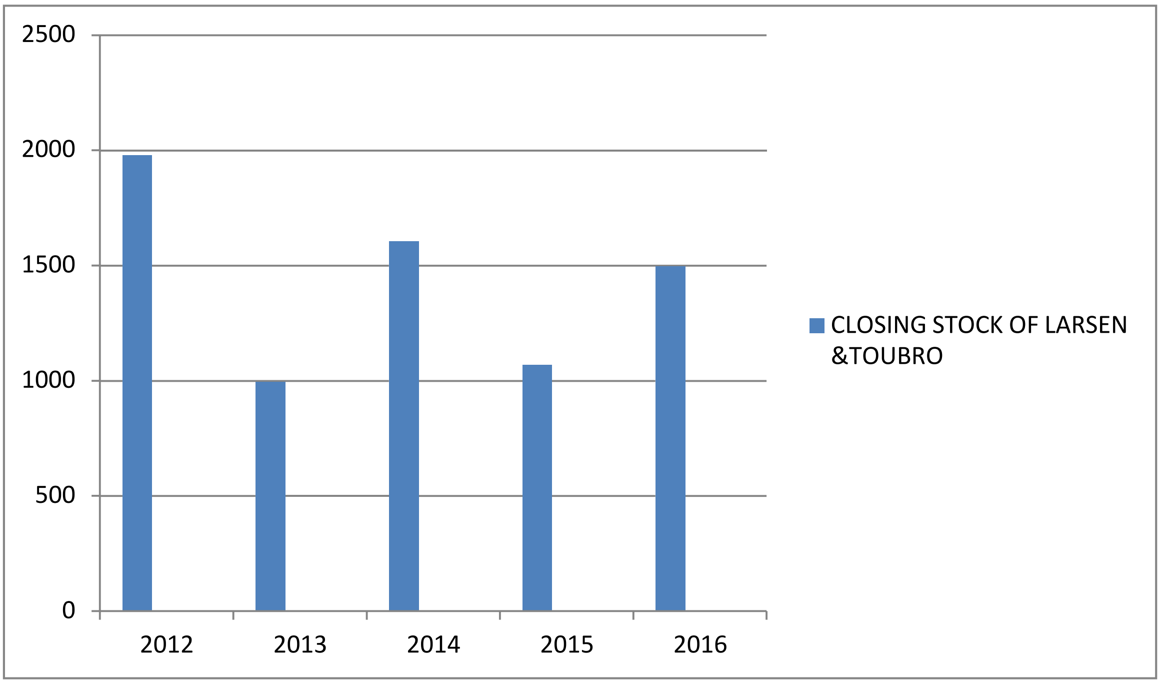
$\bar{R}_i=7.20$

$\sigma_i=\sqrt{1798.53}=42.41$

$\beta_i=1.90$

$\sigma^2_{ei}=1798.53-(1.90\times1.90\times377.49)=435.79$

GRAPH 4.2: SHOWING CLOSING STOCK OF LARSEN & TOUBRO LTD.



INTERPRETATION: Closing stock of 2012 is more comparatively **which shows the unsold stock of the business for the particular year also helpful to arrive cost of goods sold in a periodic inventory system ,thus sales for the year lacks from Rs1979.05. The unsold stock will be carried to next year at the opening stock same as the closing stock for the company. Sales in 2013 and 2015 of Larsen & Toubro is relatively better compared to rest of the years.**

TABLE 4.3 CLOSING STOCK OF HERO MOTOCORP LTD:

YEAR	CLOSING PRICE	R_i	$(R_i - \bar{R}_i)$	$(R_i - \bar{R}_i)^2$	$(R_m - \bar{R}_m)$	$(R_i - \bar{R}_i)(R_m - \bar{R}_m)$
2012	1986.10	15.88	1.82	3.31	5.96	10.85
2013	1905.25	-4.07	-18.13	328.70	-36.11	654.67
2014	1898.35	-0.36	-14.42	207.94	14.23	-205.20
2015	2074.80	9.29	-4.77	22.75	-2.49	11.88
2016	3103.40	49.58	35.52	1261.67	18.42	654.28
		ΣR_i **=70.32**		$\Sigma(R_i - \bar{R}_i)^2$ **=1824.37**		$\Sigma(R_i - \bar{R}_i)(R_m - \bar{R}_m)$ **=1126.48**

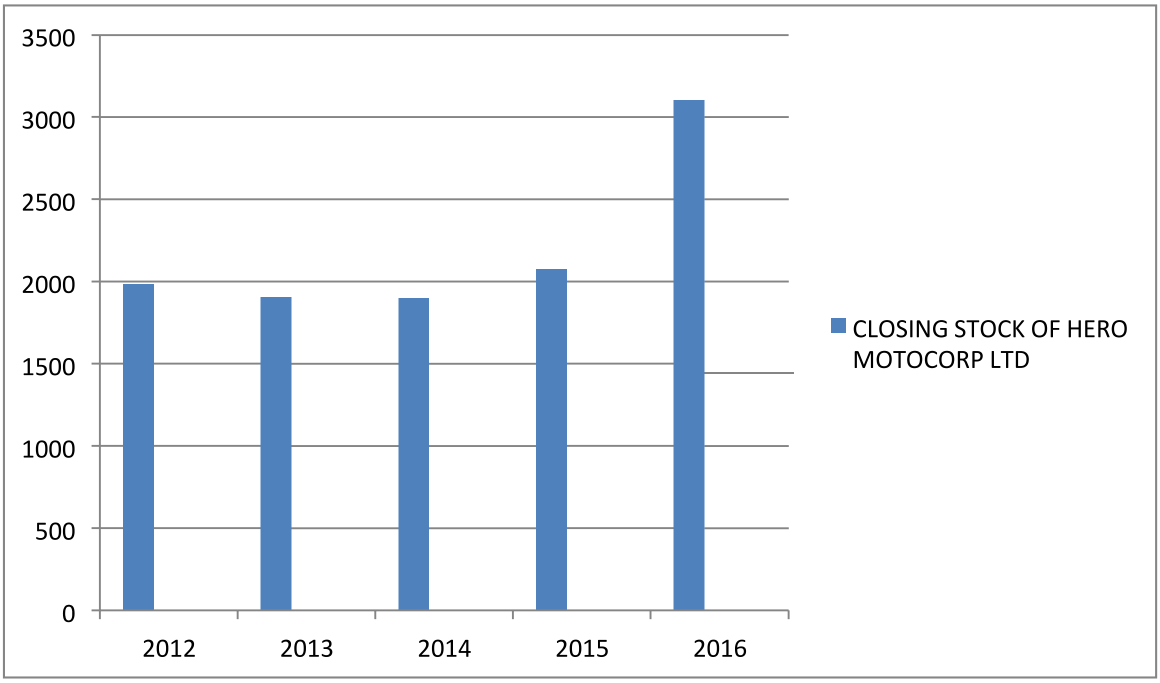
$\bar{R}_i = 14.06$

$\sigma_i = \sqrt{364.87} = 19.10$

$\beta_i = 0.60$

$\sigma^2_{ei} = 364.87 - (0.60 \times 0.60 \times 377.49) = 228.97$

GRAPH4.3: SHOWING CLOSING STOCK OF HERO MOTOCORP LTD



INTERPRETATION: Closing stock of 2016 is more comparatively which shows the unsold stock of the business for the particular year also helpful to arrive cost of goods sold in a periodic inventory system ,thus sales for the year lacks from Rs3103.4 The unsold stock will be carried to next year as the opening stock same as the closing stock for the company. sales of hero motocorp ltd is better in 2013 and 2014 compared to rest of the years.

4.4CLOSING STOCK OF CIPLA LTD:

YEAR	CLOSING PRICE	R_i	$(R_i - \bar{R}_i)$	$(R_i - \bar{R}_i)^2$	$(R_m - \bar{R}_m)$	$(R_i - \bar{R}_i)(R_m - \bar{R}_m)$
2012	369.90	10.22	-5.61	31.47	5.96	-33.44
2013	369.90	-13.61	-29.44	866.71	-36.11	1063.08
2014	414.10	29.59	13.76	189.34	14.23	195.80
2015	400.55	-3.27	-19.10	364.81	-2.49	47.56
2016	625.80	56.24	40.41	1632.97	18.42	744.35
		ΣR_i **=79.17**		$\Sigma(R_i - \bar{R}_i)^2$ **=3085.30**		$\Sigma(R_i - \bar{R}_i)(R_m - \bar{R}_m)$ **=2017.35**

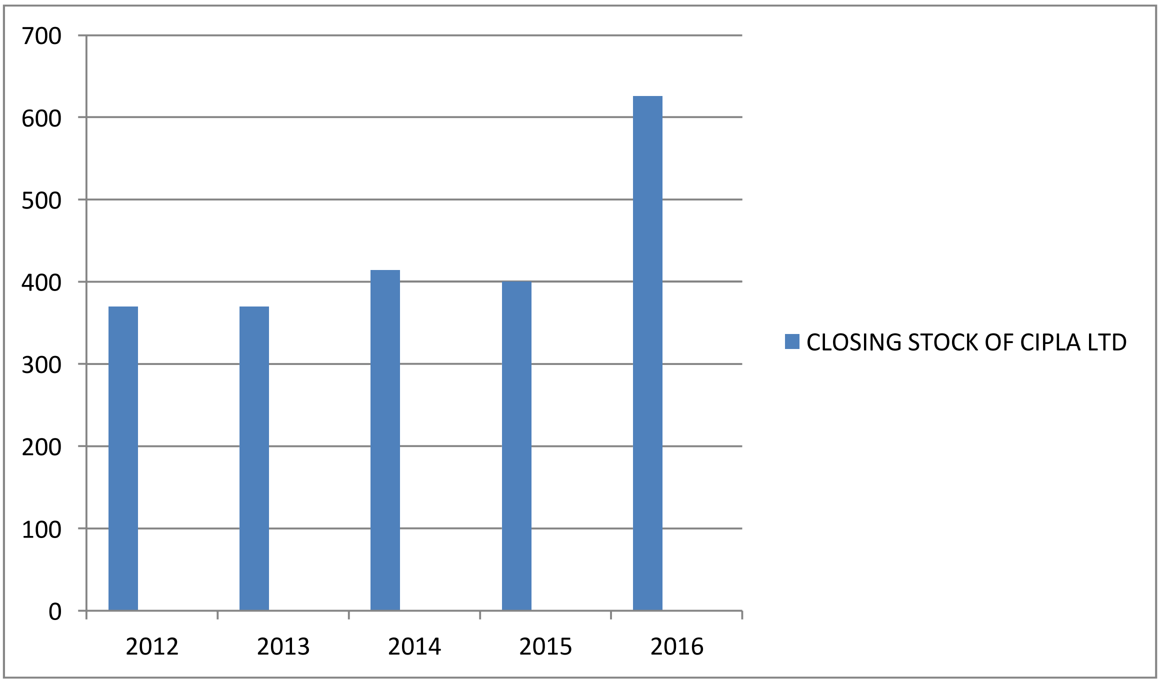
$\bar{R}$i= 15.83

$\sigma_i = \sqrt{617.06} = 24.84$

$\beta_i = 1.07$

$\sigma^2_{ei} = 617.06 - (1.07 \times 1.07 \times 377.49) = 184.87$

GRAPH 4.4: SHOWING CLOSING STOCK OF CIPLA LTD



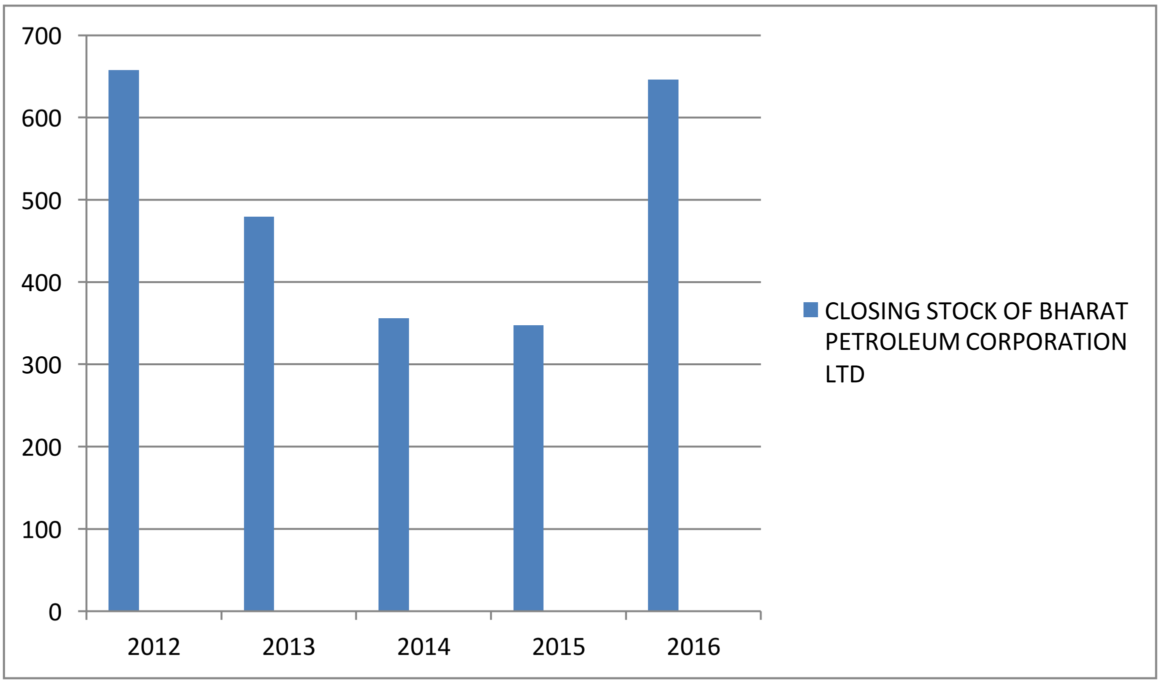
INTERPRETATION: Closing stock of 2016 is more comparatively which shows the unsold stock of the business for the particular year also helpful to arrive cost of goods sold in a periodic inventory system ,thus sales for the year lacks from Rs625.80. The unsold stock will be carried to next year as the opening stock same as the closing stock for the company. sales of cipla ltd is better in 2012,2013 and 2015 compared to rest of the years.

TABLE 4.5. CLOSING STOCK OF BHARAT PETROLEUM CORPORATION LTD (BPCL):

YEAR	CLOSING PRICE	R_i	$(R_i - \bar{R}_i)$	$(R_i - \bar{R}_i)^2$	$(R_m - \bar{R}_m)$	$(R_i - \bar{R}_i)(R_m - \bar{R}_m)$
2012	657.95	3.97	-2.93	8.58	5.96	-17.46
2013	479.15	-27.18	-34.08	1161.45	-36.11	1230.63
2014	356.10	-25.68	-32.58	1061.46	14.23	-463.61
2015	347.70	-2.36	-9.26	85.75	-2.49	23.06
2016	645.85	85.75	78.85	6217.32	18.42	1452.42
		ΣR_i =34.50		**$\Sigma(R_i - \bar{R}_i)^2$ =8534.56**		**$\Sigma(R_i - \bar{R}_i)(R_m - \bar{R}_m)$ =2225.03**

$\bar{R_i} = 6.90$
$\sigma_i = \sqrt{1706.91} = 41.31$
$\beta_i = 1.18$
$\sigma^2_{ei} = 1706.91 - (1.18 \times 1.18 \times 377.49) = 1181.13$

GRAPH 4.5: SHOWING CLOSING STOCK OF BHARAT PETROLEUM CORPORATION LTD



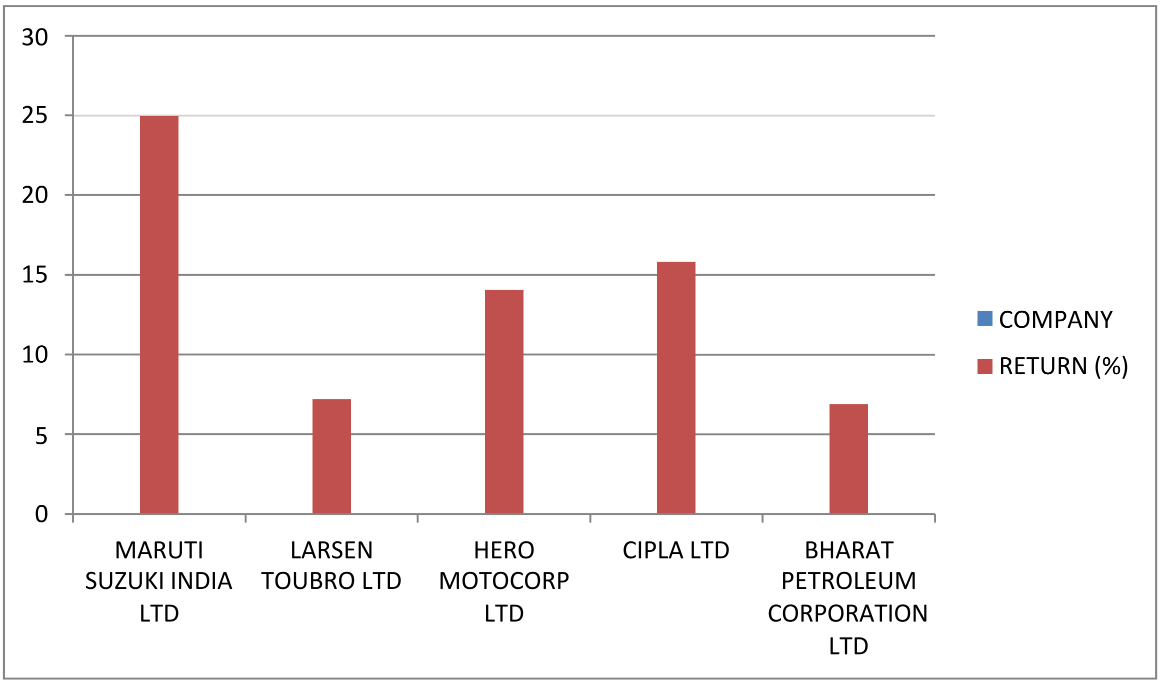
INTERPRETATION: Closing stock of 2012 is more comparatively which shows the unsold stock of the business for the particular year also helpful to arrive cost of goods sold in a periodic inventory system ,thus sales for the year lacks from Rs657.95. The unsold stock will be carried to next year as the opening stock same as the closing stock for the company. sales of Bharat Petroleum Corporation ltd is better in 2014 and 2015 compared to rest of the years.

SECURITIES REVIEW

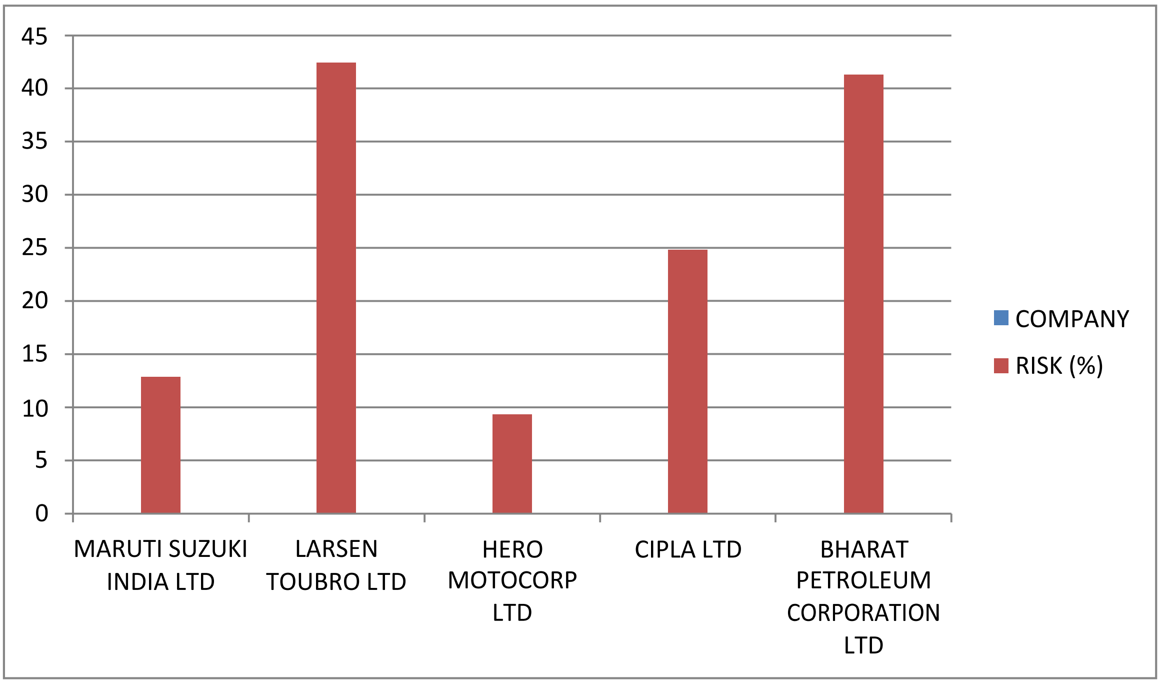
SL.NO.	COMPANY	RETURN (%)	RISK (%)
1	MARUTI SUZUKI INDIA LTD	24.97	12.87
2	LARSEN TOUBRO LTD	7.20	42.41
3	HERO MOTOCORP LTD	14.06	9.33
4	CIPLA LTD	15.83	24.84
5	BHARAT PETROLEUM CORPORATION LTD (BPCL)	6.90	41.31

GRAPHICAL REPRESENTATION

GRAPH 4.6: Graph Showing Percentage of Returns



GRAPH 4.7: Graph Showing Percentage of Risk



INTERPRETATION:

From the above calculated values it is observed that the company such as Hero MotoCorp Ltd and Maruti Suzuki India ltd has the highest rate of return with lowest rate of risk ,Cipla having a moderate rate of return with high rate of risk and remaining having a low rate of return with high rate of risk. This is because of during that period various economy, companyand industrial factors were affected stock prices. The investors are suggested to invest their funds in Maruti Suzuki India Ltd and Hero MotoCorp Ltd.

TABLE 4.6: Table Showing Securities Review

SL.NO.	**SCRIP**	R_i	Q_i	$\sigma 2_{ei}$
1	MARUTI SUZUKI INDIA LTD	24.97	1.95	614.10
2	LARSEN TOUBRO LTD	7.20	1.90	435.79
3	HERO MOTOCORP LTD	14.06	0.60	228.97
4	CIPLA LTD	15.83	1.07	184.87
5	BHARAT PETROLEUM CORPORATION LTD (BPCL)	23.47	1.18	1181.13

TABLE 4.7: Table Showing Companies Qualified for the Optimal Portfolio Construction and their Assigned Ranks

SL.NO.	**SCRIP**	R_i	Q_i	$R_i - R_f / Q_i$	**RANK**
1	MARUTI SUZUKI INDIA LTD	24.97	1.95	10.24	2
2	LARSEN TOUBRO LTD	7.20	1.90	1.16	5
3	HERO MOTOCORP LTD	14.06	0.60	15.10	1
4	CIPLA LTD	15.83	1.07	10.12	3
5	BHARAT PETROLEUM CORPORATION LTD (BPCL)	6.90	1.18	1.61	4

CHAPTER-5

FINDINGS AND SUGGESTIONS

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FINDINGS

1.It was found that companies with high returns such as Larsen Toubro Ltd(42.41%), Cipla ltd (24.24%),Bharat Petroleum corporation ltd(41.31%) were not qualified for the portfolio construction as they involved high risk, which is not very helpful for investors and the aim of the study was selecting those companies which gave maximum return and minimum risk.

3. The stocks with systematic risk greater than 1 are riskier since for a 1% change in market returns, the change in stock returns is greater than 1%.

4. The return may be low(13%) or high(22%), and the risk may be minimum or maximum. But these alone do not influence the performance of the shares and the selection of shares for portfolio construction. The security selection has to be decided based on the excess return to beta ratio.

5. The excess risk to return such as Larsen & Toubro Ltd(42.41%), Cipla ltd (24.24%),Bharat Petroleum corporation ltd(41.31%)shows the performance of a stock and helps in eliminating those companies which are not efficient.

6 . The risk associated with the individual stock is not the same for all the years. It differs from time to time.

SUGGESTIONS

The following suggestions are provided on the basis of the above findings:

1. The variance of the stocks keep changing frequently. So, the market should be observed by investors continuously.

2. Investments should be made in stocks that have relatively lower risk and higher Returns such as Hero MotoCorp Return (14.06%) and Risk (9.33) and Maruti Suzuki ltd Return(24.97%) and Risk(12.87). This is because investors are rational.

3. The proportion of investment in each of the securities changes from time to time. The optimal portfolio is thus, subject to change.

4. Market analysis should be made regularly so that one can keep on updating the present situation and can minimize the consequence of incurring losses.

5. The stocks must be continuously evaluated and the portfolio has to be updated periodically.

6. Investors must be aware of the utility of security screening in optimal portfolio construction and may make use of it.

CHAPTER-6

CONCLUSION

CONCLUSION

To conclude, the present study conducted for testing the utility of Sharpe's single indexmodel in optimal portfolio construction included 5 companies scrips listed on the BSE with Sensex as the benchmark index. The study has made an attempt to help those investors who intend to invest in the companies that are traded on the BSE considering 5 companies listed under the Sensex. The method used in this study for the construction of optimal portfolio is very effective and feasible as revision of the optimal portfolio can be done continuously as anongoing exercise. As those securities which are not efficient are excluded. The excess return to the beta ratio also plays a major role in eliminating those companies which have maximumreturns with maximum risk. Thus, this study would help the investors to minimize their overall risk and maximize the return over any period of time. The investors are thus, enabled to spread their risk by investing in a group of securities using the approach high return with low risk.

CHAPTER-7

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