CHAPTER I
INTRODUCTION AND RESEARCH DESIGN

1.1 INTRODUCTION

The Indian pharmaceutical industry is the world's second-largest industry by volume and is likely to lead the manufacturing sector of India. The first pharmaceutical company is Bengal Chemicals and Pharmaceutical Works established in 1903 at Calcutta, which still exists today as one of the fifth government-owned drug manufacturers. Since then there is no looking back and today, India has become one of the leading pharmaceutical products manufacturing nation. Even without strong patent protection, the Indian pharmaceutical industry matured during 1980s. Companies also started to produce products better tailored for their markets than typical MNCs products. This fact would become evident by the current scenario of the industry, wherein it is not just meeting the increasing demand of the huge population of the country, but also exporting the products to other developing and developed countries of the world including the USA.

ACII-PWC Report: India Pharma Inc- gearing up for the next level of growth-predicts that it is likely for India to be among the top 10 global pharma markets in value terms by 2020. Some of the leading companies like Sun Pharma, Cipla and Dr.Reddy’s are available at projected earnings of 18 times for 2013-2014. If any company has made a spectacular turnaround in the history of corporate India in the recent past, it’s Wockhardt. It has seen the maximum increase in the market capitalization moving up from ₹ 4499 crores (2011) last year to ₹ 19001 crores (2012) this year. Nearly 322.29% change.

Starting from the humble beginning of repacking imported raw materials, the Indian pharmaceutical industry has graduated to become a net foreign exchange earner, making its presence felt in the global pharmaceutical arena. For the next 60 years, most of the drugs in India were imported by multinationals either in fully formulated or bulk form. The government started to encourage the growth of drug manufacturing by domestic companies in the early 1960s, and the Patents Act in 1970 enabled the Indian industry to become what, it is today. Over 20,000 registered pharmaceutical manufacturers exist in the country.
India is among the most significant emerging markets for the global pharma industry, given that it will feature among the world’s top 10 sales markets by 2020. Currently, it is regarded as one of the fastest-growing pharma industries globally, primarily driven by a large population, evolving patient demographics, increasing healthcare expenditure, growing urbanisation, rising life expectancy, and active private-sector participation. The industry ranks third in terms of volume and is fourteenth in terms of value globally. Showing tremendous progress in terms of infrastructure development, technology base creation and a wide range of products, the Indian pharmaceutical industry has established its presence and determination to flourish in the changing environment. The Indian pharmaceutical industry meets around 70% of the domestic demand. Pharmaceutical industry accounts for about 2.91% of total FDI into the country. The FDI in Pharmaceutical sector is estimated to have touched US$172 million. Out of the total investment, almost 82 per cent of the FDI in Pharmaceutical sector was from five countries- Mauritius, Singapore, USA, UAE and Canada.\(^1\)

1.2 IMPORTANCE OF THE STUDY

Drugs and Pharmaceutical Industry plays a vital role in the economic development of the nation. The role of Pharmaceutical Industry in GDP of India is immense. It is one of the most diversified of all the industrial sectors. The Indian drugs and pharmaceutical industry has shown tremendous progress in terms of infrastructure development, technology base creation as well as product usage but the rapidly changing economic, trade and intellectual property scenario poses many challenges to it, including the challenge of becoming leaders and competitors globally. This necessitates a shift in the approach of the industry to move away from manufacturing only known drugs to discovering and commercializing new molecules through innovative process routes. With liberalization, globalization and new obligations undertaken by India under the WTO Agreements, the drug and pharmaceutical industry in the country has been facing many new challenges like increasing price and cost pressure, regulatory changes and expiring patents which lead to shrinking margins in the pharmaceutical industry. Most of the companies believe that their industry is in a strategic crisis and must focus their
investments on the high growth emerging markets which could provide a way out of this situation.

The growth of the company is based on its success, and profit is the primary test of the success of the company. In certain companies, sales have risen in recent years but the profit margins have dropped considerably. This means those companies have to realign business models and their requirements for ensuring success. The ability of an organization to analyze its financial position is essential for improving its competitive position in the marketplace. Through a careful analysis of its financial performance, the organization can identify opportunities to improve performance of the department, unit or organization as a whole.

As the global pharmaceutical industry is facing a major structural change and also how management of finance plays a crucial role in the growth, a study with regard to health in terms of profitability, liquidity, cost of capital, capital structure and their growth in terms of yearly improvement is felt relevant.

1.3 STATEMENT OF THE PROBLEM

Financial performance evaluation of a company is usually related to the act of performing financial activity and is the process of measuring the health and growth during the study period. The analysis of financial statements is a process of evaluating the relationship between component parts of financial statements to obtain a better understanding of the firm’s position and performance. It determines the ability of a company to use its assets, shareholder equity and liability, revenue and expenses.

The corporate sector has contributed immensely to the process of economic development. Financial ratio analysis is one of the best tools of performance evaluation of any company and helps to improve its financial position which is essential for improving its position in the competitive world. Through a careful analysis of its financial performance, the organization can identify opportunities to improve performance of each and every the department and spread to new vista of market. Financial evaluation helps to forecast the future financial performance also.

Indian pharmaceutical industry is now in the forefront of growth with 8% of global pharmaceutical production. It is the third largest in terms of volume and
fourteenth in terms of value. Indian firms produce about 60000 generic brands across 60 therapeutic categories and 500 active pharmaceutical ingredients (APIs) approximately. India boasts an export of generic drugs worth US $11 billion and the generic drug market is predicted to grow at a CAGR of 17 per cent between 2010-11 and 2012-13. Thus the financial analysis of the pharmaceutical industries in India is of great value to throw a beam of light in its future growth.

The industry has seen marvelous progress in terms of infrastructure expansion, technology base and the broad choice of products. Demand from the exports market has been growing quickly due to the capability of Indian players to make cost-effective drugs with world class manufacturing facilities. Bulk drugs of all major therapeutic groups, requiring complicated manufacturing processes are now being produced in India. Pharma companies have developed Good Manufacturing Practices (GMP) compliant facilities for the production of different dosage forms. As pharmaceutical companies are growing companies, the efficiency in all the activities will be reflected in their financial performance. The present study is undertaken to make performance appraisal of 60 selected pharmaceutical companies. An attempt has been made to provide an analytical framework to evaluate the financial performance, capital structure, and cost of capital and growth of sixty selected pharmaceutical companies in India in order to measure the health and growth of the same.

1.4 OBJECTIVES OF THE STUDY

- The objectives of the study are:
  - To examine the financial health in terms profitability and liquidity of selected pharmaceutical companies in India
  - To analyze the components of capital structure of selected pharmaceutical companies in India
  - To compute and make a comparative analysis of the weighted average cost of capital of selected pharmaceutical companies in India
  - To measure the growth in terms of annual development of selected pharmaceutical companies in India
1.5 HYPOTHESES

- There is no significant difference among the categories of companies with regard to GPR, NPR, ROI, RONW, CR,
- There is no significant difference among the categories of companies with regard to preference share capital, equity share capital, Reserve, long term debts, DER, ICR, and liability to asset ratio,
- There is no significant difference among the categories of companies with regard to cost of equity, cost of debt, weighted average costs of capital.
- There is no significant difference among the categories of companies with regard to compound annual growth rate, sustainable growth rate.

1.6 METHODOLOGY

The methodology of study comprises of five divisions namely

1.6.1 SOURCES OF DATA

In the present study, stratified random sampling techniques were used for selection of samples of allopathic Indian Pharmaceutical Industry. The companies were graded to various strata based on the net sales of 2011. Companies having sales of less than ₹ 500 crores per annum are treated as small category companies, companies having sales between ₹ 500 to 1500 crores per annum are treated as medium category companies and companies were having sales above ₹ 1500 crore per annum are treated as large category companies. To carry out the study, samples of two hundred and fifty companies in India were taken up. Out of that, 90 companies were under small category, 85 under medium and 75 under large category. The companies for which data was not available for one or more than one year in between or in the beginning or at the end of the study period have been ignored. Companies having turnover in crores and having continuous data for the past ten years were taken for the study. Twenty companies each from all the category are proportionately selected as samples in such a way that they represent the pharmaceutical industry.

1.6.2 PERIOD OF STUDY

The study period covers for a span of ten years from 2001-2002 to 2010-2011.
1.6.3 COLLECTION OF DATA

The study is primarily based on secondary data collected from the annual report of respective companies. Data have also been collected from authorized websites of stock and share. First hand information has also been collected by interaction with some high officials of selected companies.

1.6.4 LIST OF COMPANIES SELECTED FOR THE STUDY

<table>
<thead>
<tr>
<th>Small Category</th>
<th>Medium Category</th>
<th>Large Category</th>
</tr>
</thead>
<tbody>
<tr>
<td>AstraZeneca Pharma</td>
<td>Abbott India Ltd.</td>
<td>Albert Pharmaceuticals</td>
</tr>
<tr>
<td>Claris Lifesciences Ltd.</td>
<td>Aurobindo Pharma</td>
<td>Alembic Pharmaceuticals</td>
</tr>
<tr>
<td>Dishman Pharmaceuticals &amp; Chemicals Ltd.</td>
<td>Biocon pharmaceuticals</td>
<td>Ambalal Sarabhai Enterprises Ltd.</td>
</tr>
<tr>
<td>Elder Pharmaceuticals Ltd.</td>
<td>Cadila Pharmaceuticals Ltd</td>
<td>Astec LifeSciences Limited</td>
</tr>
<tr>
<td>Fresenius Kabi</td>
<td>Cipla Ltd</td>
<td>Caplin Point Laboratories Ltd</td>
</tr>
<tr>
<td>Glenmark Pharmaceuticals Ltd.</td>
<td>Divis Laboratories Ltd</td>
<td>Fulford (India) Ltd.</td>
</tr>
<tr>
<td>Granules India Ltd.</td>
<td>Dr. Reddy's Laboratories Ltd.</td>
<td>Gufic BioSciences Ltd</td>
</tr>
<tr>
<td>Hikal Pharma Ltd</td>
<td>Glaxo SmithKline Pharmaceuticals Ltd</td>
<td>Gujarat Terce Laboratories Ltd.</td>
</tr>
<tr>
<td>Indico Pharmaceuticals</td>
<td>Ipca Laboratories Ltd.</td>
<td>Hester Pharmaceuticals Ltd.</td>
</tr>
<tr>
<td>Ind-Swift Ltd</td>
<td>Jubilant Life Sciences Limited</td>
<td>Jenburkt Pharmaceuticals Ltd.</td>
</tr>
<tr>
<td>J. B. Chemicals &amp; Pharmaceuticals Ltd.</td>
<td>Lupin Limited</td>
<td>Jupiter Pharmaceuticals Ltd.</td>
</tr>
<tr>
<td>Novartis India Limited</td>
<td>Orchid Chemicals &amp; Pharmaceuticals Ltd.</td>
<td>Morepen Laboratories</td>
</tr>
<tr>
<td>Panacea Biotech</td>
<td>Piramal Healthcare</td>
<td>NutraPlus India Limited</td>
</tr>
<tr>
<td>Parenteral Drugs (India) Limited</td>
<td>Ranbaxy Laboratories Ltd.</td>
<td>Syncom Formulations (India) Ltd.</td>
</tr>
<tr>
<td>Pfizer</td>
<td>Sanofi India Limited</td>
<td>TTK Healthcare Ltd.</td>
</tr>
<tr>
<td>Pletchico Pharmaceuticals Ltd.</td>
<td>Sterling Biotech Ltd</td>
<td>Venus Pharmaceuticals</td>
</tr>
<tr>
<td>Shasun Pharmaceuticals Ltd.</td>
<td>Sun pharma</td>
<td>Wanbury Ltd</td>
</tr>
<tr>
<td>Strides Arcolab Limited</td>
<td>Surya Pharmaceuticals Ltd.</td>
<td>Zenith Pharmaceuticals Ltd</td>
</tr>
<tr>
<td>Unichem Laboratories</td>
<td>Torrent Pharmaceuticals</td>
<td>Zenotech Laboratories Ltd</td>
</tr>
<tr>
<td>Wyeth pharmaceuticals</td>
<td>Wockhardt</td>
<td>Zydex Gentec Ltd.</td>
</tr>
</tbody>
</table>
1.6.5 DESIGN OF THE STUDY

The above parameters were evaluated for the small, medium and large companies and are worked out for 60 companies for the last 10 years. Inferences are made year wise, firm wise and category wise. As per the flow diagram mentioned above, the study has been designed in such a way as to measure the health aspects and growth potentials of the companies at present and the years to come as well.
1.7 FRAME WORK OF ANALYSIS:

In the present study, the pharmaceutical companies were analysed based on two aspects - the health and growth. The financial health plays a significant role in the successful functioning of a firm. The recent financial crisis and the ensuing economic downturn have had a significant impact on the corporate sector. The turbulent and the competitive scenario in the corporate sector has made it imperative for the stakeholders to assess the financial health of companies. For companies, being able to meet their financial obligations is an integral part of maintaining operations and growing in the future. It is essential for investors to know how to evaluate the short term as well as long term financial health of the organisation. Here, an attempt has been made to examine and evaluate the financial health in selected pharmaceutical companies using financial analysis.

The factors considered for this are gross profit ratio, net profit ratio, ROCE, ROI, current ratio, debt equity ratio, debt to total asset, interest coverage ratio and Z score. The components of financial statements are evaluated Company wise and year wise using ratios like Gross Profit Ratio, Net Profit Ratio, Return on Investment, Return of net worth and current ratio. The components of Capital structure are analyzed. Debt Equity Ratio, liability to asset ratio analysis, Interest Coverage Ratio etc are pooled for evaluating the long-term financial strength. Rate of return of the company is analyzed using cost of equity analysis, cost of debt analysis and weighted average cost of capital.

The Indian pharma industry is on the threshold of becoming a major global market by 2020. The industry has the potential to grow at an accelerated to 20% CAGR for the next six years. The Indian economy is growing strongly and healthcare is expanding to meet the needs of a growing population with a changing disease profile. Increase in insurance coverage, aggressive market creation, growth in the income and steady investment into medical infrastructure has further propelled the growth of the industry. The growth of the sector is evaluated using CAGR, SGR and Internal growth rate. The analysis on Financial Facts has been done with the help of Summary statistics like Mean, Standard Deviation, Co-efficient of Variation, Skewness, and Kurtosis, ANOVA (Analysis of Variance), Friedman’s Non parametric test and Correlation Analysis.
1.8 LIMITATIONS OF THE STUDY

- The present study is based on data taken from the annual reports of the company. The shortcomings of the use of secondary data are inevitable.
- The study is carried out on the basis of 60 limited number of companies only.

1.9 CHAPTER SCHEME

The thesis is organized into seven chapters which are as follows:

Chapter I Explains introduction, statement of problem, objectives of the study, hypotheses, importance of the study, methodology, limitations of the study and chapter plan.

Chapter II Envisages the earlier studies related to financial performance of pharmaceutical companies is presented.

Chapter III Assesses corporate excellence, judging credit Worthiness and evaluating trends in financial position.

Chapter IV Measures the composition of the capital structure of Pharmaceutical Companies.

Chapter V Calculates the cost of equity, cost of debt and weighted average cost of capital.

Chapter VI Examines the growth which is achieved by formulating the annual compound growth rate, sustainable growth rate, and internal growth

Chapter VII Consolidates the summary of salient findings, suggestions are presented, the conclusions are drawn and their implications are stated.

The thesis also contain an elaborate array of bibliography utilized for constructing and formulating ideas and interpretations used to analyze the Pharmaceutical industry in India.