CHAPTER 1 – INTRODUCTION

Providing value to society is the only way to sustain profitability (Drucker, 1954). A growing body of empirical evidence associates value creation with superior firm profits (Kirca et al., 2005). Society and business have been coexisting for their mutual benefits. Prior to industrialization, businesses were never being considered parasites of society. However, the post industrialization era began with the exploitation of various resources for the benefit and profit of the business. The first evident exploitation started with Human Resources as they worked in shabby conditions and with low pay. Across the globe employees protested in bits and pieces against such exploitations and for the establishment of their Human Rights. However, natural resources could not voice their protest against their exploitation initially. Off late towards the end of the 20th century, various natural disasters and ozone layer depletion were linked with the exploitation of natural resources by industries. Such disasters were the possible outcome of nature's protest against its exploitation for the material profit of irresponsible industries. Labour union protest was instrumental to bring reforms against the exploitation of labour in the form of labour legislation. The environmental protection laws were enacted to protect natural resources including the ozone layer. These legislations in a nutshell are protective in nature for various stakeholders.

Government and various organizations worldwide are working with an objective to restore and enhance the natural resources along with protection of employees' human rights. However, in India, the end result was making social responsibility mandatory by spending 2% of Net Profit of the business. This seems to be scratching the back of responsibility without analyzing the roots of responsibility. Though India is the first country in the world to make Corporate Social Responsibility mandatory, Industrialists in India were giving generously to the society to meet various interests viz., freedom fighting movement, building temples, giving best possible amenities to employees, building sheds, etc.

There have been two parallel thoughts on Social Responsibility of Business. While the majority belong to the school of thought that the business must carry out CSR, must fulfill Corporate Citizenship (Marsden & Andriof, 1998; Logsdon & wood, 2002; Matten & Crane, 2005), must give generously to the society from where they draw resources for their businesses (Bowen, 1953; Davis, 1960; Carroll, 1979). However, the second school of thought proposes that the business must concentrate on Business activities and leave the other activities to various experts namely viz. Business must concentrate on its core

competencies, business must do business only (Hayek, 1960, 1969; Friedman, 1962, 1970; Jensen, 2002), as there are dangers of social responsibility of business (Levitt, 1958; Marshall, 1970). Moreover, Friedman went a step further stating that "There is one and only one social responsibility of business--to use its resources and engage in activities designed to increase its profits so long as it stays within the rules of the game, which is to say, engages in open and free competition without deception or fraud" (Friedman, 1970, p.230). Therefore, these arguments suffice the need to have a different outlook at what Business should do to show that they are responsible to each of their stakeholders and not taking a piecemeal approach in the form of Social Responsibility as it is in its present form.

The Problem Statement

Various forums at the world level thought of saving the planet Earth and hence various guidelines were proposed to the businesses for having sustainable business by taking care of the planet Earth. India went a step ahead from proposal mode to prescriptive mode and suggested businesses to fulfill CSR as a part of their Social Responsibility. Though there is no punishment for not fulfilling such Social Responsibility, there is always a gap between prescription, practice and the outcome. Hence the problem of CSR is not the prescription but what is prescribed, how it is prescribed and why it is prescribed. As the government could not fulfill socio-economic equality promises since independence and did not have a robust policy to reach to those stakeholders who need attention of the Government in its absolute form, it was easy to direct business enterprises to fulfill the obligations which was the primary duty of the government.

Therefore, the problem of this study is whether the business can be sustainable when they are concentrating on the function which is neither their main objective nor their subsidiary objective? Moreover, is guiding business enterprises to do something which is against shareholders' value creation, will satisfy the need of long term shareholder's wealth maximization? Do the companies, operating in the highly Industrialized state like Gujarat will be able to sustain environment and society without compromising its own sustainability?

Rationale of the study

In the modern era, CSR is the piecemeal approach as evident by various guidelines. There is no guarantee that in future, companies will not face further guidelines on the same issue. The issues of Business Responsibility are much larger than Social responsibility. Past events of financial scams (Satyam, 2008), not fulfilling Corporate Governance norms in context of Director's appointments (mostly PSU's), not fulfilling the guidelines of Food & Drug Department of India (e.g. Maggi - Nestle), pollution of a river on a large scale (Ganga, Yamuna, Vishwamitri) are much larger in scope than CSR. What is that scope wherein the companies are not just limited to CSR for their sustainability but go beyond and show their Responsible Behavior covering all aspects of business enterprise, viz., disclosure of Profit & Loss Account without cosmetizing etc...?

The present study is conducted in highly industrialized state like Gujarat as Gujarat ('Petro Capital of India') is a leading state in terms of chemicals, petrochemicals and pharmaceutical sector, significantly contributing 62% of Petrochemical, 35% of chemical and 40% of Pharmaceuticals production (Vibrant Gujarat Global Summit, Jan, 2017). But the unbridled expansion of chemical and pharma units is wreaking havoc as the whole geographical area is becoming more prone to toxic chemicals and industrial hazards especially in Gujarat 'Golden Corridor' (from Ahmedabad to Vapi belt) that houses 35% of the majorly hazardous units of the country putting lives of both workers and local community in danger (Singh J.N., Indian Express, March 15, 2018). According to Financial Express report, 2020 (FE, Bureau, Oct., 30, 2020) nearly 1000 production units operating in this corridor were hampered in the year 2020 as these units have been put in the list of critically polluted units by the National Green Tribunal (NGT) and they were not allowed to increase their production capacities beyond permitted limits. Such alarming situation can have extreme impacts on people, planet and profits and can end up in unsustainability of business and society.

Hence in the present time, a study needs to be conducted which can help the businesses in India to have Responsible Business Models and can help government at both central and state level to frame policy which are not limited only to section 135 of New Companies Act of 2013 or clause 49 of listing agreement or any such acts and enactments which restrict the organization only to tick mark approaches but behave sensibly and responsibly while fulfilling their business objective. Hence, this study will fulfill these aspirations with respect to chemical, petrochemical and pharmaceutical companies.

Objectives of the study

To seek answers to the research problem, a clear and precise objective plays a vital role to navigate the research. Further, objectives must emerge from the problem of the study seeking the answer for "what, why and how" of the research topic. Thus, based on the research problem, the Primary Objective of the study is - "To study the factors that lead to Responsible Business Behaviour of Chemical /petrochemicals and pharmaceutical companies operating in Gujarat for sustainable society and business".

In line with above stated main objective, sub-objectives have been framed to answer the research question in a specific and explicit manner stated as under: -

- To identify various long term & short term Business Objectives of chemical, petrochemical and pharmaceuticals companies operating in Gujarat.
- To explore the sustainability objectives of the business enterprise depending on various sustainability models
- To understand various aspects of Responsible Behaviour of Business enterprise in context of their Business activities.
- To explore various factors that lead to Responsible Business Behaviour of Chemical /petrochemicals and pharmaceutical companies for bringing in sustainable society and business
- To explore the relationship between various dimensions of Responsible Business Behaviour and sustainability of business and society.
- To propose a conceptual model that captures the salient factors of Responsible Business Behaviour leading to sustainable business and society
- To investigate the conflicts and mitigation between Sustainable society and Business
- To suggest steps to be taken by the Government and Businesses for mutual sustainability, judicious use of resources, common amenities to support businesses by the government.

Research Hypothesis

To explore the above objectives, following hypotheses have been framed to empirically test the existence of various relationships, association and correlation between dependent and independent variables.

- H₀₁: There is no significant association between Profitability of the company (Avg. Revenue of the firm & Avg. PAT of the firm) and various factors of Responsible Business Behaviour
- H₀₂: There is no significant differences between Profitability of the company (Avg. Revenue of the firm & Avg. PAT of the firm) and various factors of Responsible Business Behaviour

- **H**₀₃: There is no significant association between various factors of Responsible Business Behaviour and the Avg. Reserves fund of the company.
- **Ho4:** There is no significant differences between various factors of Responsible Business Behaviour and the Avg. Reserves fund of the company.
- **H**₀₅: There is no significant association between status of companies, Listed or Unlisted, and their Business Behaviour.
- **H**₀₆: There is no significant differences between status of companies, Listed or Unlisted, and their Business Behaviour.
- **H**₀₇: There is no significant association between the type of companies, chemicals/petrochemicals /pharmaceuticals, and their Business Behaviour.
- **H08:** There is no significant differences between the type of companies, chemicals/petrochemicals /pharmaceuticals, and their Business Behaviour
- **H**₀₉: There is no significant association between age of the companies and their Business Behaviour.
- H₁₀: There is no significant differences between age of the companies and their Business Behaviour.
- **H**₁₁: There is no significant association between size of the companies and their Business Behaviour.
- H₁₂: There is no significant differences between size of the companies and their Business Behaviour.
- H13: There is no significant association between sector ownership of companies, Government / Non-government, and their Business Behaviour.
- H₁₄: There is no significant differences between sector ownership of companies, Government / Non-government, and their Business Behaviour.

Above stated hypotheses are collective in nature and represent a univariate company analysis. However, symbolic hypotheses have been framed in the analysis section for each construct/ component/ factor and category discreetly. Hence, hypotheses have been analyzed as univariate (i.e. CSR, CG, Ethical practices, Sustainable development), bivariate (i.e. company status (Listed /Unlisted), type of industry (chemical/petrochemicals and pharmaceuticals), sector ownership (Government /Non-government), age of the firm (Age up to 25 years and Age more than 25 years), size of the firm (medium /small sized and large sized), Avg. Revenue of the firm (avg. revenue up to 3000crs and avg. revenue more than 3000crs), Avg. PAT of the firm (avg. PAT up to

100crs and avg. PAT more than 100crs), Avg. Reserves of the firm (avg. reserves up to 1000crs and avg. reserves more than 1000crs)

Methodology

To achieve the research objectives, appropriate research design used was exploratory as well as descriptive in nature. Exploratory research design was applied for exploring various relationships and association amongst variables of Business Behaviour and sustainability of business and society. Descriptive research design was employed to describe the sample companies, observe and obtain quantitative information concerning the current status of Business Behaviour and to describe "what exists" with respect to variables or conditions in a situation.

Accordingly, responses were collected from managerial cadre employees which includes Unit head, Environment Health & Safety (EHS) head, Production head and HR head etc...belonging to Chemical, Petrochemical and Pharmaceutical Industries of both public and private sectors. For data collection, stratification of organizations was established on the basis of BSE/NSE listed companies and unlisted companies engaged in manufacturing of Chemical, Petrochemical and Pharmaceutical activities. Further, sample size was determined by pooled data to do in-depth analysis. Hence the sample size was finalized as 100 companies but response was received from 58 companies, however, only 50 companies' data was found complete in all aspects. Therefore, the response rate was 50%

For this study, both primary and secondary data were considered. Primary data consisted of first-hand responses collected from targeted samples and expert interviews. However, secondary data was collected from various websites, company annual reports, government reports, books, journals and newspaper dailies. To collect primary data, a data collection instrument was framed keeping in mind the objective of the study. Appropriateness and strength of the instrument was examined on statistical parameters for reliability and validity before administering it.

Data composition

Survey was conducted to collect primary data by using a data collecting tool viz., questionnaire. Data pertaining to demographic and other than demographic characteristics was collected from public & private manufacturing units engaged in chemical, petrochemical and pharmaceutical businesses (refer table 1).

Table 1

	Types of Industry		Sector Ownership		Legal status		Age of the firm		Size of firm	
	Chem Petro- chem	Phar- ma	Govt.	Non- Govt.	Listed	Unli- sted	Up to 25 yrs	More than 25 yrs	Medium / small	Large
f	36	14	06	44	25	25	07	43	10	40
%	72	28	12	88	50	50	14	86	20	80

Demographic Distribution of sample companies

(Source: Data received from the 50 Respondent companies)

Data Analysis

Data has been analyzed both qualitatively and quantitatively. Qualitative analysis was done for data extracted from secondary sources and quantitative analysis included both descriptive and inferential statistics. All the assumptions for both parametric and non-parametric tests for univariate and bivariate categories were ascertained before conducting data analysis. In addition to these tests, Exploratory Factor Analysis (EFA) with Principal Component Analysis (PCA) extraction method was applied to develop scales and get inferences from the data.

Scope of Study

The scope of study is limited to analyze the Responsible Business Behaviour of Chemical, Petrochemicals and Pharmaceuticals, NSE/BSE listed – unlisted companies operating in Gujarat State. The study makes an attempt to understand the Responsible Business Behaviour of Chemical, Petrochemicals and Pharmaceuticals companies over a period of 3 years from financial year 2017-18 to 2019-20.

Chapter Scheme

Chapter one is an introductory chapter that includes problem statement, rationale of the study, objectives of the study, hypotheses of the study and scope of the study in brief.

Chapter two covers Review of literature considering various keywords like Responsible Business Behaviour, Corporate Social Responsibility, Business Responsibility, Corporate Governance, Business Ethics, Sustainable development initiatives, Business sustainability, Sustainable Business Models, Societal & Environmental sustainability. The chapter further explores the gap in res0.earch which made the basis of this research.

Chapter three is on Research methodology which covers research design, sampling frame, sample size, data collection methods, questionnaire development, description of measurement of variables, validity and reliability of the instrument, tools and techniques used in the study, limitation and future scope of the study.

Chapter four is on data analysis. It covers descriptive and inferential statistics used for data analysis. The chapter covers data collection, data processing, data analysis presentation and hypotheses testing to establish relationship / association and differences between independent and dependent variables. The chapter also includes whether the sample data fits into hypothesized model explored from literature review.

Chapter five is on discussion and findings followed by chapter six which states recommendations and conclusion. The chapter highlights contribution of study to the body of knowledge on the subject and utility of the study.

Chapter six is followed by bibliography section. The annexure is appended at last i.e. after bibliography.