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**UNIVERSITY OF PETROLEUM AND ENERGY STUDIES**

**School of Business (SoB)**

**End Semester Examination, December 2020**

**Program: MBA (O&G)**

**Subject (Course): Strategic Management**

**Course Code : STGM 8001**

**Semester : III**

**Max. Marks: 100**

**Duration : 3 Hrs**

**No. of page/s: 26**

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Structure of the question paper and allocation of marks are given below.

Note: All sections are compulsory.

Section – A (30 Marks)

(Attempt all questions in this section, all carry equal marks)

(All are CO 1)

1. The Balanced Scorecard is a technique of performance management that establishes and monitors four dimensions of performance:
  - a. Financial, strategic, operational, and ethical performance
  - b. Financial, customer, internal, and learning/innovation performance
  - c. Profit, sales, productivity, and asset management performance
  - d. Shareholder, customer, employee, supplier, and social performance
  
2. The core of a firm's business environment is determined by:
  - a. Its relationships with customers, competitors and suppliers
  - b. Its relationships with customers, competitors, government and suppliers
  - c. Its relationships with its major stakeholders
  - d. The social and economic systems with which the firm must coexist

3. The profits earned by firms in an industry, are determined by:

- a. The overall state of the economy and the intensity of competition within the industry
- b. How much customers value the products supplied by the industry
- c. The extent to which the industry is protected by barriers to entry
- d. The value of the product for customers, the intensity of competition, and the relative bargaining powers of producers, their suppliers and their buyers

4. The basic premise of industry analysis is that:

- a. Perfect competition and monopoly are theoretical models, in practice most industries are oligopolies
- b. The level of profitability within an industry is determined by the systematic influence of the industry structure which determines the intensity of competition in the industry
- c. Firm strategies and their interactions are the key determinants of the industry environment
- d. The basic forces of technology and consumer demand are the fundamental forces that shape industry structure

5. The bargaining power of suppliers is likely to be high:

- a. When the suppliers' industry is concentrated
- b. When suppliers are supplying differentiated products
- c. When "our" (the customer's) industry is relatively fragmented
- d. All of the above

6. Analyzing key success factors leads one to ask the following two questions:

- a. What do customers want which we could supply and what should the firm do to survive competition?
- b. What do customers want and what type of operational changes should a firm implement to survive competition?

c. Which of the five forces of competition most threaten a firm's survival and how could the firm deal with them?

d. What should managers do to a information collected from the market and the firm's operational units?

7. There are two main concepts of profit:

a. The normal return to capital and the abnormal return of capital

b. Return on capital and return on sales

c. Accounting profit and the economic profit

d. Economic rent and the economic profit

8. Barriers to mobility are:

a. barriers that protect a segment from firms established in other segments of the same industry

b. barriers that protect a segment from firms established in other industries

c. obstacles to changing a firm's strategy over time, once it becomes obsolete or inadequate for the changing environment

d. barriers that prevent globalization and developing a firm's business abroad

9. A well established brand can be a source of sustainable competitive advantage because:

a. Consumers will always pay a premium for a recognized brand

b. Brands can be protected by the law relating to trademarks

c. A brand protects a firm from competition from low-cost new entrants

d. Existing brands tend to lose value when transferred to another firm and new brands are slow and costly to build

10. One implication of the resource-based perspective is that:

a. Firms tend to adopt similar or close strategies

- b. Firms focus on being different from their competitors
- c. Firms focus on building a stronger portfolio of capabilities than their rivals
- d. Firms focus on reducing their vulnerability by correcting their weaknesses

11. A fundamental challenge of managing a large firm is to achieve an optimal trade-off between:

- a. Cooperation and division of unqualified labor
- b. Division of labor and efficiency
- c. Division of labour, specialisation, co-ordination and co-operation
- d. Cooperation, coordination and profit

12. The main changes in strategic planning systems over recent decades are:

- a. Shorter time horizons, less emphasis on detailed planning, and more emphasis on overall direction and performance
- b. Greater formalization and centralization
- c. Shorter time horizons and greater emphasis on economic and financial forecasting
- d. A greater reliance on input from management consultants.

13. Roles and directives, mutual adjustment, and routines are:

- a. Mechanisms for overcoming goal misalignment among organizational members
- b. Means for controlling employees in an organization
- c. Means for people to build a hierarchy within the firm
- d. Mechanisms for achieving required levels of coordination between workers

14. Porter's five forces model of competition is too simple as originally conceived because it overlooks phenomena such as:

- a. The relationships of substitution between products or services within one segment of the market
- b. Competitors' strategies may shape the industry structure, rather than structure shaping competition
- c. The complexity and stability of the competitive world where rivals' strategies affect each other
- d. The different levels of industry analysis that the five forces model can be applied to

15. In mature industries, the most important sources of cost advantage are:

- a. Economies of scale and economies of learning
- b. Low-cost inputs, low overheads, and economies of scale
- c. Superior process technologies
- d. Business model innovation

**Section – B (70 Marks)**

Read the case “**ESSAR OIL LTD: STRATEGIC CSR LEADING TO SUSTAINABILITY** and answer the following questions.

1. What are the CSR and sustainability challenges for physical asset based organisations?  
(10 marks) CO 2
2. EOL is spending considerable amount to fulfill its long commitment to local community to provide water and fodder. What is the argument in favor of keeping on complying with the commitment OR move towards full stage sustainability and what are the pros and cons of both the scenarios? (10 marks) CO 2
3. What difference you perceive between earlier CSR and present CSR approach of EOL when it is being implemented through Essar Foundation. (10 marks) CO 3
4. What are the various elements of blue print, which Mr. Arora will be presenting to Mr. Manoharan in terms of
  - a. What are the social, environmental, economic and technical elements that will be considered?

(10 marks)

CO 4

b. What is the role of external stakeholders such as community and Government? (10 marks)

CO 4

c. What is the model in terms of implementation of the solution? (10 marks) CO 4

5. What is the status of alignment of CSR with business and how this new approach will bring alignment at corporate, business and plant level? (10 marks)

CO 3

## **ESSAR OIL LTD: STRATEGIC CSR LEADING TO SUSTAINABILITY**

*Dr. Tarun Dhingra, Professor, SOB, UPES, Dehradun*

Mr. C. Manoharan, Director, Refinery, Essar Oil Ltd (EOL) in Vadinar, Jamnagar district in Gujarat, just came out of a board level meeting of Essar (*Exhibit-1*) on 8th November, 2012 where he was asked to prepare the Annual Business Plan (ABP) for the Financial Year (FY) 2013-14. While reading the last year's report, he realised that EOL has been spending INR15 mn on fodder and water to local villages since last 10 years. In the same meeting, Mr. Deepak Arora, CEO, Essar Foundation (*Exhibit-2*) presented sustainability initiatives (corporate social responsibility (CSR) activities) undertaken by the Essar Foundation, the CSR arm of Essar.

It's been more than six years since Mr. Manoharan took charge of the refinery as Director. He has been undertaking various projects in process streamlining, standardization and optimization in the refinery operations. Mr. Manoharan is very much in control on most of the operations and plans inside the refinery site. However, there is something bothering him about his interface with the local community regarding addressing their needs in a sustainable manner. He feels challenged when he has to deal with an erstwhile commitment made by the leadership team as part of the land acquisition process, to provide for fodder to the affected villages as compensation. The refinery acquired the land which was single crop land and was producing fodder, so it was obligatory for the business to provide for fodder. The business has made this open ended commitment and have provisioned in the annual budgets every year. In addition to fodder, there is a longstanding commitment to provide drinking water because it's a drought prone area with scanty rainfall coupled with salinity Vadinar being a coastal area. Mr. Manoharan contemplates as to how long the business will keep supplying water and fodder to the local community and why can't there be an alternative and more sustainable way out.

Consequently, he contacted Mr. Arora and discussed this challenge and enquired whether Essar Foundation can develop a blueprint which can solve this. After the discussion, he handed this assignment to Mr. Arora. At the same time, Mr. Manoharan was wondering whether this kind of initiative would make the relationship with existing stakeholders like community better OR would they react adversely to this kind of programme, where the fodder supply will be done on a daily basis. Historically there has been incidents of community conflict where the village leader have protested in front of the gate of the refinery and vehicle movement was disturbed. His top priority remains maintaining a good corporate community relationship. He cannot afford to have a company community conflict. Mr. Manoharan has a dilemma, should he continue providing support to surrounding communities as he has been or go for a sustainable programme already implemented in some measure by Essar Foundation and which can be enhanced?

Meanwhile, Mr. Arora, after meeting Mr. Manoharan, is also confronted by a dilemma. The task he has been handed over is very challenging especially because of the local environmental conditions such as coastal area, saline water and soil, erratic rainfall, absence of a perennial river and no dam water supply. He calls for a team discussion to get some more inputs.

Mr. Arora informed his team members that they had received an exciting opportunity at Essar Oil Refinery site, where the Director, Refinery has tasked Essar Foundation to work out a blueprint to address the availability of water and fodder to the local community in sustainable manner with minimum dependency on the business. He suggested that the team members should work on getting some primary and secondary information about climate, water, rainfall, topography, agriculture pattern, cattle population and any other relevant information that would be helpful for the assignment. He suggested that they all should meet after two days once they have collected the information and then work on the blue print for a sustainable plan.

Although the CSR team is briefed, but in the hindsight, Mr. Arora feels cautious apprehension on whether they would be able to develop a practical and feasible plan. Various questions cross his mind. Considering the climatic challenges, how many months or years will it take to implement the plan? What would be the ideal budget and time plan to manage the transition? A knee jerk reaction may create unrest in the community leading to a company community conflict which might be a highly dangerous situation to be in.

**Essar** is a US\$ 35-billion multinational corporation with investments in Steel, Energy, Infrastructure and Services. With operations in more than 29 countries, it employs over 60,000 people (*Exhibit-1*). Essar Energy (LSE:ESSR) is a world class, low-cost, integrated energy company with an established track record. Essar Energy, through its subsidiaries, owns one of India's largest private power producers with 3,910 MW of installed capacity and projects under construction to expand its capacity to 6,700 MW.

**Essar Oil Ltd (EOL)** is a fully integrated oil & gas company of international scale with strong presence across the hydrocarbon value chain from exploration & production to refining and oil retail. Essar Oil owns India's second largest single site refinery having a capacity of 20 MMTPA and complexity of 11.8, which is amongst the highest globally. It has a portfolio of onshore and offshore oil & gas blocks with about 1.7 billion barrels of oil equivalent in reserves & resources. There are more than 1,600 Essar-branded oil retail outlets in various parts of India.

**Essar Refinery** in Vadinar falls under District Jamnagar of Gujarat (*Exhibit-3*). The refinery operations are also supplemented by other support businesses such as power plants and ports. 17 villages contributed land for the refinery site. These villages fall under two talukas namely, Khambaliya and Lalpur in Jamnagar district. As per the Census of India 2011, Jamnagar had a population of 2,159,130 of which male and female were 1,114,360 and 1,044,770 respectively. The average literacy rate of Jamnagar is 82.35 percent and 65.97 percent among males and females respectively (*Exhibit-4*).

### **Environmental Practices at EOL**

EOL evaluates environmental risks continuously in its operations through risk and impact assessments and regular audits. The approach is towards mitigating risks, minimising pollution, reducing the environmental footprint and optimising resource consumption. All the environmental aspects, impacts and plans are part of an environmental management plan which is specific to each site.

The environmental management plans are aligned with the international environmental management system ISO 14001:2004 and the Essar Oil Refinery at Vadinar is a certified location. Essar Oil was ranked second in India looking across all sectors and industries in Carbon Disclosure Leadership Index in CDP India Climate Change Report 2013. Its fuel switch project registered for carbon credits. EOL was recommended by Det Norske Veritas for certification to Energy Management System – ISO 50001:2011. The Vadinar Refinery saves 95 million kWh of energy. EOL achieved 20 percent reduction in hazardous waste in 2013-14 and zero oil spills reported by all sites.

Mr. Prabhanjan Dixit (Head of Health Safety and Environment Department of EOL) shares that his department undertakes a number of proactive and sustainable initiatives. As a process, the department carries out a thorough risk assessment for each aspect of the business operation and structured projects are initiated to mitigate potential risk especially in the area of environmental sustainability.

Mr. Dixit informs, "We are looking at developing alternatives to sea water. One of the options is rainwater harvesting. But due to erratic rainfall in the region, the availability of rainwater is not guaranteed. An Essar business entity has been awarded a contract by Jamnagar Municipal Corporation to build and operate a Sewage Treatment Plant (STP) of 70 million liters per day capacity. The treated water will be available in next three to four



years after which it may be used for refinery operations and few other domestic purposes. The treated water will be available on cost basis but, it should compensate for the desalinization cost of sea water. Currently, the other alternative used is water from river Narmada through pipeline, which is also distributed to four villages, located close to the incoming pipeline. The villages around refinery site face huge issues of water availability both for domestic use as well as for irrigation.

Essar is also planning to get a *Hydro-Geological* study done for the refinery site which will provide a clear baseline of what type of earth layers, water aquifers are there underneath the site. The department is closely monitoring the ambient air quality at the site and the reporting is very transparent and a real time access to Pollution Control Board Office has been provided so they may independently check the ambient air quality data directly with support from the department.

EOL leadership believes that international standards and benchmarks should be followed to achieve excellence in every business operation. We publish the Annual Sustainability Report which is issued as compliance to GRI4 Guidelines. GRI4 Guidelines have 90 aspects of reporting against three major areas: Economic, Social and Environment. To achieve these set benchmarks, clearly defined roles and responsibilities are documented and standardized”.

The business is implementing best practices to sustain and mitigate the environmental risks. However, they are also confronted with external environmental challenges outside of the immediate refinery site. Gujarat has 1,600 km long coast line that is about one third of India’s coast line. Out of this 1,125 km of coast line passes through Saurashtra and Kachchh regions. There are very few perennial rivers such as Narmada, Tapi and Mahi, which flow through Southern Gujarat region. There are no perennial rivers in Saurashtra and Kachchh regions. This refinery site is located on the coastal belt of Saurashtra. The coastal areas have a very fragile resource base that affect the economy, agriculture and other activities. The basic problem that concerns water is salinity intrusion due to migration of sea water landwards. This phenomenon causes reduction in drinking and irrigation water supplies of usable quality.

The Saurashtra peninsula experiences arid to semi-arid type climatic condition. The average annual rainfall of Khambhaliya is 519.8 mm and Lalpur is 428.7 mm (*Exhibit-6*). About 95 percent of average annual rainfall is received in the Southwest Monsoon season with July being the rainiest month. The rainfall generally decreases from Southwest to Northwest. On an average, there are 24 rainy days in Khambhaliya taluka and 19 days in Lalpur taluka.

Mr. Ram Kirpal Lodhi, Head of Environment Department of EOL, Vadinar believes that credibility is the biggest criteria for sustainability. The refinery uses 6,000 meter cube of water per hour for various catalytically fracturing operations. Some good initiatives include the use of steam for power generation and then reusing the low pressure steam in refinery.

He explains how the strategic environment management practices evolved over a period of six to eight years.

“Before the refinery business came to this area, the major livelihood was farming, casual labor and migration to other areas (*Exhibit-7&8*). The refinery operation provided a number of jobs and contracting opportunities to the locals and especially, to the families who contributed their land.

When Mr. Manoharan joined as Director, Refinery a few years ago, he initiated a number of projects internally to bring efficiencies, systems and processes, standard operating procedures and improved safety practices. Most of his efforts are lauded by the seniors heading departments like Health & Safety and Environment. With his drive and commitment, the Refinery got various international level certifications. The business got the third party evaluations under Carbon Disclosure Project (CDP) which is done on voluntarily basis. In 2013-14 out of 170 companies from India that participated in CDP, EOL was the first in the sector.

EOL has a very robust Environment Department that works on environmental related matters especially meeting and in some cases surpassing regulatory compliances. Five key areas of focus include waste management, water management, soil management, energy management and chemical handling.

In case of water, the company uses sea water for its business operations and some water received from Narmada is used for domestic use and part of it is distributed to the priority villages around the site. Ground water is not used in any of the operations. The major focus remains on 100 percent recycling of water. The refinery operation uses 6,000 meter cube water per hour.

The business currently depends on two water sources, sea water and supply from Narmada. Currently, the refinery capacity is 20 MMTPA. In future, if the management decides to increase the capacity, we would need to have a sustainable supply of water for our operations. Also, we should be prepared for some alternatives since there may be a change in environmental and marine laws prohibiting drawing of sea water”.

### **Corporate Social Responsibility (CSR) activities at EOL**

Till the year 2013, EOL used to implement its CSR activities through an internal department called Community Relation Group (CRG). These activities, as per the Group level Policy, were thereafter implemented by Essar Foundation. Apart from the long term commitment for Community Health Centre, all other CSR activities were more of transactional in nature. CSR was a shared responsibility of CRG team along with other few responsibilities they had. Since no professional set was in place, the CSR activities were not planned with a strategic view of development. Other key components of the plan such as the detailed need assessment, baseline indicators, stakeholder analysis, actors and factors analysis, coping strategy, resource mobilization etc were also partially available. Most of the CSR activities were request based and disintegrated. Essar Foundation, the CSR arm of Essar, through its relentless endeavors has actualized positive changes in the lives of more than 10,00,000 beneficiaries so far in over 500 villages spread across eight states in India.

Essar proliferates and meets its social purpose beyond country's borders, where it operates, by impacting thousands through its CSR activities. Working across diverse geographies, Essar Foundation employs distinct approaches to suit the local settings through a slew of tenable development activities. These efforts range from healthcare provision, agriculture improvement, sports promotion, skill enhancement to water resources development. To maximize the impact of its work, Essar Foundation forges close partnerships with district administration and local community institutions, thus facilitating development in hinterlands by giving shape to local aspiration and augmenting development indicators. The vision, mission, objectives, policy and structure of Essar Foundation can be referred from *Exhibit-2*.

Essar Foundation actively pursues a collaborative approach, wherein the focus is to ensure corresponding growth of Essar's businesses and communities in the proximity by preparing productive grounds for sustainable development and accomplishing it through collective action. The Foundation strives to build on the inherent spirit and knowledge of communities to ensure advancement, which is community driven and has lasting impact. It is this belief system, which powers the Foundation's teams in 12 districts to maintain steadfast efforts by negotiating adverse conditions comprising tough terrains, remoteness and thus, planting and nurturing seeds of progress.

It becomes significant to mention that the context for a corporate operating in a community is very different from an NGO or a community based organizations that are perceived to be neutral. Hence, the expectations of the communities also vary from corporates. This includes expectations of employment, contracts and funds, which results in added challenge for the corporates. Various stakeholders with vested interests don't allow initiatives to last for long-term and are not ready to adopt the initiatives once the corporates manage to operationalize and keep them going. These expectations need to be managed and contained otherwise it has been observed that these stakeholders create hurdles in business operations. The company community conflict can arise out of socio-political or geo-political reasons and sometimes due to misperceptions prevailing in the communities. The core sector businesses are typical, because they are physically present in area for a much longer period. There are some direct and indirect impacts of the business operation on the community and ecology. The business did make a commitment to provide water and fodder to the villages around the site as part of its land acquisition compensatory measure. This commitment is being fulfilled every year to avoid any discontent.

Mr. Arora, CEO, Essar Foundation has following views and plans to deal with the issues at hand:

“The core sector has different challenges compared to Fast-Moving Consumer Goods (FMCG) or retail sectors. In core sector, you acquire land and are physically present for a much longer period. The business operation has some direct impacts such as on health, livelihood and education etc. There are some indirect impacts such as water shortage (not evidently visible), air quality etc. where the correlation cannot be established without any impact study.

Sustainability is actually to be seen in overall context. We should set progressive benchmarks so that the planet remains the way it is. We are working on various short, medium and long-term plans which are in discussion with various business heads and hopeful to see the light of the day soon.

We also view CSR from life cycle perspective that if we link our CSR efforts with the business life cycle, then we see clearer because we have micro level plan to address social and environmental challenges. Also the nature of engagement with the community and other stakeholders vary from project stage to operation stage. It also varies from location to location. Our engagement in Gujarat will be very different from Bihar or Chhattisgarh. We are looking at issues and challenges in a participatory and joint approach with the community, its representatives and Government with a thrust on demand drive and not supply focused.

We have a robust Monitoring and Evaluation (M&E) system that operates at two levels. At the micro-level, each CSR project is designed with an ingrained assessment system. Linked with all project stages – planning, execution, assessment and exit, these M&E system essentially aims at improving service delivery and ensuring optimum resource allocation, thereby, identifying need for mid-course correction required for translating activities into anticipated outcomes.

The Essar Foundation team is capable because of having requisite skill set and experience to understand issues on both sides: business and community. We are hopeful that we will deliver greater results over the period of time. We also envisage a trend where the corporate foundations also evolve in the role of knowledge creators”.

Essar Foundation has a team of three people (One Senior Manager and two Assistant Managers) based in Vadinar Refinery site who are working in implementing CSR activities on ground. A detailed baseline study of all the villages is being conducted to understand the status of Education, Health, Livelihoods, Civic Infrastructure, Water, Agriculture and other important demographics. This study will also help in mapping the local resources, technical institutions and other community based initiatives to avoid duplication or re-inventing.

EOL has been supplying water through tankers to the local community. The ground water quality is not potable due to salinity in most of the villages, so the water is taken from the source such as well where the water is sweet. The tankers fill the water from this source and supply in villages spanning over 15-20 KM area. EOL has fixed the water tanker rates and the vendors are compensated based on number of tankers. More than 80 tankers with an average capacity of 12,000 ltr supply water to 15 villages on a daily basis. The number and frequency varies village to village and also during summers and winter. Similarly, the fodder is supplied to the ‘Gaushala-Cowsheds’ maintained and managed by each village on a collective basis. There are more than 2,500 cows in

these sheds and a fixed rate of Rs. 285 per cattle per month is provided. These two commitments are being honored continually for more than 10 years now.

Apart from water and fodder provision, the EOL has been doing various CSR activities in the area to support the local community. One of the flagship programs is 24x7 health care services, which is being provided through a Community Health Centre (CHC) operating at Village Jakhar. The CHC has three components, walk-in OPDs, Child and Mother Care centre and mobile health van program. Apart from this, the local schools are supported with education materials, uniforms and other supplies. An apparel manufacturing unit with tailoring center for women is functioning in Salaya training more than 50 women every quarter towards earning an income.

Program designs also transitioned from single-time activities to follow up requirements and also to scale up models. The Project/program implementation strategy is twofold, direct, where the Foundation has in-house capability and the other through partners, where the project needs special expertise. For example, currently in the field of Education, the programs are limited to material supply and some scholarships, so it is implemented directly. Health being specialized area and also requires follow up, the CHC project is being implemented through Samarpan Hospital located in Jamnagar city. For back up and follow up, the Samarpan Hospital is available, which has all requisite expertise, facilities and equipment to respond to any medical emergency. A formal annual contract is issued to the Samarpan Hospital to make provision of doctors, paramedics, medicines, ambulance service and other requirements. EOL in partnership with District Administration has developed a Model Anganwadi, a preschool crèche, run by the local government department. This is a scale up model, which is now being taken up by the District Administration to replicate across the district. There are very few NGOs working in the area. The government schemes are being implemented by the District Administration. The EOL's CSR is trying to compliment and supplement government's efforts to make their schemes more effective.

### **CSR Head's Dilemma**

Mr. Arora, CEO, Essar Foundation, has few questions in his mind while he works on a plan. These include how to address sustainability, what elements of blueprint he shall plan for meeting with the Director, Refinery. Can there be an institutional mechanism to address this water and fodder issue rather than this transactional response. Can there be other options besides supplying water through tanker which could have quality issues too. Water quality in turn affects the health of the community due to water borne diseases. Can we involve Government in any manner to make such provisions? Can fodder be locally made available because dependence on fodder from outside being expensive and sometime not available?

He simultaneously keeps in mind the thought that in future such sustainability plans need to be replicated for other Essar companies and may be on different aspects or challenges faced there. His other concerns are on how to incorporate expectations of various stakeholders, so that the plan gets approval as well as works on ground without any disruption or delay.

The challenge for the Vadinar CSR team was to gather baseline information about water and fodder and to be ready for the meeting with the Mr. Arora. They struggled to get data from various sources due to various practical reasons. Another challenging scenario they faced when they discussed this matter with the local community was that a negative air started building up and few questions arose like why Essar Foundation team is gathering this information, are you going to stop the water and fodder supply?

After two days, Mr. Arora and his team reassembled to discuss their next steps to develop the blue print which was to be presented to Mr. Manoharan.

Mr. Awadhesh Pathak who is the CSR lead for Vadinar makes few important observations. Firstly, there is no reliable data available about the situation on ground since the District Administration has information about the district, which is mapped on a very high scale, without capturing the micro details of individual localities. So the specific information about these 15 villages regarding ground water status, water table etc. is not available.

The team also spoke to few villagers where they discussed about the salinity in the ground water due to coastal proximity, causing health problem, crop damage and top soil deterioration.

There are more than 500 wells in the area which start drying up in December every year till next monsoon. There are few check dams for rain water harvesting but not maintained properly and hence are almost non-functional. When discussed with the irrigation department, they said they do not have budget for this since these projects are now bundled under MGNREGA Scheme to provide employment opportunity to local villagers.

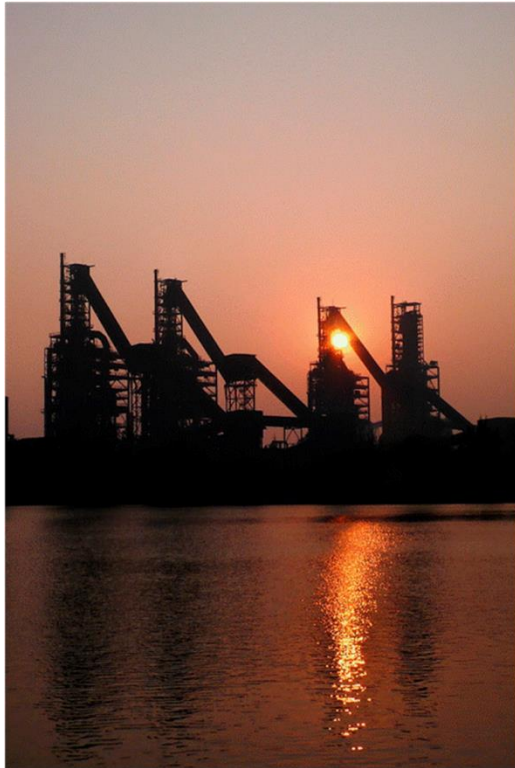
The nearest dam which is called Ghee Juth Dam is more than 35 KM away. The government has proposed to connect these villages to access that dam water through pipeline, but the project is stuck due to various administrative and financial reasons. The community either depends on the ground water or on the water supplied through the tankers provided by Essar since last few years. Essar can explore the status of the pipeline work from the dam to these villages, where is it stuck. If the pipeline brings the water to these villages, then next task could be to mobilize Water and Sanitation Management Organisation (WASMO) in Gujarat to lay the internal water distribution pipeline inside the villages. WASMO funds 90 percent of the project cost and 10 percent of the cost is to be bore by the beneficiary village collectively.

The green fodder is available only for two to three months during and after monsoon. Off season fodder is procured from Khambaliya, which is 15 km away and is expensive. There is a need to develop some mechanisms to store bulk fodder during the season and use it over the year. This requires some in-depth understanding and feasibility study about various options and models.

Mr. Arora's challenge is now to explore what are the possible alternatives available/can be created to ensure availability of water and fodder on long term basis? What kind of resources would be required to achieve this? Who are the other stakeholders, who can provide support, financial, technical or in implementation? What is the blueprint of this proposal and how will it be implemented?

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# Exhibit-1



## Our Vision

**“To be a respected global entrepreneur, through the power of Positive Action”**

People	Progress	Power	Passion
Nurture our people with care	Responsive to new opportunities	Synergy through global presence	Winning spirit in every thing we do
<b>Entrepreneurship</b>			





## **Exhibit-2: About ESSAR FOUNDATION**

### **Vision**

To become a catalyst of positive change in the society.

### **Mission**

To improve the quality of social and economic life of our neighborhood communities and make positive contribution to the life of all those who are directly or indirectly impacted by our business, products, and services.

### **Objectives**

The CSR objectives can be broadly categorized into 3 categories, which are the following –

#### **Corporate objectives –**

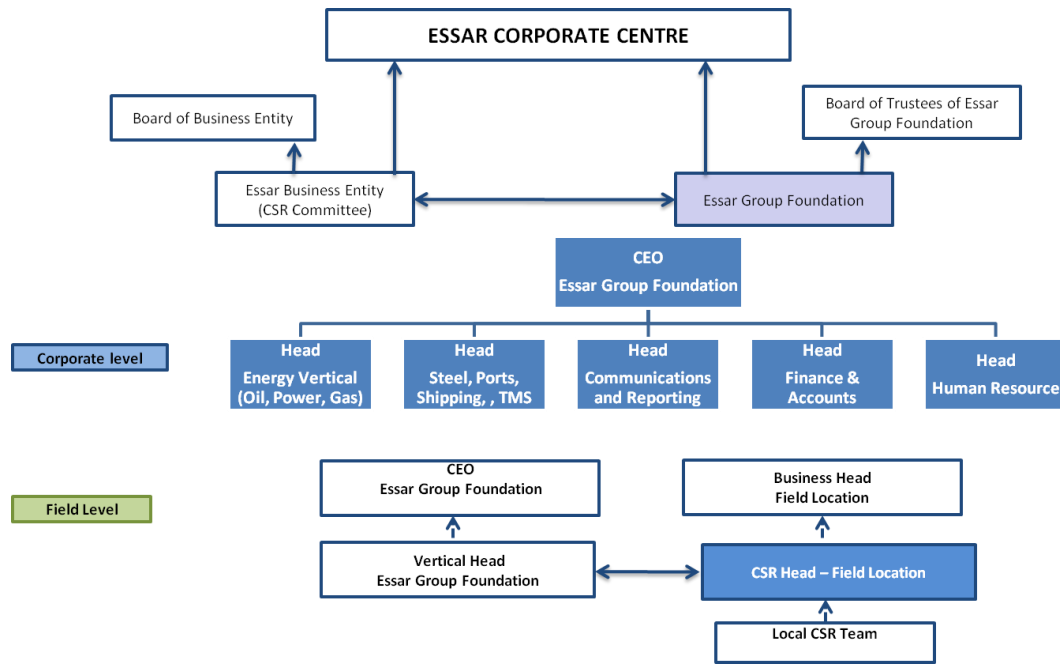
- Build the brand equity of the company with the government, media, stakeholders, and communities.
- Enable the group to raise resources globally.
- Enable an interaction with the governments of various countries.

#### **Business level objectives –**

- Enable availability of industry specific talent to support growth.
- Enable linkage with market opportunities, wherever possible.
- Promote and support forms that enable an encouraging policy environment.

#### **Plant level objectives –**

- Facilitate interaction with communities and stakeholders. Create forum for a balanced negotiation by enlarging the spectrum of development to non-political groups.
- Enable interaction on issues such as land acquisition.
- Reduce disparity in the region, as disparity leads to social tensions leading to damage to the smooth functioning of business.





## **CORPORATE SOCIAL RESPONSIBILITY (CSR) POLICY**

Essar Group is committed to achieve excellence in Corporate Social Responsibility (CSR) and subscribes to the principle of sustainable development and the sustainability policy of the group. The purpose of the CSR policy is to guide the group to proactively work towards meeting the needs of present generation without compromising the ability of future generations to meet their own needs.

To meet this commitment Essar shall design and deliver programs that make positive impact on Social Capital, Natural Capital, Human Capital and Financial Capital in the communities where we operate. We will respect the law of the land, proactively engage with the stakeholders, set progressive benchmarks, and establish practices that meet international standards, by adopting:

### **Responsible Business Practices**

- Maintain highest degree of business ethics and standards of corporate governance
- Establish mechanisms and controls to ensure continuous compliance to standards

### **Responsible Stakeholder Engagement**

- Demonstrate mutuality and respect for diversity of cultures and rights of individuals and groups in areas where we operate
- Engage and support programs aimed at socio-economic development of communities where we operate, in consultation with local government, Knowledge institutions and other appropriate stakeholders

### **Responsible Employees**

- Establish highest standards of HR practices enabling continuous professional development
- Encourage and facilitate employee volunteering across locations

### **Responsible Value Chain**

- Identify, develop and encourage value chain partners that demonstrate highest level of business ethics, integrity and are committed to responsible business practices.
- Establish appropriate programs for suppliers and contractors development

### **Responsible Reporting**

- Develop robust monitoring and evaluation framework and reporting against established global standards and best practices

We commit that our CSR objectives and commitments shall be aligned with the business processes to enhance stakeholder and shareholders value.

Place : Mumbai  
Date : July 01, 2012

  
Shashi N Ruia

**Exhibit-3:**

**Gujarat in India**



**Jamnagar Dist. in Gujarat**



**Khambhaliya & Lalpur blocks in Jamnagar District**



**Exhibit-4 – Population of the target villages**

Sr. No	Village Name	Block Name	Total Population	No. of Households	Avg/Per HH
1	Vadinar	Jam	6578	1116	5.89
2	Bharana	Khambhaliya	4113	605	6.80
3	Timbadi		870	155	5.61
4	Sodha Taraghadi		873	192	4.55
5	Kathi Devariya		835	188	4.44
6	Nana Mandha		1330	216	6.16
7	Mota Mandha		1446	254	5.69
8	Parodiya		1758	267	6.58
9	Kajurada		952	163	5.84
10	Vadaliya Sinhan		1198	215	5.57
11	Singach		Lalpur	3514	593
12	Jakhar	2602		507	5.13
13	Mithoi	1161		212	5.48
14	Modpar	3193		475	6.72
15	Rasangpar	1013		203	4.99
	Total		31436	5361	5.86

**Exhibit-5 – Refining capacity in India** (source- Ministry of Petroleum, oil & Gas)

Sr. No.	Refinery Location	Name of the Company	Name Plate Capacity (MMTPA)*
<b>PSU Refineries</b>			
1	Guwahati	Indian Oil Corporation Limited	1.00
2	Barauni		6.00
3	Koyali		1370
4	Haldia		7.50
5	Mathura		8.00
6	Digboi		0.65
7	Panipat		15.00
8	Bongaigaon		2.35
9	Mumbai	Hindustan Petroleum Corporation Limited	6.50
10	Visakhapatnam		8.30
11	Mumbai	Bharat Petroleum Corporation Limited	12.00
12	Kochi		9.50
13	Manali	Chennai Petroleum Corporation Limited	10.50
14	Nagapattinam		1.00
15	Numaligarh	Numaligarh Refinery Ltd.	3.00
16	Mangalore	MRPL	15.00
17	Tatipaka, AP	ONGC	0.66
<b>Total</b>			<b>120.066</b>
<b>JV Refineries</b>			
18	Bina	Bharat Oman Refinery Ltd.	6.00
19	Bathinda	HPCL Mittal Energy Ltd.	9.00
<b>Total</b>			<b>15.00</b>
<b>Private Sector Refineries</b>			
20	Jamnagar	Reliance Industries Limited	33.00
21	SEZ, Jamnagar		27.00
22	Vadinar	Essar Oil Limited	20.00
<b>Total</b>			<b>80.00</b>
<b>Grand Total</b>			<b>215.066</b>

\*MMTPA-Million Metric Tonne Per Annum

**Exhibit-6- Rainfall data of the two Taluka**

<b>Normals of Rainfall</b>				
<b>Month</b>	<b>Khambhaliya</b>		<b>Lalpur</b>	
	<b>Rainfall</b>			
	<b>mm</b>	<b>Days</b>	<b>mm</b>	<b>Days</b>
January	0.2	0.1	0	0
February	0	0	0.9	0.1
March	1.7	0.2	0.6	0.1
April	0	0	0	0
May	1.6	0.2	2.8	0.1
June	103.3	4.7	66.8	2.6
July	232.5	8.5	205.7	8.5
August	120.7	6.4	103.8	4.7
September	35.6	2.9	36.6	2
October	12.5	0.6	5.7	0.3
November	11.1	0.2	4.5	0.3
December	0.6	0.1	1.3	0.2
<b>Annual</b>	<b>519.8</b>	<b>23.9</b>	<b>428.7</b>	<b>18.9</b>

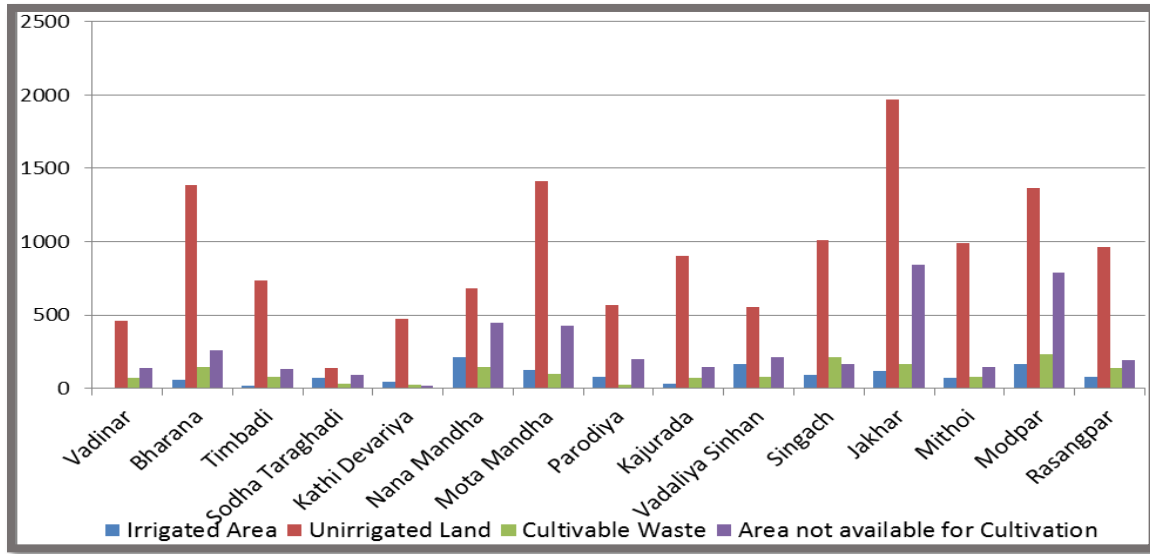
Source: IMD, GOI, 1995

**Exhibit-7- Land use pattern of the target villages**

Sr. No	Village	Block	Area (Ha)					
			Total Area	Irrigated Land - Well Without Electricity	Irrigated Land - Well With Electricity	Un-irrigated Land	Cultivable Waste	Area not available for Cultivation
1	Vadinar	Khambhaliya	669.8	0	1.1	459.7	71	138
2	Bharana		1849.8	40.5	20.2	1385.1	144.4	259.6
3	Timbadi		967.7	12.1	4.2	738.4	80.6	132.4
4	Sodha Taraghadi		338.2	62.1	11.2	140.4	33.8	90.7
5	Kathi Devariya		559.1	23.2	18.9	473.1	25.8	18.1
6	Nana Mandha		1484.7	201	13.1	680.3	141.7	448.6
7	Mota Mandha		2062	48.1	74.3	1415.6	96	428
8	Parodiya		865.9	74	2	567.6	23.8	198.5
9	Kajurada		1150	18.4	8.9	905.8	74.1	142.8
10	Vadaliya Sinhan		1010.9	98.4	63.3	555.5	80.7	213
11	Singach	Lalpur	1473.4	39	52	1010	210.4	162
12	Jakhar		3099.3	50.5	70.3	1970.7	163.1	844.7
13	Mithoi		1281.2	26.4	42.8	991.5	77.2	143.3
14	Modpar		2559.9	67	100.5	1365.6	235.1	791.7
15	Rasangpar		1363.7	35.6	39.5	962.4	137.1	189.1
	<b>Total</b>		<b>20735.6</b>	<b>796.3</b>	<b>522.3</b>	<b>13621.7</b>	<b>1594.8</b>	<b>4200.5</b>



**Exhibit-8- Village Wise Land Use Pattern (Land Area in Ha)**



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