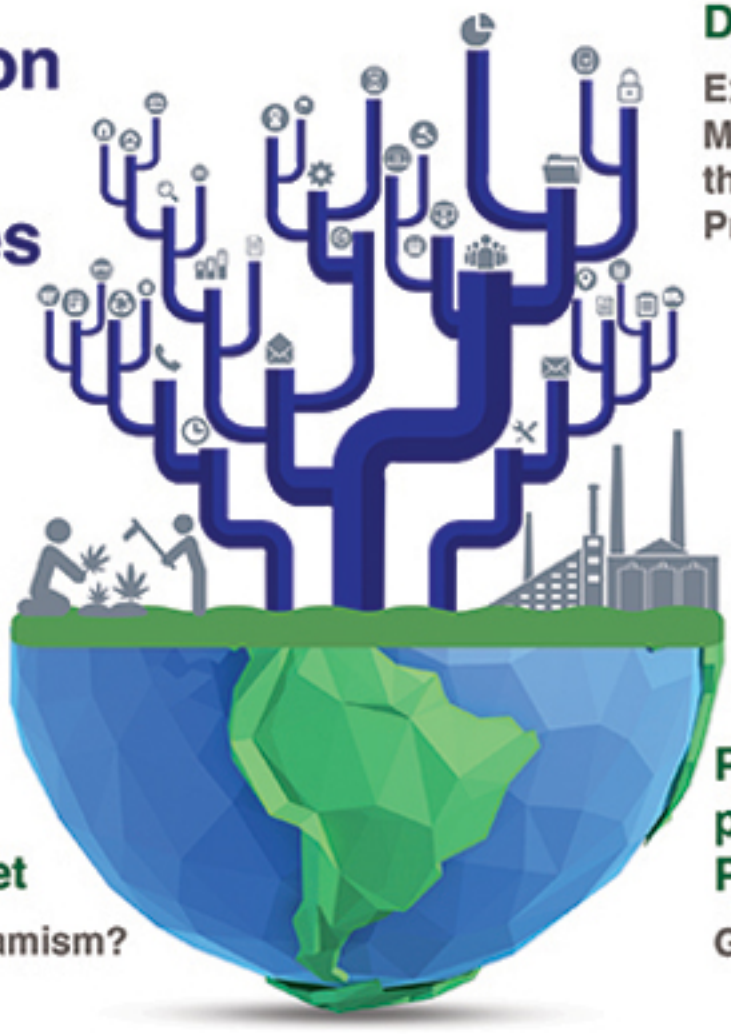
GLOBSYN MANAGEMENT JOURNAL

Economic Liberalization Emerging Perspectives



Electricity Market Development in India

Existing Barriers in Retail Marekt: Implications for the independent Power Producers

Mutual Fund Investment and Indian Stock Market

Is there influence dynamism?

Protection for the poor in Electricity Pricing

Global Lessons for India

Globsyn Management Journal (GMJ)

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Table of Contents

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Patron's Desk

From its inception in 2002, Globsyn Business School has come a long way. But from day 1 it has aspired to live up to the best practices of governance and academic achievements. So, it is no surprise when it's bracketed with the best BSchools nationally and get rated among the top 50 BSchools competing with the best.

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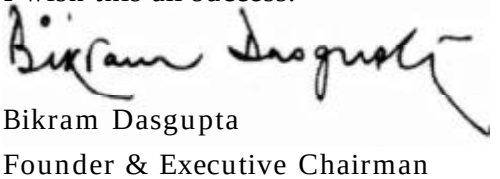

Bikram Dasgupta
Founder & Executive Chairman
Globsyn Group

Editorial

Wishing all our esteemed readers a very happy and prosperous 2017.

I want to thank the researchers who generously offered their writings to GMJ and with it goes my deepest appreciation. All authors whose writings were selected by GMJ's rigorous review process and have contributed importantly to an expanded vision of research. To the GMJ Editorial board, I extend my gratitude for their steady devotion and lending their names and expertise to our referee process. Without such distinguished energetic participation, GMJ could not have thrived in recent years.

Let me also take the privilege of reminding all our readers that this is the tenth volume of our publication which signifies a decade of intellectual participation between the contributors of GMJ and readers and hoping that this fruitful journey may take all of us far.

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Research Articles

Electricity Market Development in India – Existing Barriers in Retail Market – Implications for the Independent Power Producers (IPPs)

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Abstract

India's tryst with power reform started about 25 years back. While steps have been taken to bring in a new legal framework which encourages independent regulation, private investment and competition in retail and wholesale market, in reality high entry barriers exist inhibiting competition in the retail market. This coupled with the change in fuel policy, is leading to stranding of large scale IPP capacity. This study seeks to quantify such barriers in evaluating viability of recently commissioned private generating plants where investment decisions were based on GOI assurance of providing concessional fuel access and bringing in competition in retail market.

Keywords: *Retail electricity market, competition, stranded capacity, Merchant Power Plant, Reform*

Introduction

Inspired by a spate of reforms ushered in from the 1980's in the world electricity industry and also driven by own economic compulsions, India started experimenting with power sector reform since early '90s when power generation was opened up for large scale private sector participation. This initiative met with little success mainly because of poor financial health of the single buyer State Electricity Boards with lenders not finding it comfortable to finance. Only three private sector projects came up out of such initiatives - one in the State of Maharashtra and two in Andhra Pradesh. The one in Maharastra fell deep in the quagmire of controversy and faced public resentment.

Taking lessons, Government of India (GOI), focused on the need to create powerful and effective new institutions in the form of independent Regulatory Commissions. This was regarded as a fundamental requirement for reform in the international experience. [1] The main idea was to separate economics from politics in electricity price fixation.

Electricity Regulatory Commissions Act, 1998 was enacted by Parliament which conceived independent Regulatory authority for power sector with Central Commission for regulation of Central sector generation and inter-state operations and State commissions for intra-state ones. Simultaneously, a number of States went on

1. ***Caught Between Theory and Practice: Government, Market, and Regulatory Failure in Electricity Sector Reforms by Rabindra Nepal; Tooraj Jamasb; January 2013***

to enact their own Reform Acts for restructuring the State power sector – Orissa, Haryana, Andhra Pradesh, Uttar Pradesh, Karnataka, Rajasthan and Delhi introduced reforms under new State laws during the period 1995 to2000.[2] As a next step forward, GOI enacted enabling legal framework for liberalization across the country. The Electricity Act, 2003, repealing all earlier Acts, brought in radical changes envisioning growth of power industry through private participation. Generation was delicensed and competition was encouraged, among other measures, in order to benefit consumers at large.

International Reform Experience

International power sector reform covered a large geographical spread across continents and a time period of about 25 years starting from early 1980s (Joskow 2008)[3]. Initiatives were built around three cornerstones:

1. Separation of natural monopoly from potentially competitive segment. Network business, (Carriage), was considered as natural monopoly while the supply side (Content), was candidate for competition.
2. Bringing in private capital – private ownership – for management efficiency.
3. Creation of independent regulatory bodies for balancing the need of consumers and developers.

Many reforming countries, however, did not pursue all the three objectives. But at least two were common in all.

Chile was the pioneer in reform (1982) driving the following:[4]

i) establishment of the electricity market regulator at the start,

ii) corporatization of state-owned enterprise,

iii) law for electricity sector liberalization,

iv) unbundling (or vertical separation) of the main segments,

v) incentive regulation of electricity networks,

vi) establishment of a wholesale electricity market,

vii) introduction of privatization and

viii) introduction of private independent power producers (IPPs).

Electricity Reform models across countries targeted progressive transition to retail competition in the long run (DTTEM 2004)[5]. However, various countries sequenced reform differently at their own pace.

Model 4 implies that choice for all customers is available, with complete separation of generation and retailing (supply) from the network business. There is no monopoly over retailing, competing retailers can perform the same role as they do in other markets. The distribution wires provide open access or common carriage. With this structure there would also be free entry to generation market and free exit. [6]

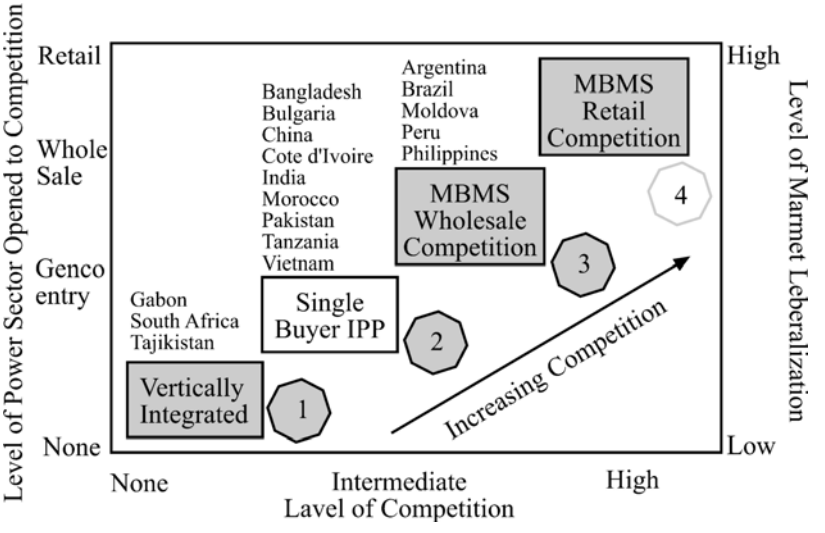
2. ***The Karnataka Electricity Reform Act, 1999; The Haryana Electricity Reform Act, 1997; The Orissa Electricity Reform Act, 1995; Andhra Pradesh Electricity Reform Act, 1998; Uttar Pradesh Electricity Reforms Act 1999; The Rajasthan Power Sector Reforms Act, 1999; The Delhi Electricity Reform Act, 2000***

3. ***Lessons Learned From Electricity Market Liberalization by Joskow, Paul L***

4. ***Caught Between Theory and Practice: Government, Market, and Regulatory Failure in Electricity Sector Reforms by Rabindra Nepal; Tooraj Jamasb; January 2013***

5. ***Sustainable Power Sector Reform in Emerging Markets-Financial Issues and Options, Joint World Bank/USAID Policy Paper, Deloitte Touche Tomatsu Emerging Markets, Ltd., Final Draft, June.***

6. ***Sally Hunt, G. S. (1996). Competition and choice in Electricity. John Wiley & Sons.Ch.7, P.65***



Source: Caught Between Theory and Practice: Government, Market, and Regulatory Failure in Electricity Sector Reforms by Rabindra Nepal; Tooraj Jamasb; January 2013

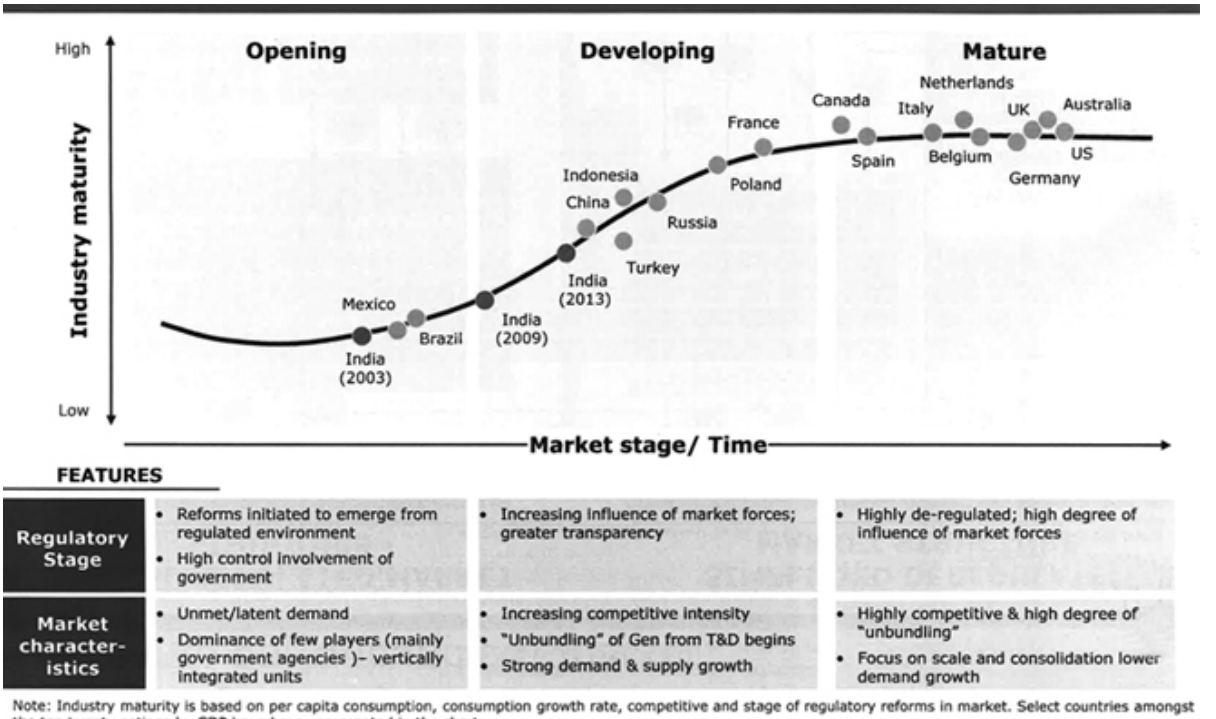
The following diagram seeks to portray stages of market development across countries. The list is illustrative and not exhaustive.

Initiatives in India – Post 2003 Act

The new Act and the policies framed there under created an enabling frame work for large scale private sector participation in power generation. The following provisions are illustrative on ushering in competition.

a) Delicensing of Generation

Under section 7 of the Electricity Act any generating company may establish, operate and



Note: Industry maturity is based on per capita consumption, consumption growth rate, competitive and stage of regulatory reforms in market. Select countries amongst the top twenty nations by GDP have been represented in the chart

Source: Business Monitor International, EIA, Bain analysis

maintain a generating station without obtaining a license.

b) Captive Generating Plant

Under section 9 (1) of the Act a person may construct, maintain or operate a Captive generating plant and dedicated transmission lines.

Under section 9 (2) every person, who has constructed a Captive Generating Plant and maintains and operates such plant, shall have the right to open access for the purposes of carrying electricity from his captive generating plant to the destination of his use.

c) Open Access to Transmission and Distribution System

As per section 39 of the Act, the transmission licensee shall provide nondiscriminatory open access to the transmission system to any generating company, distribution licensee (Discom), and the consumers.

Under section 42 of the Act the Discom shall provide non-discriminatory open access to any generating company, licensee and the consumers. The generating companies, licensees and the consumers who avail open access to transmission system /distribution system shall, however, pay transmission / wheeling charges and cross subsidy surcharge as determined by the State Commission.

Whereas the open access to transmission system is effective from the effective date of the Act, the open access to the distribution system is effective from the dates State Commissions introduce such open access to the distribution system.

d) Trading in Electricity

'Trading in Electricity' is recognized as a distinct activity and by granting license under section 12 of the Act.

The new framework received considerable interest from the private sector. Concept of Merchant Power Developers (Power Generators who do not go in for long term power sale contracts) was discussed at policy level and all necessary support was assured by Central Electricity Authority, GOI (2007) as was being accorded to IPPs with long term power sale agreement.

"Unlike traditional utilities, Merchant Power Plants (MPPs) compete for customers and absorb the full market risk. There are no guarantees that they will have a minimum off-take of their output. They must respond to market needs. Typically the risk of a MPP is carried on the balance sheet of the promoter … MPPs can be given either coal linkage or coal block".[7]

Thus, assurance of the Government was provided regarding the following to the prospective private sector investors in generation market on: [8]

(1) Concessional domestic fuel (linkage will be granted)

(2) Wholesale and Retail market will be opened up and created for these power generators

(3) State Government support for land, water and other infrastructure.

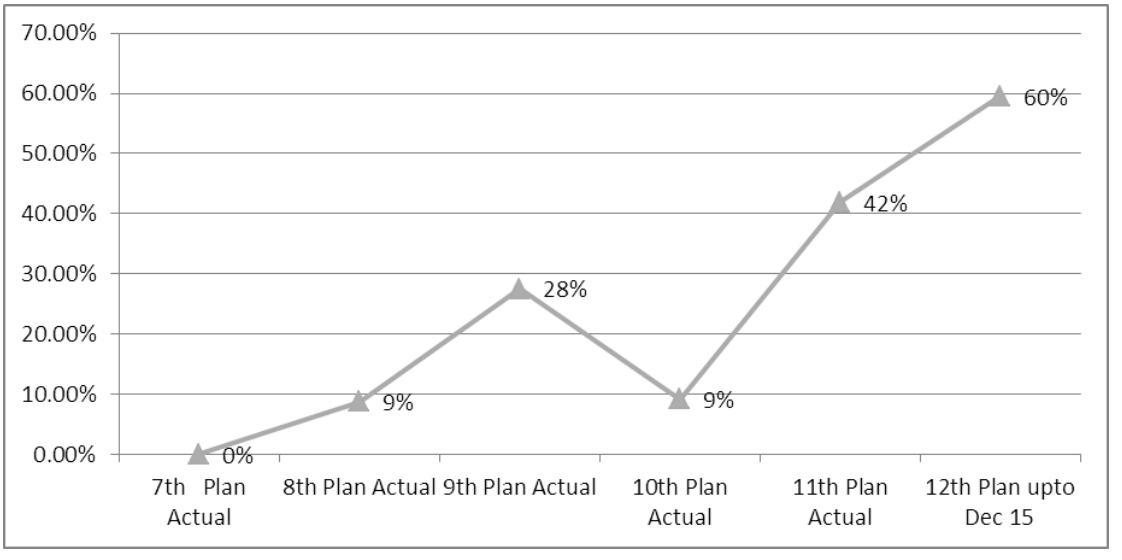
Power shortages in most of the States (all India Energy shortage 11% and Peak power shortage 12% in 2008-09), a well-developed wholesale market, inspiring National Electricity Policy and National Tariff Policy, and assurance from the Government on fuel support and retail market opening, had encouraged a number of entrepreneurs in setting up merchant power plants of fairly sizeable capacity. Availability of credit facility had also encouraged setting up the plant quickly. Contribution of private sector during 11th Plan & 12th Plan grew far larger compared to about 10% in earlier plan periods.

*7. **Central Electricity Authority Presentation on Merchant Power Plants (MPPs) Developers Conference in January 2007.***

*8. **Ibid.***

Plan period wise capacity addition[9]

	Total Addition	Private Sector	Private Sector Contribution (%)
11th Plan	54964 MW	23013 MW	42%
12th Plan	72240 MW (Dec.15)	43023 MW	60%
	88537 MW (target)	46825 MW	53%



Indian Electricity Sector – Important Milestones

1910	Indian Electricity Act	First consolidated Act on electricity business in India. Interestingly, it enabled competition among suppliers
1948	Electricity (Supply) Act	Post-Independence framework to suit new role of electricity as a developmental tool. Concept of vertical monoliths in SEBs brought in
1956	Industrial Policy Resolution	Reserving power generation industry for Government sector
1976	Amendment to 1948 Act	Concept of largescale Central Govt. generating stations for inter-state power sale
1991	GOI policy for inviting large scale private sector participation[10]	Major shift in the backdrop of power shortage and weak financials of SEBs
1995 – 2000	Promulgation of various State Reform Acts	Electricity being concurrent subject, certain States moved on their own to re-organise electricity industry on functional basis viz.

9. ***9CEA, Executive Summary, Power Sector, December 2015***

10. Widening the scope of private sector participation, Ministry of Power, 1991

1998	Electricity Regulatory Commissions Act	Brought in important provision for independent Regulatory Commissions for power sector (State and Central)
2003	Electricity Act 2003	New Act repealing all earlier Acts to modernise & consolidate electricity law
2006	CERC Draft Regulation on market development	To promote market development in line with Electricity Act.
2008	Power Exchanges become operational - platform for short term power trading	Two Power Exchanges became functional – IEX and PXIL
2008 - 2009	Letters of Assurance issued to large number of developers on fuel (coal) supply	GOI assures prospective power project developers regarding supply of domestic fuel
2008	Open access for large consumers	1 MW and above consumers have right to seek open access subject to payment of charges
2012	Government Fuel Policy shift – Merchant generators not to get access to concessional fuel[11]	Fuel will not be supplied by Governmentto generators without long term power sale agreement
2014	Huge private investment in power generation capacity becomes stranded	1. Sharp fall in wholesale price 2. Practically no opportunity for long term power sale agreement. 3. Huge barriers in Retail market and suitable market for sale of power produced. 4. Cancelation of coal blocks allocated to IPPs earlier. 5. Over 20,000 MW capacity stranded

In short, India has seen the following stages of reform so far:

i) Law for electricity sector liberalization

ii) Functional Regulatory Commissions at the Central and State levels

iii) Introduction of private independent power producers

iv) Establishment of wholesale spot electricity market (2 power exchanges) and introduction of Traders

v) Corporatization of State-owned enterprises

vi) Unbundling of the main segments – Genco, Transco and Discom

Wholesale Market Development – Current position

Power Exchanges – Spot Market

Indian short term inter-state power market typically constitutes less than 10% of power generated in the country. Balance is transacted by procuring distribution companies through long term contracts.

Power Exchanges were set up in the year 2008 and discovered high prices during the initial few years. However, such high price phase did not last long and prices started moving southward rapidly. The following table speaks for itself.

11. Indian Power Sector -Impact of Fuel Linkage Policy Reversal on IPPs in India by Bhattacharyya Utpal, Dhingra Dr. Tarun and Sengupta Dr. Anirban, ICMI 2016

Price movement in Power Exchanges

YEAR	2008	2009	2010	2011	2012	2013	2014	2015	2016**
AVERAGE(RTC)	7.54	5.35	3.54	3.39	3.14	2.31	3.23	2.55	2.17
MAXIMA (RTC)*	9.96	13.84	10.55	7.79	7.02	4.07	6.99	4.98	2.7
MINIMA (RTC)*	4.44	0.47	1.22	1.98	1.29	0.47	0.56	1.07	1.69

**Maximum and Minimum values of daily RTC prices discovered in the year*

***IEX price data available upto 16th February 2016*

Long Term Market

Electricity Act 2003 provides for two different routes for long term power procurement by a Discom:

• **Regulated Route** provided under Sec 62, under which the appropriate regulatory commission scrutinizes all costs and determines tariffs based on approved costs, and

• **Competitive Route** provided under Sec 63, where the tariffs are discovered through a transparent competitive bidding process conducted by the procuring Discoms, which are then adopted by the appropriate regulatory commission.

According to the Act, generation is a de-licensed business in India, while the other businesses (transmission, trading and distribution) continue to operate under licence from the appropriate regulatory commission. The National Tariff Policy, 2006, notified by the Govt. of India, mandates that all long term procurement of power by the Discoms would be through competitive bidding only. The competitive bidding mechanism allows for the bidder to bid on the basis of tariffs under a transparent and time bound framework.

With this perspective, the Ministry of Power (MOP) under the Central Government, in 2005, came out with two models for competitive procurement of power[12]:

• **Case1 Procurement:** Where location, fuel or technology is not specified by the procurer of power, and the bidders are free to choose their source/technology/fuel, and all the associated risks are passed on to the seller (i.e., the supplier); and

• **Case2 Procurement:** Where location and fuel are specified and provided by the procurer the procurer prepares the project, including seeking initial clearances for setting up the project on behalf of the future project developer, who is then selected under a competitive process.

In 2013, based on the actual experiences and difficulties faced by project developers in implementation of the competitive bidding framework, and with an aim to further improve the risk sharing frame work between the supplier and the procurer, the Central Government came up with a revised frame work for procurement of power:

• **DBFOT(Design-Build-Finance-Operate-Transfer) Framework, akin to the earlier Case-2 route:** Where the project developer sets up the project under a long term procurement frame work, and on expiry of the term, transfers the project to the procurers, on a pre-defined value; and

• **DBFOO (Design-Build-Finance-Own-Operate)Framework, akin to the earlier Case-1 route:** Where the generation project is setup and operated on Design, Build, Finance, Own and Operate basis by the project developer.

While initially, the results of competitive bidding for procurement of power was showcased as a

12. *Guidelines for Determination of Tariff by Bidding Process for Procurement of Power by Distribution Licensees (Ministry of Power, 2005)*

huge success in the discovery of competitive power tariffs (with the Sasan UMPP being awarded at a levellised tariff of Rs. 1.19 / kWh under Case-2), a vast majority of ~52 GW bid capacity contracted through competitive bidding, representing ~76 GW of installed capacity of coal based power, are facing serious viability challenges today, seeking for compensatory tariffs beyond the discovered tariff to meet the changes in the business conditions. The quoted tariffs have purportedly become non cost-reflective (i.e. quoted tariffs are inadequate, compared to the actual costs being incurred by the developers). Projects are either not able to generate adequate cash flows to cover operating costs and service debt or not able to secure financing to complete the project.

Inability of the competitive bidding framework to provide an adequate mechanism for sharing of risks has led to a situation where in the unanticipated increases in costs have resulted in controversies and legal actions. Alongside, financial position of the State Discoms (potential buyer) is also far from encouraging. With this uncertain background, Discoms do not seem to be willing to invite fresh bids in large scale. Therefore, avenues for securing long term contracts are restricted.

Retail Market Development – Current Position

Since Indian Constitution places electricity as a concurrent subject, intra-state power sector issues are governed by State policies and State Electricity Regulatory Commissions.

Electricity Act provides that the Discoms (the carriage provider) shall provide non-discriminatory open access to any generating company for reaching end-consumer on payment of certain charges and surcharges as determined by State Commissions. Through such provision of open access, the law seeks to balance the rights of the consumer to procure power from a source of his choice, and the interest of the Distribution Licensee [13]. Apart from ensuring freedom to the consumer, the provision forces Discom to improve their performance so that the consumer do not migrate to other suppliers.

A consumer whose maximum power to be made available at any time exceeds 1 MW (Sec.42 of 2003 Act), has earned a right to open access from mid-2008. Such open access shall be subject to payment of the following charges determined by the State Commission.

(1) Wheeling or network charge

(2) Cross-subsidy surcharge

(3) A surcharge on wheeling, if necessary.

Such surcharges and cross-subsidy are to be progressively reduced by the State Commission.

The following table summarizes open access charges, as currently applicable across four major States in India – located in four regions.

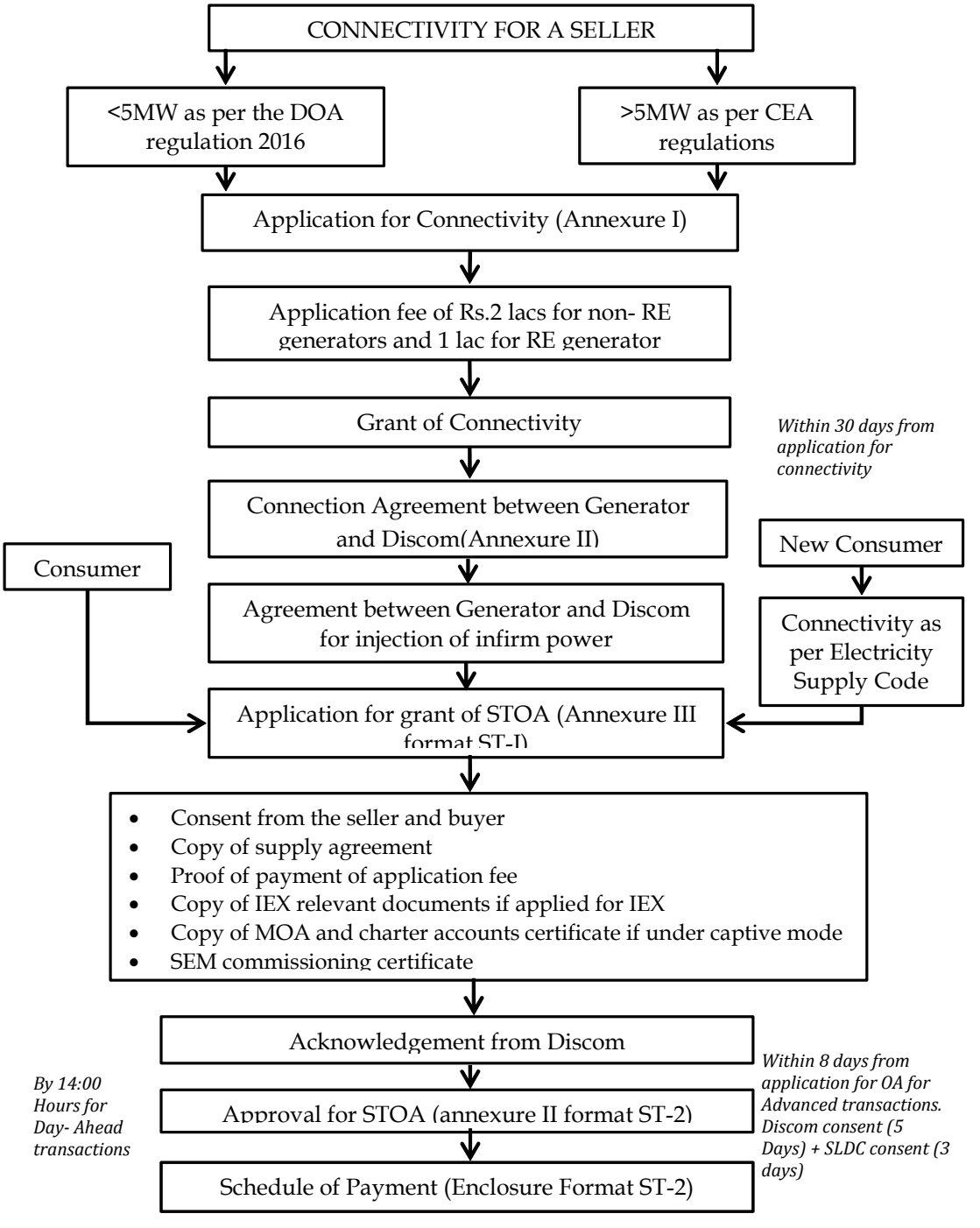
Current Open Access Charges

	Effective STU* Charge	Applicable STU Loss	Effective Wheeling Charge	Applicable Wheeling Loss	Cross Subsidy Surcharge	Overall Barrier cost incl. cost oflosses
	P/U		*P/U*		*P/U*	*P/U*
Uttar Pradesh	19	3.59%	50	8.00%	53	173
Maharashtra	30	3.89%	83	9.00%	149	319
Odisha	7	3.75%	80	8.00%	79	218
Andhra Pradesh	20	4.02%	31	7.47%	239	340

**State Transmission Utility, a statutory body in charge of intra-state transmission activities.*

13. Judgment dated 1.8.2014 of Appellate Tribunal of Electricity in Appeal No.38 of 2013 (M/s. Steel Furnace Association of India Vs. Punjab State Electricity Regulatory Commission)

Process Flow for Connectivity and Open Access Application [14]



14. State Regulatory Commissions statutorily prescribe Regulations on Open Access and Charges. This chart is based on MERC (Distribution Open Access Regulations), 2016 in Maharashtra

Developers allege that process on Open Access is riddled with "Interpretation" by Distribution Company and for thwarting competition, they often resort to coercion on many grounds. Having entered into "lion and the lamb contract", Developers / open access consumers have little bargaining power. Further it is reported that certain state Governments are considering to impose high electricity duty on power purchases by consumers through open access transactions.[15]

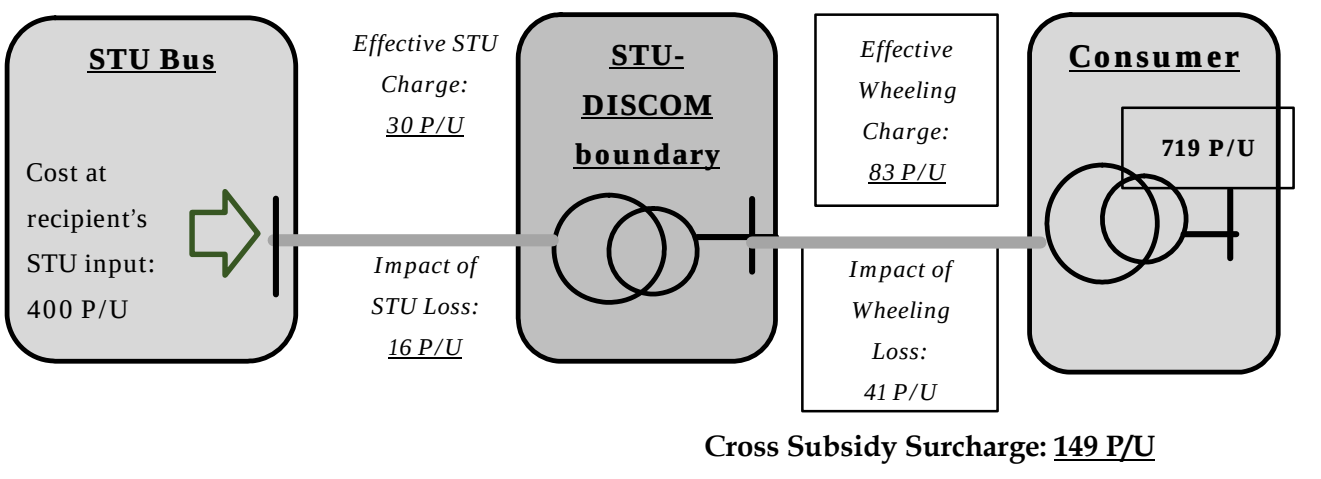
Other Issues / Barriers

Since retail tariff structure prevalent in India is skewed and significant cross subsidy takes place amongst categories, Distribution Companies do not want to lose their large customers through open access. Apart from high charges leviable for open access as above, Discoms alleged to thwart the process often on the following grounds:

1. Transmission constraint
2. Delay in processing the application
3. Imposing Section 11 of Electricity Act 2003[16]
4. Allowing open access on power holidays only
5. Restricting open access for consumers served by common feeders

An illustrative calculation based on input cost of 400 Paise per Unit at the STU bus will translate to a cost of 740 Paise per Unit at the consumer end in the State of Maharashtra. The intervening barrier only in the State system works out to a staggering 340 Paise. Following is a schematic depiction. Calculations are based on 60% load factor.

aharashtra (MSEDCL)



15. *The government would increase electricity duty on sale of power from captive plants to ease the burden. It has already revised electricity duty to Rs 1.20 a unit from 30 paise, he added. The government also plans to impost electricity duty on power purchases, especially by industrial units through open access transactions. The government hopes to mobilise Rs 800 crore annually through this route. – Business Standard dated 24.5.2016.*

16. *Section 11. (Directions to generating companies): --- (1) Appropriate Government may specify that a generating company shall, in extraordinary circumstances operate and maintain any generating station in accordance with the directions of that Government.*

    Explanation. - For the purposes of this section, the expression "extraordinary circumstances" means circumstances arising out of threat to security of the State, public order or a natural calamity or such other circumstances arising in the public interest.

    (2) The Appropriate Commission may offset the adverse financial impact of the directions referred to in sub-section (1) on any generating company in such manner as it considers appropriate.

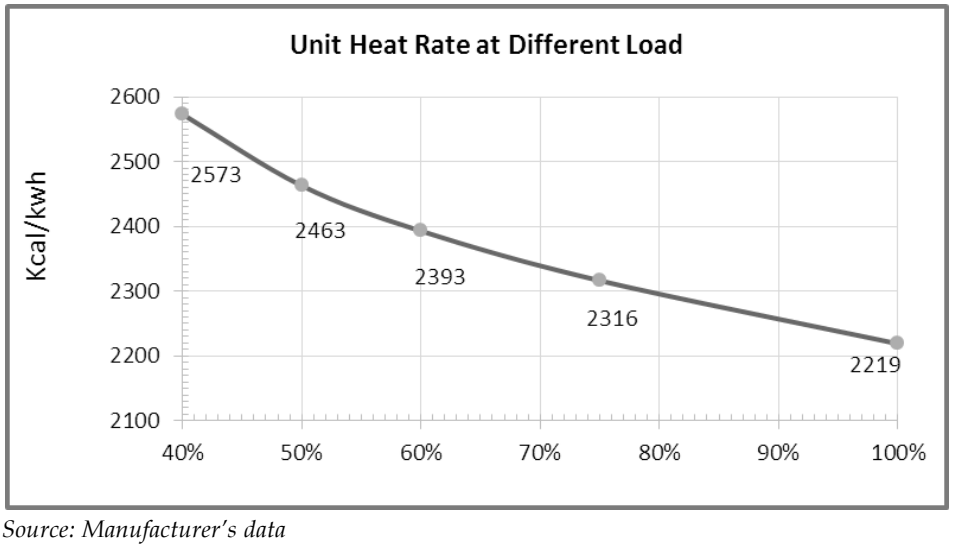
Cost of Power Generation by midscale IPPs

Cost of power generation includes broadly two parts – fixed and variable. While the fixed part primarily reflects Investment costs (the cost of building the system plus non-fuel operating cost) variable part reflects the fuel cost. Power Economists sometimes advocate for one more part to be termed as 'Semi fixed' which is not strictly agnostic to the Plant Capacity Utilization or level of output but its variability also is not significant. An example of such Semi fixed cost would be certain items of maintenance cost.

A coal fired thermal generating station converts energy contained in the fuel to electricity at a rate called heat rate. This connotes the conversion efficiency. Lower heat rate signifies lesser fuel to produce one unit of electrical energy hence higher thermal efficiency. Plant support levels have significant effect on its thermal efficiencies; it is usually more efficient at higher load level (graph below). Further, for operating below 45% of rated output, oil support becomes necessary to stabilize the flame in the boiler.

the State of Maharashtra was selected whose plant has recently been commissioned but currently lying idle for lack of long term contracts. Since it does not service long term contract(s), the plant is not favored with supply of domestic concessional fuel from Coal India, as per the policy restrictions in 2012, although it possesses a valid LOA. In order to generate power and access retail market, it has to source coal through a mix of import and e-auction route.

This study seeks to assess the viability of this project, assuming retail market in the same State where it is located will be accessed by the firm. Interviews were carried out with competent officials of the firm and information obtained covering various parameters like Capacity, Location, Distance from domestic coal source and port, Latest project cost, Unit size, thermal efficiency, Sources of coal, and open access charges payable. Special emphasis was given to understand the challenges and barriers faced by the firm to access large end-consumers in the State retail electricity market and the price that it is likely



Source: Manufacturer's data

Assessment of project viability of such IPPs seeking to access retail consumers

Methodology

In order to assess viability for a generator seeking to access Retail Market, are preventative IPP in to fetch from such consumers. Financial models were thereafter prepared at various Plant Load Factors (capacity utilisation) to arrive under Cost of Generation at various scenarios.

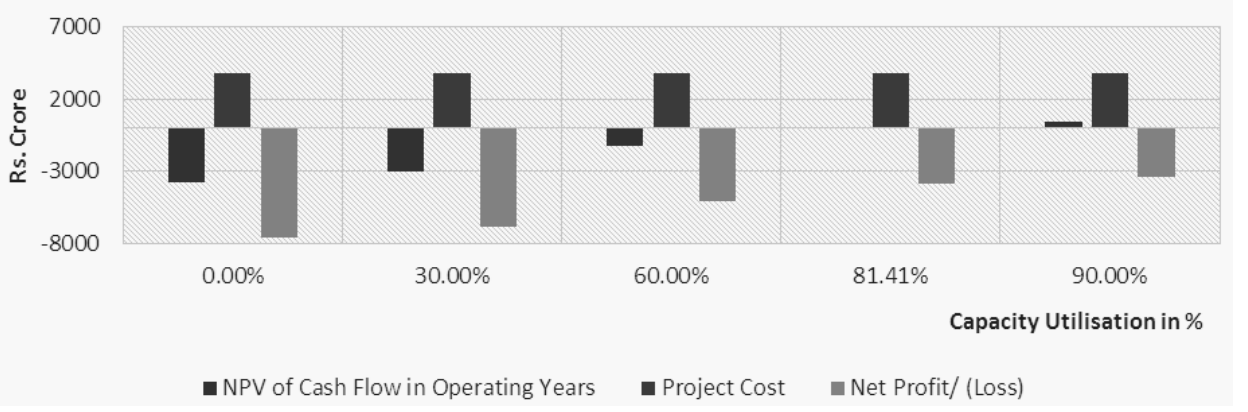
Assumptions

No. of year		1
Year start date		1/4/2015
Year end date		3/31/2016
Performance parameters		
Expected actual heat rate	kCal/ kWh	2360
Expected actual secondary specific fuel oil consumption	ml/ kWh	1.00
Expected actual auxiliary energy consumption	%	9.00%
Fuel parameters		
GCV of secondary fuel oil	kCal/ litre	9500
GCV of E-auction coal	kCal/ kg	3300
GCV of imported coal	kCal/ kg	5050
Blending proportion of E-auction coal	ratio by weight	50%
Blending proportion of imported coal	ratio by weight	50%
Fuel price input		
Price of secondary fuel oil	Rs./ kl	45000
Price of E-auction coal	Rs./ Tonne	2876
Price of imported coal	Rs./ Tonne	5055
Norm for O&M cost		
As per CERC Regulation (for first year)	Rs. Lakh/ MW	21.21
Norm for working capital		
Fuel cost (coal+sec oil)	Months	2.00
Month O&M cost	Months	1.00
Maintenance spares	% O&M cost	20%
Receivables	Months	2.00
Rate of interest	% p.a.	12.50%
Transmission charge		
Contracted capacity on Maharashtra state transmission network	MW	550
STU transmission charge	Rs./ kW/ month	194.79
Monthly transmission charge payable	Rs. Crore	10.71
Total transmission charges for the year	Rs. Crore	128.56
Other open access charges		
Wheeling charges on MSEDCL network @ 22 kV network	Rs./ kWh	0.83
Cross subsidy surcharge payable by HT Industrial consumer	Rs./ kWh	1.49
Tariff of industrial consumer		
MSEDCL HT Industrial Tariff (express feeder)	Rs./ kWh	8.02
Realisable price from open access sale	Rs./ kWh	6.82

Summary of Findings

Scenarios at different levels of capacity utilisation, when supply of linkage is denied, 50% imported coal and 50% e-auction coal used for generation, is presented below:

Capacity Utilisation		0.00%	30.00%	60.00%	80.00%	81.41%	90.00%
NPV of Cash Flow in Operating Years	Rs. Crore	(3775.58)	(2974.46)	(1214.20)	(77.78)	0.00	467.49
Project Cost	Rs. Crore	3850.00	3850.00	3850.00	3850.00	3850.00	3850.00
Net Profit/ (Loss)	Rs. Crore	(7625.58)	(6824.46)	(5064.20)	(3927.78)	(3850.00)	(3382.51)



Further, at 60% level of capacity utilisation, the model is run with varying use of linkage and e-auction coal. Scenario 3 envisages "what-if" linkage coal is supplied.

Scenario 1

No linkage coal, 50% e-auction coal and 50% imported coal, and gradual CSS reduction by 5% each year till CS reaches the level of 20% (Applicable tariff reaches 120% of average cost of supply)

Scenario 2

75% linkage coal and 25% e-auction coal, and gradual CSS reduction by 5% each year till CS reaches the level of 20% (Applicable tariff reaches 120% of average cost of supply)

Scenario 3

100% linkage coal, and gradual CSS reduction by 5% each year till CS reaches the level of 20% (Applicable tariff reaches 120% of average cost of supply)

The results of the findings are presented below:

		Scenario 1	Scenario 2	Scenario 3
NPV	Rs. Crore	(1214.20)	59.78	483.30
Project Cost	Rs. Crore	3850.00	3850.00	3850.00
Net (Loss)	Rs. Crore	(5064.20)	(3790.22)	(3366.70)

It is clearly demonstrated that with increasing use of linkage coal the Net Earning improves.

To extend the analysis further to examine the significance of open access charges, results for various levels of reduction in open access charges are presented below, Capacity utilisation is maintained at 60% across the scenarios.

Open access charges reduction by		20%	22%	30%	100%
NPV of cash earnings	Rs. Crore	(99.81)	0.00	438.56	3495.01
Project cost	Rs. Crore	3850.00	3850.00	3850.00	3850.00
Net Loss	Rs. Crore	(3949.81)	(3850.00)	(3411.44)	(354.99)

Evidently, open access charges present a significant barrier. Even reducing such charges by about 22%, the NPV of net cash earnings will only be nil and not positive.

Retail Market Development – Way Forward

Electricity Act 2003 was the landmark legislation which laid the foundation for the sector reform process on a pan-India basis. A well laid out reform process begins with restructuring of vertically integrated utilities into generation, transmission and distribution businesses, and culminates into segregation of distribution business into wires and retail business. The final phase of reforms brings in competition into the electricity retail business, where the consumers have the choice to select their service providers.

Open Access in power distribution/ transmission creates opportunities for power generation companies/ IPPs to sell power directly to the consumers. This is to also benefit ultimate consumers.

However, unless the distribution segment (which is the only source of revenue generation in the entire value chain, other than government budgetary support) becomes more efficient and generates positive cash flows, many of these interventions will not be effective.

The Act provides a lot of emphasis on wholesale market competition, power exchanges and open access - which enables pseudo competition in power retail business. There are clear regulatory frameworks adopted by SERCs for unbundled wire and retail tariffs for a distribution company. This was aimed at promoting competition through open access. However, in reality, existing distribution companies and regulators leverage certain provisions of the Act to create stiff entry barriers for generating companies and electricity traders in form of high cross subsidy surcharge and technical grounds for rejecting open access applications.

Similarly, power exchanges were created with an aim to provide a route for consumers to buy electricity directly from market. However, lack of adequate transmission infrastructure has led to the slow growth of power exchanges and high tariff barriers have led to fall in generation prices.

It is imperative now that such barriers be looked down so that open access provision is utilised in full spirit.

The declining performance of the power sector, especially the financial health of the distribution companies and stranded assets in case of generation companies, had led the Government to embark upon the idea of wire and content (retail) separation of distribution business. An amendment to the Electricity Act 2003 has been envisaged to introduce unbundling of wires and content business. The Forum of Regulators have floated a concept paper, detailing out the various models for implementing of segregation of wire and retail business. The concept paper further looks at the challenges in these models in Indian context in actual implementation at the state level.

While the proposed amendment to the Act has been approved by the Cabinet in principle, this has been referred to parliamentary standing committee for review. The process hereon from the standing committee till the amendments acquire legislative status is a time consuming process. It will take some time before the amendments are implemented and further, more time for the entire implementation to kick in.

Conclusion

Responding to the invitation of GOI, a number of private sector investments came in for building up thermal power plants in India between 2006 and 2010. Thermal power projects require huge capital investment with long gestation period. A smart 2x300 MW coal based power plant requires an installation period of about 48 months and Rs.4000 Cr. investment. Today over 20,000 MW capacities representing an investment of Rs.1, 20,000 Cr. is facing serious viability challenges. The country can ill afford this because large public finance is involved.

The study reveals that although retail electricity market, as assured by GOI was opened up from the year 2008, it suffers from high entry barriers rendering competition nugatory. Intention of the policy makers backed by judgment of Appellate Tribunal of Electricity failed to remedy the situation. It is about time Regulations are amended and difficulties removed for open access which is undoubtedly a major issue besieging the Indian power sector today.

APPENDIX

	1 1/4/2015 31-03-2016	2 1/4/2016 31-03-2017	3 1/4/2017 31-03-2018	4 1/4/2018 31-03-2019	5 1/4/2019 31-03-2020	6 1/4/2020 31-03-2021	7 1/4/2021 31-03-2022	8 1/4/2022 31-03-2023	9 1/4/2023 31-03-2024	10 1/4/2024 31-03-2025	11 1/4/2025 31-03-2026	12 1/4/2026 31-03-2027
81.41%	Zero NPV Scenario											
Rs./ kWh	1.92	1.95	1.94	1.89	1.84	1.79	1.75	1.7	1.66	1.62	1.59	1.55
Rs./ kWh	2.5	2.58	2.66	2.74	2.82	2.91	3	3.09	3.17	3.27	3.37	3.47
Rs./ kWh	4.43	4.54	4.6	4.63	4.65	4.7	4.74	4.79	4.83	4.9	4.96	5.03
Rs./ kWh	0.38	0.39	0.4	0.41	0.42	0.44	0.45	0.46	0.48	0.49	0.51	0.52
Rs./ kWh	0.83	0.85	0.88	0.91	0.94	0.97	1	1.03	1.06	1.09	1.12	1.15
Rs./ kWh	1.49	1.31	1.1	0.99	1.02	1.05	1.08	1.11	1.15	1.18	1.22	1.25
Rs./ kWh	2.7	2.55	2.38	2.31	2.38	2.46	2.53	2.6	2.69	2.76	2.85	2.92
Rs./ kWh	7.76	7.74	7.64	7.61	7.7	7.83	7.96	8.08	8.21	8.36	8.52	8.67
Rs./ kWh	6.82	6.76	6.69	6.72	6.93	7.13	7.34	7.57	7.79	8.02	8.27	8.52
Rs./ kWh	0.94	0.98	0.95	0.89	0.77	0.7	0.62	0.51	0.42	0.34	0.25	0.15
Rs. Crore	2328.88	2302.09	2278.25	2288.46	2366.44	2428.09	2499.6	2577.93	2660.12	2731.17	2816.31	2901.45
Rs. Crore	2649.07	2635.23	2603.02	2591.23	2630.6	2668.03	2709.15	2752.2	2802.83	2847.8	2900.61	2952.22
Rs. Crore	320.19	333.14	324.78	302.77	264.15	239.95	209.55	174.27	142.72	116.62	84.3	50.78
Rs. Crore	0	0	0	0	0	0	0	0	0	0	0	0
Rs. Crore	320.19	333.14	324.78	302.77	264.15	239.95	209.55	174.27	142.72	116.62	84.3	50.78
Rs. Crore	118.17	131.13	122.76	100.75	62.13	37.93	7.53	27.75	59.3	85.4	117.71	151.24
Rs. Crore	0											
Rs. Crore	3850											
Rs. Crore	3850											

APPENDIX

No. of year		13	14	15	16	17	18	19	20	21	22	23	24	25
Year start date		1/4/2027	1/4/2028	1/4/2029	1/4/2030	1/4/2031	1/4/2032	1/4/2033	1/4/2034	1/4/2035	1/4/2036	1/4/2037	1/4/2038	1/4/2039
Year end date		31-03-2028	31-03-2029	31-03-2030	31-03-2031	31-03-2032	31-03-2033	31-03-2034	31-03-2035	31-03-2036	31-03-2037	31-03-2038	31-03-2039	31-03-2040
Capacity utilisation	0.814082%													
Fixed cost of generation per unit (ex-bus)	Rs./ kWh	1.2	1.17	1.18	1.24	1.3	1.36	1.43	1.5	1.57	1.66	1.74	1.83	1.92
Variable cost of generation per unit (ex-bus)	Rs./ kWh	3.57	3.69	3.8	3.91	4.02	4.15	4.27	4.4	4.52	4.67	4.81	4.95	5.09
Total cost of generation per unit (ex-bus)	Rs./ kWh	4.77	4.86	4.98	5.15	5.31	5.51	5.7	5.9	6.09	6.32	6.55	6.78	7.01
Transmission charge per unit of sales	Rs./ kWh	0.54	0.55	0.57	0.59	0.6	0.62	0.64	0.66	0.68	0.7	0.72	0.75	0.77
Discom wheeling charge per unit of sales	Rs./ kWh	1.18	1.22	1.26	1.3	1.34	1.38	1.42	1.46	1.5	1.55	1.6	1.65	1.7
Cross subsidy surcharge per unit of sales	Rs./ kWh	1.29	1.33	1.37	1.41	1.46	1.49	1.54	1.59	1.64	1.69	1.73	1.79	1.85
Total open access charges per unit of sales	Rs./ kWh	3.01	3.1	3.2	3.3	3.4	3.49	3.6	3.71	3.82	3.94	4.05	4.19	4.32
Total cost of delivery per unit of sales [excluding effect of income tax payable]	Rs./ kWh	8.46	8.66	8.9	9.19	9.48	9.79	10.12	10.46	10.79	11.17	11.54	11.94	12.33
Sale price to open access consumer	Rs./ kWh	8.77	9.04	9.32	9.59	9.88	10.17	10.47	10.8	11.12	11.46	11.8	12.16	12.53
Profit / (Loss) per unit of sales	Rs./ kWh	0.31	0.38	0.42	0.4	0.4	0.38	0.35	0.34	0.33	0.29	0.26	0.22	0.2
Total revenue from sales	Rs. Crore	2994.76	3078.53	3173.88	3265.83	3373.81	3463.35	3565.51	3677.89	3797.24	3902.65	4018.43	4141.03	4278.72
Total operating expenses	Rs. Crore	2887.39	2948.22	3029.51	3128.75	3236.82	3335.62	3447.17	3561.84	3682.94	3804.9	3930.21	4066.12	4209.44
Profit / (Loss) before tax	Rs. Crore	107.37	130.31	144.38	137.08	136.98	127.73	118.34	116.05	114.3	97.74	88.22	74.91	69.29
Tax payable	Rs. Crore	22.92	27.81	30.81	29.26	29.23	27.26	25.26	24.77	24.39	20.86	18.83	15.99	14.79
Net Profit/ (Loss) after tax	Rs. Crore	84.46	102.5	113.56	107.83	107.75	100.47	93.09	91.28	89.91	76.88	69.4	58.93	54.5
Net cash flow from project	Rs. Crore	164.52	182.56	193.62	187.89	187.81	180.53	173.15	171.34	169.96	156.94	149.45	138.98	134.56

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Protection for the Poor in Electricity Pricing: Global Lessons for India

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Abstract

Demographic profile of India indicates largest poverty headcount in the world. Dealing with such number of stakeholders requires a defined strategy as practised by some countries, to satisfy the electricity needs of vulnerable segments.

Global learnings for India and similar developing economies suggest requirement of a well-articulated policy to recognise vulnerability with a mechanism for identification of the segment needing support. Thereafter, choices of addressing their electricity requirement at affordable rate can be devised either through obligations cast upon the State or other customers, to serve societal benefit objectives. Innovative tariff structuring lessons are also available internationally.

Keywords: *Cross-subsidy; cost to serve; lifeline customer; subsidy; vulnerable consumer*

Context Setting: Societal Objective of Providing Electricity to Poor Consumers in a Reformed Environment

Electricity reform with a distinct market-orientation is sweeping through developing / transition economies from early nineties (Williams & Ghanadan, 2006). While the development of power sector plays a pivotal role in Indian economy development blueprint, and this sector is undergoing changes and reforms for more than 20 years, the fact stands out that the sector has a staggering loss of Rs.3.8 trillion (Ministry of Power, Government of India, 2015).

One of the main problems with electricity provision in emerging countries lies in demographics (Mouton, 2015). Population exerts a real pressure on infrastructure and utilities in general, and electricity provision in particular.

India has the second largest population in the world - about 1.28 billion (2013), of which nearly 0.27 billion (21.25%) are under poverty headcount (World Bank). Both the number of consumers (actual and potential), as well as the number of poor people, with low capacity to pay, combine to make Indian electricity sector reform initiative a challenging task. While China, the most populous country in the world, is also going through a phase of reform of the sector, it has a dissimilar political regime and a different set of issues. Moreover, while China's population was about 1.38 billion (2013), poverty headcount is around 0.15 billion (11.18%) (World Bank) i.e. India's poverty headcount is 79% more than that

of China. These indicative statistics merely provide a perspective on the magnitude of the problem of the poor in India.

Reform of the sector is a delicate process, and may require handling with singular circumspection. While the jury is still out on the question whether a model of electricity sector reform, lifted out of another country with different economic and social nuances, is implementable, this paper attempts an analysis of the lessons learned, particularly in the context of developing economies and tries to chalk out a path forward, with special emphasis on the Indian perspective with its extensive vulnerable population.

Literature Review

While progression towards cost-to-serve is mandated through legal pronouncements and policy instruments, as well as opinion of industry experts, it is worth-while to review literature on the subject to assess its requirement and significance. In case application of a cost-to-serve model in a reformed / competitive environment is recommended, there emerges a necessity of discovering whether international experience suggests rendering of any protection to any segment of consumers in this competitive, cost-to-serve model, particularly to the poor consumers and marking out a path forward on dealing with this protection need.

Basic Tenets of Reform

Standard Reform Model requires cost alignment as the first step

Pricing reform is one of the most challenging tasks of reforming the sector (Kessides, 2012). Ideally, there is a logical sequence of reforms where the reforming country should first raise prices to cost recovery levels (with return on capital to finance investment), then create regulatory institutions and restructure the sector, and privatize only after these steps are taken. A Standard Model of reform needs to be adopted and departure therefrom is likely to lead to performance problems. In many developing countries, regulated prices were inefficiently low. Liberalisation leads to higher prices. Historic pricing distortions in the electricity sectors of developing countries i.e. cross subsidies from industrial customers to households gradually reduce as prices for the latter are realigned with underlined costs.

Retail margins Tariff set at levels higher than actual costs are not permitted in a Competitive Model: Social policy objectives can no longer be met through electricity pricing.

Only where the regulated sector is a monopoly, above market costs can be collected as the customers cannot bypass the delivery system (Hunt & Shuttleworth, 1996). With full retail competition, lifeline rates for poor people cannot be accomplished since markets obey the law of one price. Since the retailers can no longer discriminate, explicit provision is needed by other means like non by-passable levies on all retail sales through legislation.

Reform Expectation: Erosion of Cross-Subsidy - Political and welfare implications – Support to low-income consumers

Reforms are expected to erode cross-subsidies. With the threat of introducing competition, there was erosion of cross-subsidies in U.K., which particularly impacted elderly and low-income consumers. Since this has political and welfare implications, these issues may be addressed by the government through additions to welfare system like provision of direct subsidies in the form of grants (Davies, Wright, & Price, 2005). Unless the government strengthens regulations, the exploitation of small consumers will worsen as large consumers do well when liberalisation takes place (Thomas, 2005). Competition and choice

in electricity appears to have a built-in bias towards large consumers (Dubash & Singh, 2005).

A study (Haselip, Dyner, & Cherni, 2005) examines outcomes of electricity market reform in developing countries. Reform supporters advocate that market liberalisation leads to a more efficient allocation of resources. Removal of across-the-board subsidies to low-income consumers can better handled by targeted subsidies, with States assuming the responsibility of the poor. Critics are of the opinion that there is an adverse effect on the impoverished group.

Public interest depends on whether policy-makers are sufficiently far-sighted to steer financial globalisation policies, which are based on narrow economic considerations, toward positive social and environmental outcomes (Dubash, 2002).

International Scenario: Specifically approved cross-subsidies instituted in the tariff structure to address socio/political needs

Cross-subsidies should have a minimal impact on electricity price of the productive sector

In analysis of electricity industries of England, France, U.S.A., Canada, Scandinavian countries, Japan, Germany, New Zealand, Yugoslavia, Argentina, Brazil, Uruguay and Chile, the conclusion is that industrial consumers pay less than domestic consumers. (Gilbert & Kahn, 1996). Burden of fixed cost recovery is borne by small consumers, particularly commercial firms. Residential consumers typically benefit from their political influence in the aggregate.

In Russia, residential tariffs are proposed to be subject to government regulation at least until 2015) and full elimination of cross-subsidies in residential electricity tariffs to be achieved in 2015 (Sidorenko, 2009). In South Africa, only specifically approved cross-subsidies must be instituted in the tariff structure to address certain socio/political needs, with a minimal impact on price of electricity to consumers in the productive sector (Electricity Pricing Policy (EPP) of the South African Electricity Supply Industry issued by the Department of Minerals and Energy, Statskoerant, No. 31747, 2008). Only elimination of cross-subsidies will push customers towards the market-oriented outcomes that were intended (Rosenzweig, Potts Voll, & Pabon-Agudelo, 2002).

Regulation need for protection of small consumers

Regulator based governance structures are likely to remain the vehicle of choice for 'public utility' regulation, as it provides a modicum of protection to small consumers with no other options against monopoly exploitations (Crew & Kleindorfer, 2002).

Analysis of Benefit to Residential and Small consumers Post Reform

Lessons from twenty years of electricity market liberalisation has been analysed (Joskow, 2008). Benefit of retail competition is not obvious in the context of residential and small commercial consumers.

A study has demonstrated the different principles and practical considerations involved, drawing particularly on the Latin American experience (Chisari, Estache, & Waddams Price, 2001). While regulatory reform can bring long term benefits to consumers through lower costs and prices, low-income consumers do not necessarily benefit. In particular the introduction of competition may erode traditional cross-subsidies.

Objective of the Paper and Methodology

This paper seeks to assess relative successes and failures of support given to the poor consumers to address societal needs in the context of a few selected countries around the world to. An Indian co-relation is attempted to appreciate global issues in parallel with an understanding of country-specific contexts.

Countries have been chosen on the basis demographic profile, maturity level of electricity reform as well as some apparent relevance / learning in the context of vulnerable consumers. A path forward for India is attempted thereafter.

Global Understanding

Chile, Argentina, Philippines and United Kingdom (U.K.) have been, with focus on protection rendered to the poor consumers in the electricity system, through subsidy or cross-subsidy, whether through revenue support or capital funding.

Table 1: Demographic Profile of Selected Countries in 2013

Country	Population (Million)	Poverty Headcount[1] (%)	Poor Population (Million)
	(1)	(2)	(3 = 1 x 2%)
Chile	17.6	0.90%	0.16
Argentina	42.5	1.80%	0.7
Philippines	97.6	13.10%	12.8
U.K.	63.7		
India	1279.5	21.30%	272.5

Source: World Bank. Poverty headcount percentage of the Philippines is for 2012, India 2011. For U.K., a high income country, there is no poverty headcount data available

Chile

Chile is considered to be a successful example of electricity reform in a developing country and is a model for other privatisations in Latin America (Pollitt, 2004). Pollitt also observes efficiency improvements seen in the sector, with falls in prices and high rates of return. Chile has a successful rural electrification programme, where only 14% of rural households were without electricity in 2002 compared with 62% without electricity in 1982. While the users are expected to pay for running costs, the capital cost of rural connections are shared - 70% comes as subsidy from the State, 20% from the companies and 10% from the users.

As per a World Bank Case Study (Barnes, 2005), Chile's rural electrification model is relevant for other countries, where there is competitive environment for subsidy funding. Gross social benefit (economic or social NPV) is calculated, considering the forms of energy in use that would be displaced by electrification like kerosene lanterns, dry cells, automotive batteries etc. In parallel, a financial analysis is undertaken. The maximum amount of subsidy is set above the financial break-even point. A project qualifies for subsidy only if it is economically attractive for the country and financially so for the utilities.

A lesson from the Chilean experience is that it is possible to design subsidies such that the beneficiaries perceive the marginal cost of providing the service (Serra, 2000).

Argentina

Reform of the electricity sector of Argentina is considered an important case study for developing countries as it went through a phase of success in the 1992–2002 period, a crisis period in 2002 and post-crisis developments (Pollitt, 2008).

By 2002, while electricity prices in Argentina were the lowest in Latin America, the price for the smallest residential customers (making up around 38% of total customers) rose by 25%. Poor consumers were paying for electricity which they had previously received via free connections, representing a welfare loss to this group. Industrial customers benefitted disproportionately. While the Argentinian crisis of 2002 is attributed to macro-economic reasons, the steps taken to protect the electricity sector were retrograde – the return to poorly discriminating price controls i.e. low prices for everyone,

1. ***Poverty headcount data is at $1.90 a day, source: World Bank***

including the rich. Failure to reinstate market determination of prices led to enhanced electricity demand due to low prices. Government subsidies to the wholesale power market to prevent prices increasing are reported to be around 0.5% of GDP (Pollitt, 2008).

The perceived success of reform in Argentina (improved service quality and network expansion) was possible only through the subsidy route (Haselip, Dyner, & Cherni, 2005). Other observations include a discussion on social tariff as low-income consumers have benefitted the least and economic benefits have gone disproportionately to larger consumers.

In a recent development, Wall Street Journal reports that Argentina announced a cut on electricity subsidies. 2.9% of Argentine GDP (more than 12% of all federal spending, excluding debt repayments) went to meet energy subsidies in 2014. Reasons for subsidy reduction are cited as wasteful use of electricity due to cheapness, decline in quality due to frozen rates and lack of investments, repeated blackouts etc. (Turner, 2016). Introduction of a social tariff on wealthier users that will provide money to reduce the impact on poorer households is contemplated (Associated Press, 2016). Literature is yet to be available on the impact of this recent development, indicating downsizing of both subsidies and cross-subsidy in tariff.

Philippines

Philippines had a population of 97.6 million in 2013, of which 13.1% are under poverty headcount i.e. around 12.8 million (World Bank). It is a country with a significant population and poverty base, though not strictly comparable with India.

Philippines went through a process of reform through partial opening of the sector. Reform with private sector participation increased social welfare (Toba, 2003). As a part of the reform initiatives, a universal charge was imposed on all electricity end-users (Cham, 2007) to cover various expenditures, including mitigation fund for removal of cross-subsidies. Even after removal, low-income end-users would be subsidized under a lifeline rate for a period of ten years.

To recover inter-class cross subsidy under-recoveries and lifeline subsidy rates under-recoveries, a separate charge on all consumers is allowed (Forum of Regulators assisted by PricewaterhouseCoopers Private Limited, April 2015). Access to electricity for the poor is addressed through the policy of creation of a subsidised tariff (Mouton, 2015). Collectively financed by all consumers i.e. residential, commercial and industrial, it is limited to residential beneficiaries alone, and is allowed solely on the basis of the consumption of the household without any connectivity with the household revenues. The system has shortcomings as it does not exclusively reach the marginalised end-users. Secondary residences of wealthy households with lower usage benefit from subsidised rates and poorer households with consumption above the limit of lifeline consumption, due to more members, are known to get excluded.

Table 2: Lifeline Discount in Meralco (Philippines)

Residential (Consumption)	Lifeline Discount
0 to 20 kWh	100%
21 to 50 kWh	50%
51 to 70 kWh	35%
71 to 100 kWh	20%

Source: Summary Schedule of Rates effective March 2016 Billing of Meralco (Manila Electric Company)[2]

2. ***From the Summary Schedule, all other consumer categories are seen to provide Lifeline Rate Subsidy and Senior Citizen Subsidy.***

Ofgem recognises division of responsibility between the regulator and the Government and have focussed on making the energy market work effectively for the consumers, in terms of access to services, choice, debt and affordability, through monitoring the market, identifying best practice and where appropriate, creating regulation. The Government has a wider role, to consider sustainability, security and affordability. The tools available to the Government differ as they are able to establish direct price support for certain consumers and energy saving programmes.

The Consumer Vulnerability Strategy Progress Report (Ofgem, 2015) has details on Warm Home Discount Scheme of the Government, under which suppliers with more than 250,000 domestic consumers (gas and electricity), provide electricity bill rebates and indirect support to low-income consumers. With a focus on fuel poverty, Ofgem encouraged introduction of tailored social tariffs for vulnerable consumers.

While there is insufficient literature available on the subject to test Ofgem's effectiveness, it is apparent that there is a well-laid process to identify the vulnerable consumers, which are not necessarily limited to just poor consumers and there is a multi-prong strategy to mitigate the issues faced by the vulnerable consumers, with a clear demarcation between the responsibilities of the Government and the Regulator in tackling the issue of vulnerability.

Waddams Price comments upon protection of low-income consumers, need to take account of social guidance provided by the government and policy to eliminate fuel poverty. Innovations were brought into the tariff structure, including tariff without standing charges i.e. only variable charge being levied, as well as tariff with no variable charge i.e. only fixed cost (Waddams Price, 2005). However, later literature suggests that innovations were whittled down as restrictions appeared on the number of products in total that can be introduced (Pollitt & Haney, 2014), (Littlechild, 2014).

While U.K. experience is not strictly comparable with India, there are lessons to be garnered from its reform path.

India

Over last 40/50 years, in order to placate large masses of people, in almost all the States, domestic and agricultural prices of power have been kept so low that, commercial and industrial tariffs have become excessive. Pricing for supply of power particularly to rural and domestic sectors has very much become a political issue (Shahi, 2005). There is serious concern on extremely slow progress on tariff rationalisation (Kumar & Chatterjee, 2012). Indian Policy Instruments and judicial reviews require cross-subsidy reduction and progression towards cost of supply[3]. The Electricity Act, 2003 recognised cross-subsidy as an issue and set the target of achievement of 'cost of supply' for all categories of consumers through progressive reduction and eventual elimination of cross-subsidy[4]. While this position was somewhat diluted through subsequent statutory policies

3. ***The Statement of Objects and Reasons to the Electricity Regulatory Commissions Act, 1998 stated "that as the problems of the power sector deepen, reform becomes increasingly difficult underscoring the need to act decisively and without delay. It is essential that the Government implement significant reforms by focussing on the fundamental issues facing the power sector, namely the lack of rational retail tariffs, the high level of cross-subsidies…."***

4. ***Sections 38(2)(d), 39(2)(d), 40(d) 42(2), 61(g)of the Electricity Act, 2003 (36 of 2003) notified vide S.O. 669 (E), June 10, 2003 read with amendments made through the Electricity (Amendment) Act, 2007 (26 of 2007), May 29, 2007***

(National Electricity Policy[5] and Tariff Policy[6]) as well as amendment of the 2003 Act, the final legal position[7] through Apex Court judgment stands that the ultimate objective is to arrive at cost of supply based on voltage of supply.

There is severe criticism of subsidy leakage in India. Findings reveal that most states subsidize a substantial portion of domestic consumption. While 25 percent of households lack access to electricity and therefore receive no subsidy, more than half of subsidy payments (52 percent) India-wide went to the richest 40 percent of households in 2010, underlining the potential gain to utility revenues from better targeting that would reduce household subsidies (Pargal & Ghosh Banerjee, 2014).

A United Nations Foundation report (Morgan, T., Menecon Consulting, 2003) identifies the key issues in the context of Indian subsidy scenario. Firstly, which consumers to subsidise - subsidies could be provided to households / farmers who are not already connected to the distribution network. Subsidies to the poorest existing customers may also be justified. Secondly, access to the service may be justified for customers without service. Thirdly, the subsidy mechanism of choice - demand-side subsidies tend to work better than producer subsidies to reach targeted customer groups. Fourthly, decision on the amount of subsidy. Lifeline rates, if used, should be limited to modest levels of consumption such that subsidies are not appropriated by richer households, but reach the desired segments.

The question of access to service i.e. rural electrification in India is presently undertaken through Deendayal Upadhyaya Gram Jyoti Yojana (DDUGJY) (Ministry of Power, Government of India, 2014). The funding mechanism is such that upto 75% grant is available for general states and 90% for special category states (being North-eastern States, Sikkim, Jammu & Kashmir, Himachal Pradesh and Uttarakhand). Initial grant of 60% and 85% may go up by an additional 15% and 5% respectively; on achievement of prescribed milestones. This is a revamped model of earlier Rajiv Gandhi Grameen Vidyutikaran Yojana (RGGVY).

The questions of sustainability and affordability, however, are riddled with issues due to prevalence of subsidies and cross-subsidies as well as differing State-specific ideologies on the subsidy question. A study covering 55 utilities of India (97% of sales) is available (Chatterjea, Dwivedi, & Sengupta, 2016) which indicates that the Indian states have varying definitions of lifeline consumers, ranging from 16 kWh monthly consumption in Tripura to 200 kWh in Punjab. Some states do not define lifeline, but end up subsidising large chunks of domestic / low-end commercial consumers. Connected load is undefined in many states and varies between 120 watts to 1000 watts in others. Without 'connected load' in the definition of lifeline, secondary homes end up enjoying subsidy.

5. ***National Electricity Policy, February 12, 2005 issued by the Ministry of Power, Government of India: "Over the last few decades cross-subsidies have increased to unsustainable levels. Cross-subsidies hide inefficiencies and losses in operations. There is urgent need to correct this imbalance without giving tariff shock to consumers. The existing cross-subsidies for other categories of consumers would need to be reduced progressively and gradually."***

6. ***Tariff Policy, January 28, 2016 issued by the Ministry of Power, Government of India: "For achieving the objective that the tariff progressively reflects the cost of supply of electricity, the SERC would notify a roadmap such that tariffs are brought within ± 20% of the average cost of supply. The road map would also have intermediate milestones, based on the approach of a gradual reduction in cross subsidy."***

7. ***Judgments of the Appellate Tribunal for Electricity***

Key Learnings

Table 3: Key Global Learnings

Country	Key learnings for developing economies	Comments
Chile	• Rural electrification projects are assessed on the basis of economic or social benefits as well as financial benefits. The maximum subsidy allowable is set above the financial break-even point. • Running costs are paid by the users.	• Social cost evaluation is an innovative and replicable model. • Projects can be competitively bid on the basis of lowest subsidy requirement. • Lowers net subsidy requirement of the government for rural electrification capital scheme.
Argentin	• For non-payment of bills in slum areas, the government picks up the payment. • Payments are made from a special fund. Regularised customers contribute to the fund as well. • Introduction of social tariff under consideration.	• Cross-subsidy continues. There is also significant subsidy. • Social tariff may be an innovation; impacts are yet to be made clear.
Philippin	• Lifeline rates are offered at significant discounts. • Subsidy is exclusively consumption based; secondary residences of wealthy users also enjoy subsidy. Poorer families with bigger number of members fail to make the cut. • Universal charge is imposed on all electricity end-users to cover cross-subsidy removal mitigation fund.	• Universal charge can be implemented for cross-subsidy removal. • Lifeline discount solely on the basis of consumption is criticised.
U.K.	• Clearly defined Consumer Vulnerability Strategy with areas of activity bifurcated between the regulator and the government • With a focus on fuel poverty elimination, Warm Home Discount schemes are in place. • The regulator encourages introduction of tailored social tariff for vulnerable consumers. • Tariff innovations were encouraged – ranging from tariff structure with only fixed cost, as well as with only variable cost, to fit various energy needs.	• Well-articulated strategy to deal with vulnerable section (not restricted only to low-income consumers). Multi-prong approach adopted to deal with their specific needs. This is a valuable lesson for emerging economies. • Though innovative tariff seem to have been recently restricted, there are lessons for appropriate modification and adoption.

Key Learnings

Discussion / Conclusions

The two broad aspects of subsidy cover access of service (infrastructure or capital investment question) and affordability i.e. paying for the service, once it is available. India is handling well the first question reasonably well through the rural electrification scheme of DDUGJY. Although Chile offers some lessons on capital subsidy through a social NPV model with financially sustainable subsidy mechanism, the same is not elaborated further as India's rural electrification model is considered successful.

On the issue of sustainability of the revenue model i.e. electricity pricing, there are serious concerns. The principal stake-holders, apart from the investors and the Government, are a) the distribution utilities, b) the cross-subsidisers, the so-called richer industrial and commercial consumers who subsidise the c) cross-subsidised, i.e. the poorer segment of consumers. Balancing the interest of all these segments is a delicate process as on one hand, India has the highest poverty headcount in the world, on the other, there is a world-wide requirement of the productive sector to be made competitive. Moreover, the distribution utilities of India have a combined loss of Rs.3.8 trillion, which speaks of the overarching need of protecting this segment and ring-fencing them from populist policies.

Industrial tariff in India is checked against two consumption points of residential consumers (100 kWh and 300 kWh) for 25 utilities who cover 60% sales. The position is that industrial tariff is higher than residential tariff in all cases, whereas the internationally accepted position is that industrial tariff is less than residential tariff (Gilbert & Kahn, 1996). Commercial tariff is much higher than industrial tariff.

Table 4: Industrial Tariff vis-à-vis Residential Tariff in 2015-16

Sl.No.	Region	State	Licensee	Industrial vis-à-vis Residential 100 kWh monthly consumption (Residential = 100)	Industrial vis-à-vis Residential 300 kWh monthly consumption (Residential = 100)
1	Northern Region	Delhi	BRPL	189	201
2		Haryana	DHBVNL	182	136
3		Himachal Pradesh	HPSEBL	178	165
4		Punjab	PSPCL	142	115
5		Rajasthan	JVVNL	130	118
6		Uttar Pradesh	MVVNL	171	161
7		Uttarakhand	UPCL	166	139
8	Western Region	Chhattisgarh	CSPDCL	171	130
9		Gujarat	TPL- Ahmedabad	127	119
10			MGVCL	125	110
11		Madhya Pradesh	Central Discom	149	114
12		Maharashtra	RInfra	186	158
13			MSEDCL	181	123
14	Southern Region	Telangana	TSSPDCL	278	136
15		Andhra Pradesh	APSPDCL	330	148
16		Karnataka	BESCOM	174	123
17		Tamil Nadu	TANGEDCO	217	159
18	Eastern Region	Bihar	NBPDCL	167	149
19			SBPDCL	179	162
20		Jharkhand	JBVNL	216	219
21		Odisha	CESU	174	142
22		West Bengal	WBSEDCL	133	117
23			CESC	129	110
24	North-Eastern Region	Assam	APDCL	143	120
25		Tripura	TSECL	128	123

The above indicates that there is an overwhelming need of an interconnected strategy balancing the need of all segments. International experience suggests existence of social policy obligations, even in a competitive model. In India, this has possibly been carried to an extreme level. The following points emerge.

First, there is significant criticism of subsidy / cross-subsidy in Indian tariff structure. Pressure of poverty headcount compounds the problem. There is a need for recognising the problem as such, accepting that India has the largest number of poor in the world to be supplied with electricity and giving a coherent shape to the problem. The strategic path to be treaded can only be developed consequently. Otherwise, the entire issue is lost in the overwhelming figure of Rs.3.8 trillion loss of Indian power sector; no management decision can emerge from this amorphous state.

Second, unless the decision on choice between subsidy and cross-subsidy (or a mix of both) is taken at the national level, it is impractical to address the issue at State levels as it can create tremendous regional disparities. International experience suggests addressing this welfare issue by federal governments through clear policy instruments.

Third, following from the second, is the logical decision on whom to subsidise. There is a need for identification of the target segment for fulfilment of societal needs together with a uniform definition of the lifeline consumer. Linkage with monthly consumption alone may not be adequate, as exhibited by the Philippines experience, where secondary homes of rich households end up enjoying subsidy. A definition from a national perspective is advocated due to the varying definitions adopted by various States.

Fourth, monthly consumption level, presently used in terms of policy instruments, does not serve as a good proxy for monthly income. Due to consumption basis of lifeline definition, splitting of consumption is rampant, as people divide their requirement across plural meters to enjoy subsidised tariff viz. a middle-income family tries to get two / three separate connections / meters installed in various names, all enjoying subsidised tariff. Considerable subsidy leakage occurs

Table 5: Potential Solutions to Address Support Need for Lifeline Consumers from Global Experience

Potential solution could be through charging of a universal levy on all retail sales, which is an internationally accepted solution (Hunt & Shuttleworth, 1996).
This unavoidable levy / universal charge may require appropriate legislative intervention.
Universal charge model was successfully implemented in the Philippines (Forum of Regulators assisted by PricewaterhouseCoopers Private Limited, April 2015) with protection of ten years after removal of cross-subsidies available under a lifeline rate to low-income end-users (Cham, 2007).
Since considerable difference exists amongst the States in defining Lifeline customer category, legislative action seems a pre-requisite to bring in uniformity across India.
"Social tariff" for low income consumers may be envisaged (Haselip, Dyner, & Cherni, 2005).
In the Philippines, residential consumers of Meralco, the largest distribution utility, are given 100% Lifeline discount for consumption upto 20 kWh (discount gradually scaled down and is available upto 100 kWh monthly consumption) (Manila Electric Company).
Another option, of course, could be the State Governments picking up this incremental amount through direct subsidy (Davies, Wright, & Price, 2005).

through this route. An identification route for marking a low-income family, other than consumption as the sole marker, may eventually be developed to weed out unintended subsidy.

Fifth, is the choice on how to subsidise. It could be limited to the Philippines experience of universal charge, which is effectively cross-subsidy. There is always recourse to additional subsidy from the federal / regional governments. However, even for this measure, proper identification and delivery mechanisms are to be desired

Sixth, once a definition of vulnerable consumer segment is reached through general consensus between the union and the States (power being a subject in the 'concurrent list' of the Indian Constitution), a stricter regime of no-subsidy can be established for other consumers. If the present situation is allowed to continue, Indian power sector will keep on drifting with louder clamour for support on this popular and populist issue.

Seventh, schemes around the globe offers lessons on subsidy implementation. Chile's rural electrification scheme of weighing social and financial costs and competitive bidding on lowest subsidy requirement is one such scheme. Philippines universal charge is another scheme to address cross-subsidy removal. Similar lessons needs to be synthesized by developing economies to garner maximum benefits, particularly for a poor country like India.

Eighth, innovative tariff structures are available. Ranging from tariff with no fixed charge, to only fixed charge. Depending on specific requirement, innovations need to be encouraged by developing economies.

Going a step forward, it can also be stated that once the rationalisation takes place, many other new initiatives might fall in place with correct economic signals being given. Presently, many innovations fail to take off as they are not economically viable at subsidised tariffs. On a futuristic note, one can even suggest that time-of-the-day tariff, interruptible tariff, DSM measures as well as active promotion of roof-top solar installations, will all find takers. These will then be weighed by the customers against their real cost-to-serve tariff and will encourage them to move towards economically viable innovative measures.

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Mutual Fund Investment and Indian Stock Market-Is there influence dynamism?

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Abstract

Asset management companies are one of the domestic institutional investor who play a major role in Indian capital market. Mutual funds and Foreign Institutional Investors (FIIs) has proven their influence on Indian stock market. This research paper makes an attempt to identify the impact of mutual fund investment in Indian equity market. The data of past six years (2010-2015) was put to test to bring out a relevant result. Instead of net investment, the study has taken gross purchase and gross sales made by mutual fund on daily basis consisting of 1440 observations in equity segment alone. The market barometers – SENSEX, NIFTY and MIDCAP – are considered for analyzing with basic econometric tool.

Keywords: *Mutual fund, stock market, Net investment, BSE and NSE*

1. Introduction

Domestic institutional investors have domicile in their domestic territory and undertake investment in securities and other financial assets in their country. Institutional investment can be divided into two categories. One is Domestic institutional investors (DII) and another one is Foreign Institutional investors. Domestic Institutional investors such as mutual fund, pension fund, banks, non - banking financial companies, asset management companies etc. Mutual fund industry is one of the growing industries in India since 1963. After post liberalization 1991, various financial institution and banks started the mutual fund companies. Mutual funds are regulated by securities and exchange board of India (SEBI). The main role of mutual fund is collection of savings from the small investors and investing in different types of securities such as equity, debt, commodities etc. The money collected are managed by the portfolio managers and they take the task of diversify the risk in the mutual fund. There are 41 mutual fund companies with asset under management of 1,339,484 Cr. in the year December 2015 (Source: Moneycontrol.com). The number of schemes such as debt, income, balanced, ETF, overseas etc. increased under mutual fund during this period.

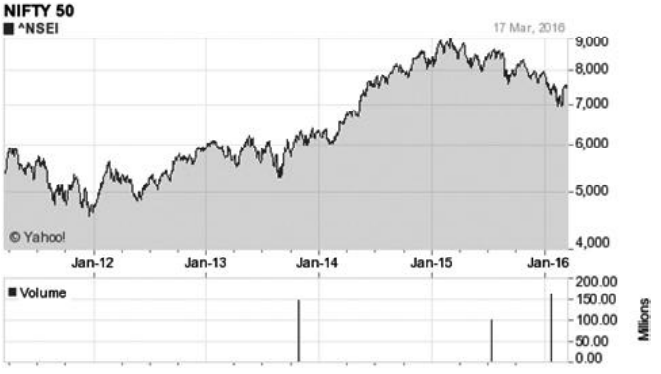
The following figure shows that movement of SENSEX over a period of time from 2007 to 2015

Figure 1: Movement of SENSEX from 2007 to 2015

Source: BSE website

The following figure shows that movement of NIFTY over a period of time from 2012 to 2015.

Figure 2: Movement of Nifty from 2012 to 2015



Source: Yahoo finance

Table 1: MF Investment in Indian Capital Market (Rs in Cr.)

Year	Gross Purchase	Gross Sales	Net Investment
2010	160,086.70	187,846.90	-27,761.00
2011	130,992.40	124,975.00	6,017.40
2012	118,461.20	139,407.90	-20,954.40
2013	112,585.00	133,937.60	-21,352.90
2014	198,517.90	174,519.50	23,558.10
2015	271,175.20	200,175.60	70,999.60

Source:http://www.moneycontrol.com/india/stockmarket/foreigninstitutionalinvestors/03/50/activity/MF (Money control.com)

The above table depicts that, the gross purchase is higher than the gross sales during the year 2011 followed by 2014 and 2015. It similarly, it is observed that, the gross sale is higher than the gross purchase during the year 2010 followed by 2012 and 2013**.** This shows the continuous participation of mutual funds in stock market for balancing their NAV which influences the demand and supply of schemes sold to investors.

2. Need for the study

Mutual funds are one of the factors that have the potential to influence the movement in Indian stock market. Measuring the exact level of influence of their investment is difficult, but it throws an idea of their power of existence, which moves the stock market. In India, institutional investors like Domestic Institutional Investors (DII) and Foreign Institutional Investors (FII) co-exist. There are large number of research papers dedicated to FII investments and their impact on stock market of different countries particularly Emerging Nations. However, very few literatures are available for domestic mutual fund investors and their impact level. This prompted the present research to focus on Indian mutual fund investment and their influence behavior.

3. Scope of the study

The present study outcomes are limited to the period of the study and this paper is only concentrated on mutual fund investment in terms of equity segment. The study does not forecast the future movement of the mutual fund investment or the fluctuation of the stock market. The study would be helpful to know the movement of mutual fund investment in Indian equity component.

4. Review of Literature

A survey on supporting literature found the following relevant research articles.

Aras et al. (2003) investigated the causality relationship between the institutional investors and stock market development by using panel data of 23 OECD countries over a period of 18 years spanning from 1982 to 2000. They found significant relationship (0.715) between the institutional investors and stock market development and there is bidirectional causality between the institutional investors and stock market development.Similarly, a study conducted by Thiripalraju et al. (2011) examined the case study of institutional investments exclusively on FIIs and Mutual funds and stock returns in India during 2000 -2009. They found bidirectional causality between the FII and market return and vice versa. Likewise, there is unidirectional

causality between the market return and mutual funds. On the other hand, Hossain et al (2013) by exploring the dynamic relationship between the stock market and mutual fund during 2008 and 2010. Variables such as general index return, DSE general index turnover, mutual funds' return and mutual funds' turnover, of which it's been observed that, the DSE general index and mutual funds are co integrated by using Johansen test. There was bi directional causality between the DSE general index turnover and DSE general index return and vice versa.

Correlation results were obtained by Agarwal (2013) on daily data spanning between 2000 and 2013. They found 79.66 per cent relationship between the FII and SENSEX and similarly, 77.85 per cent correlation between the FII and Mutual fund. He concluded that, FII net investments are positively correlated than the mutual fund. Ananda et al. (2013) explored whether FII activity has a significant impact on the flow of Indian market and causal relationship. They found that, 15.2% variation in BSE return is explained by changes in the FII and there is significant positive correlation between the FII and BSE return. The author used regression and correlation analysis to investigate the impact of FII and domestic institutional investors. The paper also probed the relationship of nifty with FII and DII over a period of nine years spanning from 2006 to 2014. They found that, there is (-0.007) negative correlation between the nifty and mutual fund inflow. Nifty is not influenced by the FII and DII during this study period.

A study conducted by Hemanathan (2011) examined the position of mutual fund on Indian stock market. He found that, there is 11.9 per cent relationship between the Mutual fund and nifty and has 12 per cent relationship with Sensex. The institutional investors both domestic as well as foreign investors have significant influence on the Indian equity market after 2008 and there is no impact of domestic debt market on the Indian equity market returns (Mukherjee et al 2016). On the other hand, Syamala et al. (2014) explored the relationship between the institutional ownership and stock liquidity over a period of 12 years across 2001 to 2012. They found that, firms with higher institutional ownership have stock liquidity. FII and bank ownership have negative impact on lower liquidity.

Scott (2014) came with the evidence that the increased institutional ownership leads to increase in research and development investments especially in firms with higher stock liquidity. He concluded that, the Institutional investors should encourage the management to invest in R& D for long term benefits by using generalized method of moments (GMM) during 1990 -2005. A study conducted by Goel et al. (2014) investigated the outline of mutual fund industry in India during 2010 to 2014. They found that, the large number of mutual fund schemes has increased during this period and the debt scheme showed highest growth rate among the schemes. They concluded mutual fund investors invest in the debt securities of the Indian stock market.

Tao Shu (2012) also found the evidence of institutional investor contribution can increase stock price efficiency and therefore drastically decline stock market variance associated with price in efficiencies. One of the studies conducted in the context of China (Don Bredin et al. 2014) had examined the foreign institutional investors prefers to invest in Chinese ownership structure of listed firms. Similarly, Roger et al. (2012) came with the evidence that the average return of all the 42 Chinese mutual fund was 8.45 per cent with the standard deviation of 25.62 per cent.They conclude that, there is no evidence to depict any long term persistence existence in Chinese mutual fund during the period 2002 to 2009. Athanasius et al. (2005) also found the evidence of all the Greece equity mutual funds show positive value

in the first three years after which a fall in the stock market impacted mutual funds with negative return in 2000.

Based on the above discussion, a wide literature is available on causality between asset management companies and Indian stock markets, but the majority of the existing literatureis explored on net investment of mutual fund in Indian equity market. Therefore, there is a need to further examine the impact of gross purchase and gross sales of mutual funds on Indian equity market.

5. Objectives

1. **To find out the relationship between the gross investment and market index of Indian equity market.**
2. **To identify the impact of gross purchase of mutual fund on Indian equity market.**
3. **To analyze the impact of gross sales of mutual fund on Indian equity market**

6. Hypothesis

Hypothesis-1

H0- There is no impact of gross purchase of mutual fund on Indian equity market.

H1- There is an impact of gross purchase of mutual fund on Indian equity market.

Hypothesis -2

H0- There is no impact of gross sales of mutual fund on Indian stock market.

H1- There is an impact of gross sales of mutual fund on Indian stock market.

7. Research Methodology

The study is descriptive and analytical in nature. To accomplish the objective, the study uses daily time series data on gross purchase and gross sales of mutual fund equity component. The sample consists of 1440 daily observation for a period of six years from 1 Jan 2010 to 31 December 2015. SENSEX, NIFTY and MIDCAP closing price was taken as market proxy. There are five variables used in this study to identify the impact of mutual fund investment on stock market. All the values are converted into natural logarithm for making further analysis. The data was analyzed by using basic econometric tools such as correlation analysis and ordinary least square. To identify the relationship between the mutual fund and selected benchmark indices was analyzed with the help of correlation and find out any impact of mutual fund on Indian stock market by using ordinary least square method.

Table -2: Descriptive Statistics of gross purchase and gross sales of mutual fund investment and selected market indices

Sample period	Post crisis period (2010-2015)				
Variables	GPLN	GSLN	SENLN	NIFLN	MIDLN
Mean	6.369882	6.380471	9.929457	8.728243	9.082375
Median	6.359228	6.416405	9.875347	8.677814	8.984575
Std. Dev.	0.561259	0.528508	0.183759	0.184526	0.225874
Skewness	-1.34673	-4.197918	0.596877	0.618455	0.796814
Kurtosis	13.20499	43.46272	1.970554	2.008376	2.198531
Jarque-Bera	6683.798	102463.3	149.0885	150.7959	190.9203
Probablity	0.000000	0.000000	0.000000	0.000000	0.000000
Observations	1440	1440	1440	1440	1440

The above table depicts that, among the five variables, the mean score (M=9.929; SD=0.183) of SENSEX is observed to be centered and deviation less than the mean score. Similarly all the other four variables showed the same type of results, NIFTY *(M=8.728; SD = 0.1845*), GPLN *(M=6.369; SD=0.5612)*, GSLN *(M=6.3804; SD=0.528)* and MIDLN *(M=9.0823; SD=0.225)* respectively, showed an acceptable mean score with less deviation. The GPLN and GSLN had higher kurtosis that reflected flatter distribution as compared to normal distribution. The GPLN and GSLN were negatively skewed and other variables such as SENSEX, Nifty and Midcap were positively skewed in most of the years. As per the Jarque – Bera statistics, all the five variables found to be significantly non normal.

Correlation Analysis

To find there is any relationship between the gross purchase and gross sales of mutual fund investment with selected benchmark indices with the help of this techniques

Table -3: Correlation between the Gross purchase and Gross sales with selected market indices

Variables	GPLN	GSLN	SENLN	NIFLN	MIDLN
GPLN	-	0.68455	0.49098	0.49193	0.551
GSLN	0.68455	-	0.25983	0.26067	0.29722
SENLN	0.49098	0.25983	-	0.99916	0.93274
NIFLN	0.49193	0.26067	0.99916	-	0.94012
MIDLN	0.551	0.29722	0.93274	0.94012	-

From the correlation analysis it is found that, there is significant *(r = .49, p < .01)* 0.49 relationship between gross purchase and SENSEX followed by Nifty *(r = .49, p < .01)* and Midcap *(r = .55, p < .01)*. Similarly, it is observed that, there is significant 0.25 relationship between gross sales and SENSEX *(r = .26, p < .01)* followed by Nifty *(r = .26, p<.01)* and mid cap *(r = .30, p <.01)*.

Ordinary Least Square Method

In this section, we used OLS to bring out the impact of mutual fund companies' purchase and sales of stocks on Indian stock market; in addition an attempt also was made to study the reverse of the same.

Model 1:	
	SENLN = c + β1 (GPLN) + β2 (GSLN) + u…… Equation (1)
	NIFLN = c + β1 (GPLN) + β2 (GSLN) + u…….. Equation (2)
	MIDLN = c + β1 (GPLN) + β2 (GSLN) + u …… Equation (3)
Model 2:	
	GPLN = c + β1 (SENLN) + β2 (NIFLN) + β3 (MIDLN) + u ……Equation (4)
	GSLN = c + β1 (SENLN) + β2 (NIFLN) + β3 (MIDLN) + u ……Equation (5)
Model 3:	
	GPLN = c + β1 (SENLN) + β2 (NIFLN) + u ……Equation (6)
	GSLN = c + β1 (SENLN) + β2 (NIFLN) + u ……Equation (7)
Model 4:	
	GPLN = c + β1 (MIDLN) + u ……Equation (8)
	GSLN = c + β1 (MIDLN) + u ……Equation (9)

Table -4: Impact of gross purchase and gross sales of MFs in equity segment on Indian Equity Market

	DV	IV	Beta	P value	DW Test	F Stat	R-Squared
Model 1	Sensex	Gross purchase	0.193	0.000	0.315	242.07	0.252
		Gross sales	-0.05	0.000			
	Nifty	Gross purchase	0.194	0.000	0.317	243.2	0.253
		Gross sales	-0.05	0.000			
	Mid Cap	Gross purchase	0.263	0.000	0.437	331.37	0.316
		Gross sales	-0.064	0.000			
Model 2	Gross Purchase	Sensex	10.46	0.000	1.497	230.27	0.325
		Nifty	-11.65	0.000			
		Mid Cap	2.376	0.000			
	Gross sales	Sensex	5.932	0.004	1.587	48.838	0.093
		Nifty	-6.648	0.002			
		Mid Cap	1.31	0.000			
Model 3	Gross Purchase	Sensex	-0.98	0.567	1.321	229.6	0.242
		Nifty	2.471	0.147			
	Gross sales	Sensex	-0.37	0.841	1.539	50.88	0.066
		Nifty	1.13	0.539			
Model 4	Gross Purchase	Mid Cap	1.369	0.000	1.444	626.89	0.304
	Gross sales	Mid Cap	0.705	0.000	1.572	133.46	0.085

Estimated regression output is presented in Table4 as four different models. In model 1, the first equation with two predictors produced R^2=.252, $F(2,1440) = 242.06$, $p<.05$. It was found Gross Purchase ($\hat{a}$=.19, $p<.05$) and Gross Sales ($\hat{a}$= -.05, $p<.05$) significantly predicted movements in SENSEX indicating purchases done by mutual funds in stock market made the market index to raise and a sale by mutual funds significantly reduced the index. The second equation with the same predictors produced a very similar output (R^2=.252, $F(2,1440) = 243.20$, $p<.05$) as observed in equation one. Gross purchase ($\hat{a}$=.19, $p<.05$) and Gross sales ($\hat{a}$=.19, $p<.05$) significantly predicted NIFTY. Also, purchase by mutual funds made the NIFTY to increase and a sale made the index to fall. The final equation in this model, took MID CAP as the dependent variable with two predictors. They were able to produce R^2=.316, $F(2,1440) = 331.36$, $p<.05$. Purchases done by mutual fund significantly ($\hat{a}$=.26, $p<.05$) improved the movements in MIDCAP as also their sale ($\hat{a}$= -.06, $p<.05$) which brought down the index. This model showed that more than primary indices, mutual funds exerted more influence on MIDCAP.

The second model was constructed with two equations each carrying three predictors. The first equation extracted R^2=.325, $F(3,1440) = 230.27$, $p<.05$ and with $\hat{a}$=10.46, $p<.05$, SENSEX movements significantly influenced the purchases done by mutual funds. Similarly, MIDCAP ($\hat{a}$= 2.38, $p<.05$) positively and significantly impacted the purchase made by them. In the case of NIFTY ($\hat{a}$= -11.65, $p<.05$) significantly reduced the volume of purchase for every increase in index. The results confirms that portfolio reconstruction (decision to

purchase and sell) planned by mutual funds are influenced by volatility in indices.

One similarity that is observed in first two models are the explanatory power represented by R^2 is less than the Durbin-Watson statistic. This shows that the constructed equation does not suffer from spurious values and is fit for further interpretation. However, it does disclose a DW < 2, which is an indication of spurious regression model. As a rule of thumb, the present paper continued to interpret the results as R^2<DW.

The third model was constructed with two equations by removing MIDCAP as predictor. The results showed insignificant values not fit for interpretation. The first equation produced $R^2=.242$, $F(2,1440) = 229.60$, $p<.05$ and an insignificant ($\hat{a}=-.98$, $p = n.s$; $\hat{a} = 2.47$, $p = n.s$) predictors. In the second equation, the output showed $R^2=.067$, $F(2,1440) = 50.88$, $p<.05$ and an insignificant ($\hat{a}= -.37$, $p = n.s$; $\hat{a} = 1.13$, $p = n.s$). A high F value and insignificant co-efficient values exposes the weakness in the model fit.

Nevertheless, in model four, the two equations with one predictor turned out significant. This model was constructed by removing SENSEX and NIFTY and retained MIDCAP. A $R^2=.303$, $F(1,1440) = 626.89$ for the first equation indicated a healthy fit and the predictor ($\hat{a}= 1.36$, $p<.05$) significantly increased the volume of purchase made by mutual funds. Similarly, the second equation with $\hat{a} = .70$, $p<.05$ increased the sale for every upward movements in MIDCAP.

By the inferences made, this paper rejects null hypothesis. The results from the equations show that mutual funds in India are taking the stocks listed in MIDCAP for their portfolio construction more seriously than stocks in SENSEX and NIFTY. This infers that schemes set on mid-capitalized stock are more in numbers than large-cap stocks.

9. Conclusion

After the post crisis period, there has been tremendous change in mutual fund industry in India. The study discloses the relationship that exists between purchase/sales of mutual funds and the market indices. The study indicates that mutual funds operating in India do have the power to influence the changes that is observed in market indices. While the investors buy and decide to go for redemption, mutual fund has the task to enter and exit the Indian stock market more frequently, which in fact has an impact on the market.

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A Study on diverse parameters of Organizational Culture & its impact on employees Performance

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Abstract

Purpose: This paper focuses on diverse parameters of organizational culture so as to determine and understand the culture of an organization effectively. The parameters are the key to recognize the employee's mindset towards the organization and the various key factors that are driving the culture of the organization. Moreover it also provides insights on the impact of various parameters on the employee's performance.

Design/methodology/approach: A structured questionnaire is used for the purpose of research. It was divided into the various parameters of organizational culture so as to analyze its impact on the employee's performance and satisfaction

Findings: The paper reflects that the parameters of organizational culture have a major impact on the performance of employees**.** The organizational culture is a very important aspect of a successful organization. It affects the organization's productivity, efficiency and performance. A strong culture helps in retaining employees and it strengthens the company's brand.

Keywords: Organizational culture, Parameters, Leadership, PMS, Working conditions.

1. Introduction

Organizational culture works a lot like this. Every company has its own unique personality just like people do. Unique personality of an organization is referred to as organizational culture. In groups of people who work together organizational culture is an invisible but a powerful force that influences the behavior of the members of that group. So, organizational culture is a system of shared assumptions, values and beliefs which govern how people behave in organizations. These shared values have a strong influence on the people in the organization and dictate how they dress, act and perform their jobs.

"The values and behaviors that contribute to the unique social and psychological environment of an organization".

Organizational culture includes an organization's expectations, experiences, philosophy, and values that hold it together, and is expressed in its self-image, inner workings, interactions with the outside world, and future expectations. It is based on shared attitudes, beliefs, customs, and written and unwritten rules that have been developed over time and are considered valid. Also known as corporate culture it is shown in:

- the ways the organization conducts its business, treats its employees, customers, and the wider community
- the extent to which freedom is allowed in decision making, developing new ideas, and personal expression,

- how power and information flow through its hierarchy, and
- how committed employees are towards collective objectives.

It affects the organization's productivity and performance, and provides guidelines on customer care and service, product quality and safety, attendance and punctuality, and concern for the environment.

The following parameters will help to determine and understand the culture of an organization effectively. These parameters are the key to recognize the employee's mindset towards the organization and the various key factors that are driving the culture of the organization.

- Employee Engagement
- Leadership
- PMS & Goals
- Learning & Development
- Rewards & working conditions

Literature Review

Deal & Kennedy (1982) have defined culture as simply as "A system of informal rules that spells out how people behave most of the time". Barley (1983) suggests that a common thread runs through these definitions, which renders culture as "something" shared by organization members. Uttal (1983) defined it as a system of shared values (what is important) and beliefs (how things work) that interact with a company's people, organizational structures, and control systems to produce behavioral norms. Kilmann (1985) defined organization culture as the shared philosophies, ideologies, values, assumptions, beliefs, expectations, attitudes and norms that knit an organization together.

Schein (1985) defines culture as something an organization has as learned responses to the organization's problems of external adaptation and internal integration. Louis (1985) extends Schein's perspective stating that organizational culture is an interpretive scheme or way of perceiving, thinking and feeling in relation to an organization's issues, problems, etc.

According to Charles Handy (1993) model, there are four types of culture which the organizations follow:

- **Power**: There are some organizations where the power remains in the hands of only few people and only they are authorized to take decisions. They are the ones who enjoy special privileges at the workplace. They are the most important people at the workplace and are the major decision makers. These individuals further delegate responsibilities to the other employees. In such a culture the subordinates have no option but to strictly follow their superior's instructions. The employees do not have the liberty to express their views or share their ideas on an open forum and have to follow what their superior says. The managers in such a type of culture sometimes can be partial to someone or the other leading to major unrest among others.
- **Task Culture:** Organizations where teams are formed to achieve the targets or solve critical problems follow the task culture. In such organizations individuals with common interests and specializations come together to form a team. There are generally four to five members in each team. In such a culture every team member has to contribute equally and accomplish tasks in the most innovative way.
- **Person Culture:** There are certain organizations where the employees feel that they are more important than their organization. Such organizations follow a

culture known as person culture. In a person culture, individuals are more concerned about their own self rather than the organization. The organization in such a culture takes a back seat and eventually suffers. Employees just come to the office for the sake of money and never get attached to it. They are seldom loyal towards the management and never decide in favor of the organization. One should always remember that organization comes first and everything else later.

- **Role culture:** Role culture is a culture where every employee is delegated roles and responsibilities according to his specialization, educational qualification and interest to extract the best out of him. In such a culture employees decide what best they can do and willingly accept the challenge. Every individual is accountable for something or the other and has to take ownership of the work assigned to him. Power comes with responsibility in such a work culture.

Deal (1986) defined it as the human invention that creates solidarity and meaning and inspired commitment and productivity. Deshpande and Webster (1989) define organizational culture as the pattern of shared values and beliefs that help individuals understand organizational functioning and thus provide them with norms for behavior in the organization.

In a sample of United States firms O'Reilly (1991) identified the following seven dimensions of organizational culture using an instrument they developed, the Organizational Culture Profile (OCP): innovative, stable, respecting of people, outcome oriented, detail oriented, team oriented, and aggressive. These dimensions are quite similar to Hofstede's dimensions.

A widely accepted definition of organizational culture was offered by Schein (1990) as a pattern of basic assumptions – invented, discovered, or developed by a given group as it learns to cope with its problem of external adaptation and internal integration – that has worked well enough to be considered valid and, therefore, to be taught to new members as the correct way to perceive, think and feel in relation to those problems.

Furthermore, culture could also be viewed as consisting of three levels with the most visible level being behavior and artifacts. These aspects of culture are easiest to observe in an organization and contains member behavior patterns and aspects of culture more transparent than most (e.g., work environment layout, technology, dress codes, building decorum). Further**,** Deshpande, Farley and Webster (1993) suggest that organizational culture reveals "why things happen the way they do". Those who hold the interpretive view of culture believe that norms, values, rituals, structure, and ideologies are manifestations of culture.

Quinn and Cameron (1999) suggest organizational culture refers to the taken-for-granted values the underlying assumptions, expectations, collective memories, and definitions present in the organization. It represents how things are around here. It reflects the prevailing ideology that people carry inside their heads. It conveys a sense of identity and provides unspoken guidelines for how to get along and enhances the stability of the social system to which they belong.

Edgar Schein (2010), divided organizational culture into three different levels: Artifacts and symbols, Exposed Values & Basic underlying assumptions. Also known as the onion model, in practice, the three levels of the organizational culture model are sometimes represented as an onion model as it is based on different layers. The outer layer is fairly easy to adapt and easy to change. The deeper the layer, the harder it

becomes to adjust it. Deeply embedded in the core of the onion we find the assumptions. Around the core we find the values. The artifacts and symbols can be found in the outer layers of the onion and these can be changed more easily. Between this layer and the layer in which the values are embedded, there may be another layer in which we find the so-called 'heroes'; people who play or have played an important role in the organization and who are admired. The core of the onion is made up of assumptions. These are about 'how the world works' according to the all the people who belong to the organization and stem from experiences and perception. These have partly become unconscious assumptions and they are considered to be self-evident therefore they need not be discussed.

Methodology

Objectives

- To study the employees opinion towards attitude physical and social structure of the organization.
- To assess various attitudes of the employees towards their welfare measures and towards the climate of the organization.
- To study the different parameters of organizational culture like employee engagement, leadership, performance management system and goals, learning and development, rewards and work conditions.

Respondents

To study various parameters of organizational culture and its impact on performance, the research was conducted on the employees of ABEX department at Adani Enterprises Ltd. A sample 40 respondents was taken for the research. The samples were selected using the Random Sampling method.

Analysis

$H0_1$: Employees in the organization are not flexible and adaptable to changes.

One-Sample Statistics

	N	Mean	Std. Deviation	Std. Error Mean
employees in this organization are flexible and adaptable to changes	40	3.45	0.504	0.08

One-Sample Test

	Test Value = 3					
	t	df	Sig. (2-tailed)	Mean Difference	95% Confidence Interval of the Difference	
					Lower	Upper
employees in this organization are flexible and adaptable to changes	43.308	39	0	3.45	3.29	3.61

From the above table, it can be noted that significant value i.e. (.000) which is less than the set significant value (0.005) so here we reject the null hypothesis and accept the alternate hypothesis which states that the employees in this organization are flexible and adaptable to changes.

This proves that the company has a very flexible and adaptable culture which is very good because if an organization has such type of flexibility and

adaptability the organization can go a long way achieving success. The organization is given any such different kind of projects it can easily achieve the same because employees readily adopt changes.

$H0_2$: Employees do not work collaboratively as a team.

One-Sample Statistics					
	N	Mean	Std.	Std. Error Mean	
employees believe in working collaboratively as a team	40	3.6	0.496	0.078	
One-Sample Test					
	Test Value = 3				
	t	df	Sig. (2-tailed)	Mean Difference	95% Confidence Interval of the Difference
					Lower / Upper
employees believe in working collaboratively as a team	45.891	39	0	3.6	3.44 / 3.76

From the analysis, the significant value i.e. (.000) which is less than the set significant value (0.005) so here we reject the null hypothesis and accept the alternate hypothesis which states that the employees believe in working collaboratively as a team.

This proves that the employees share their ideas, knowledge and skills and work collaboratively. This shows that the organization has an open and a friendly culture where in the employees take up task and try completing it by taking ideas from their colleagues. When there is collaboration the goals will be achieved in a good manner because it has been achieved through the ideas and suggestions of groups.

$H0_3$: Managers do not encourage new ideas given by the employees

One-Sample Statistics					
	N	Mean	Std.	Std. Error Mean	
the manager willingly encourage new ideas given by the employees	40	3.53	0.506	0.08	
One-Sample Test					
	Test Value = 3				
	t	df	Sig. (2-tailed)	Mean Difference	95% Confidence Interval of the Difference
					Lower / Upper
the manager willingly encourage new ideas given by the employees	44.082	39	0	3.525	3.36 / 3.69

From one sample t test, significant value i.e. (.000) which is less than the set significant value (0.005) so here we reject the null hypothesis and accept the alternate hypothesis which states that the manager willingly encourages new ideas given by the employees.

This proves that the mangers though have their own beliefs but they readily accept and encourage

new ideas in the organization. This shows that the organization has a motivating culture and the leaders/managers encourage the employees to come out with new ideas.

$H0_4$- Employees do not participate actively in defining goals

One-Sample Statistics				
	N	Mean	Std. Deviation	Std. Error Mean
there is an active participation of employees in defining goals	40	3.13	0.723	0.114

One-Sample Test						
	Test Value = 3					
	t	df	Sig. (2-tailed)	Mean Difference	95% Confidence Interval of the Difference	
					Lower	Upper
there is an active participation of employees in defining goals	27.344	39	0	3.125	2.89	3.36

In the above table, the significant value i.e. (.000) which is less than the set significant value (0.005) so here we reject the null hypothesis and accept the alternate hypothesis which states that there is an active participation of employees in defining goals.

This proves that the mangers value their employees and understand the importance of the employees knowing what the organization intends to do, or what its upcoming projects are because if the employees are aware about what is happening in the organization they will thrive to work towards the same. They will have an idea that will they go about achieving the same.

$H0_5$- PMS system is not transparent and effective.

One-Sample Statistics				
	N	Mean	Std. Deviation	Std. Error Mean
the pms system is transparent and effective	40	2.88	0.992	0.157

One-Sample Test						
	Test Value = 3					
	t	df	Sig. (2-tailed)	Mean Difference	95% Confidence Interval of the Difference	
					Lower	Upper
the pms system is transparent and effective	18.331	39	0	2.875	2.56	3.19

From the analysis of one sample t test, significant value i.e. (.000) which is less than the set significant value (0.005) so here we reject the null hypothesis and accept the alternate hypothesis which states that the PMS system is transparent and effective.

This proves that the organization is very clear and crisp in providing the ratings to its employees. The

employees are rated as per their performance. There is no biasness in the organization which shows that the organization has positive culture.

$H0_6$-Learning programs do not help to develop personal and organizational efficiency.

One-Sample Statistics				
	N	Mean	Std. Deviation	Std. Error Mean
the learning programs have continuously helped the employees to develop their personal as well as organizational efficiencies	40	3.43	0.594	0.094

One-Sample Test						
	Test Value = 3					
	t	df	Sig. (2-tailed)	Mean Difference	95% Confidence Interval of the Difference	
					Lower	Upper
the learning programs have continuously helped the employees to develop their personal as well as organizational efficiencies	36.448	39	0	3.425	3.23	3.62

From the above table, the significant value i.e. (.000) which is less than the set significant value (0.005) so here we reject the null hypothesis and accept the alternate hypothesis which states that the learning programs have continuously helped the employees to develop their personal as well as organizational efficiencies.

This shows that the organization has a learning culture. There are learning and development programs continuously that help the employee to grow as an individual and develop the efficiencies which help the employee to have organization efficiencies.

$H0_7$- The working conditions are not flexible and favorable.

One-Sample Statistics				
	N	Mean	Std.	Std. Error Mean
the working conditions are flexible and favorable	40	3.25	0.776	0.123

One-Sample Test						
	Test Value = 3					
	t	df	Sig. (2-tailed)	Mean Difference	95% Confidence Interval of the Difference	
					Lower	Upper
the working conditions are flexible and favorable	26.48	39	0	3.25	3	3.5

Here when we look at significant value i.e. (.000) which is less than the set significant value (0.005) so here we reject the null hypothesis and accept the alternate hypothesis which states that the working conditions are flexible and favorable.

This proves that the employees are satisfied with the working conditions in the organization. This motivates the employee to stay in the organization and work. The employees always want a flexible and favorable environment. This motivates the employee to work harder.

$H0_8$- The culture and climate of the organization is not so positive and supportive.

One-Sample Statistics				
	N	Mean	Std.	Std. Error Mean
the culture and the climate of the organization is positive and supportive	40	3.45	0.552	0.087

One-Sample Test						
	Test Value = 3					
	t	df	Sig. (2-tailed)	Mean Difference	95% Confidence Interval of the Difference	
					Lower	Upper
the culture and the climate of the organization is positive and supportive	39.501	39	0	3.45	3.27	3.63

From the above analysis the significant value i.e. (.000) which is less than the set significant value (0.005) so here we reject the null hypothesis and accept the alternate hypothesis which states that the culture and the climate of the organization is positive and supportive.

This shows that the employees are quite satisfied with culture and climate of the organization. This again creates motivation in the employees to work harder. When the organization is positive and supportive the employees are happy to work in the organization and will continue working for a longer time.

$H0_9$- Work relationships are not mature and apolitical.

One-Sample Statistics				
	N	Mean	Std.	Std. Error Mean
the work relationships are mature and apolitical	40	3.2	0.758	0.12

One-Sample Test						
	Test Value = 3					
	t	df	Sig. (2-tailed)	Mean Difference	95% Confidence Interval of the Difference	
					Lower	Upper
the work relationships are mature and apolitical	26.705	39	0	3.2	2.96	3.44

Here when we look at significant value i.e. (.000) which is less than the set significant value (0.005) so here we reject the null hypothesis and accept the alternate hypothesis which states that the work relationships are mature and apolitical.

This proves that the employees in the organization share a mature relationship and there is no type of work politics that occurs in the organization.

Major Findings

Respondents Profile

1. 92.5% (N=37) are males
2. 37.5% (N=15) are supervisors
3. 65% (N=26) are post graduates
4. 77.5% (N=33) belong to the age group of 25-35

Employee Engagement

5. 55% (N=22) agree that employees in this organization are flexible and adaptable to changes.
6. 52.5% (N=21) strongly agree that employees strictly adhere to the code of conduct mentioned in the policy.
7. 67.5% (N=27) strongly agree that employees believe in completing the assigned work on time.
8. 50% (N=20) strongly agree that there is transparent communication amongst the boss and the subordinates in the organization.
9. 60% (N=24) agree that employees what is expected out of them and work accordingly.
10. 60% (N=24) strongly agree that employees believe in working collaboratively as a team.
11. 57.5% (N=23) agree that employees share their views and information in meetings.

The employees have mutual understanding among themselves and work accordingly as a team. Again this makes an organization a good place to work. Because in whole lot of organization there is politics which goes on which in turn compels the employee to leave the organization. So this organization has a positive and motivating culture.

12. 57.5% (N=23) strongly agree that birthday of an employee is celebrated as a get together.

Leadership

13. There is mixed opinion about the leaders having a clear vision of the organization that guides them. 45% (N=18) strongly agree and 45% (N=18) agree to the statement.
14. 47.5% (N=19) agree that the managers guide the employees in order to meet the organizational as well as individual needs.
15. 72.5% (N=29) agree that the decisions are taken by the superiors and the subordinates are expected to follow.
16. 55% (N=22) agree that the managers ask for suggestions from their subordinates and consider them.
17. 60% (N=24) agree that the manager never differentiates among his team members based on his virtues.
18. 52.5% (N=21) strongly agree the manager willingly encourages new ideas given by the employees.
19. 70% (N=28) agree that the manager stands by his own belief but is acceptable to new ideas as well.
20. 45% (N=18) agree that the manger admits to mistake and takes corrective action for the same.

21. 50% (N=20) agree that the managers constantly encourages feedback session for employees.

Performance Management System and Goals

22. 65% (N=26) agree that the organization and the employees have clearly defined goals and mission.
23. 62.5% (N=25) agree that there is an active participation of employees in defining goals.
24. 47.5% (N=19) agree that there is cross collaboration between various groups to attain organizational goals.
25. 40% (N=16) agree that the PMS system is transparent and effective.
26. 50% (N=20) agree that the manager is helpful in defining KRA's/KPI's and guide them in achieving the same.
27. 57.5% (N=23) agree that the managers and superiors were objective enough in giving performance ratings.
28. 67.5% (N=27) agree that the feedback provided at the end of the performance system is performance and development oriented.

Learning and Development

29. There is a mixed opinion regarding the learning programs which have continuously helped the employees to develop their personal as well as organizational efficiencies. 47.50% (N=19) strongly agree and 47.50% (N=19) agree to it.
30. 60% (N=24) agree that the learning programs have helped to bridge the gap between the existing and the required skills, knowledge and attitude.
31. 55% (N=22) agree that the learning programs have constantly acted as a growth medium.

Rewards and Working Conditions

32. There is a mixed opinion about how the employees are measured and rewarded according to how well their goals are achieved as 45% (N=18) strongly agree and 45% (N=18) agree to it.
33. 50% (N=20) agree that the reward system is fair and effective.
34. 50% (N=20) agree that the working conditions are flexible and favorable.
35. 52.5% (N=21) agree that the employees see endless opportunities for improvement.
36. 50% (N=20) agree that the employees in this organization are valued for their work.
37. 50% (N=20) agree that the culture and the climate of the organization is positive and supportive.
38. 55% (N=22) agree that the work relationships are mature and impolitic.

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Political Branding: An Alluring Proposition

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Abstract

The Indian political system is home to a host of political parties (as on July24, 2015; there were 1866 registered ones, source TOI report based on ECI data, Aug 9, 2015). All these parties are known to be extremely competitive in their own regard. They could be further divided into national, state-level and unrecognized parties. In the past few years, the concept of branding has found much relevance in the field of politics. The rise of Brand Modi as well as regional political brands has given a new dimension to the Indian polity in the form of the branded politician. This research paper delves into the advent of this significant phenomenon in the Indian context which is already pretty popular in the western democracies. The Indian political system got a taste of it the recent years only. Political branding as a concept is an alluring proposition for brand managers to understand the significance of the same in the overall scheme of things with regard to the political setup of our country. When one takes into account the plethora of choices which the voter of today has in terms of choosing the right politician to govern, the importance of this unique and recent phenomenon becomes further augmented. This research paper would look into various issues in this regard and come up with some interesting observations about the current political scenario in our country.

Introduction

India is a mammoth country in every regard, be it geography, population, the largest middle class as well as English-speaking population on the globe, consumption levels, the list is indeed impressive. Political parties are no exception to this on the virtue of their sheer number. India being a multi-party democracy, where political parties can be formed with much ease, has the distinction of having more than 1850 parties (1866 to be exact) out of which mere 6 are national parties, a somewhat-okay 50 state-level parties, and a staggering 1810 unrecognized parties. According to data compiled by the Commission, in the last Lok Sabha election in 2014, 464 political parties had fielded candidates. (Source: Times of India report on its website on July 24, 2015 based on a report published by Election Commission of India). Having such a large number of political parties is unparalleled in any part of the globe.

Having such a large number of unrecognized parties comes naturally to the largest democracy in the world as forming a political party is literally an easy job. But with the numbers come the problem of segregating these political parties from one another. Even if we discount the huge number of unregistered parties, we are still left with a formidable task to create meaningful differentiation with regard to the national as well as regional parties.

To have an idea how big this challenge is, US and UK, the two frontrunners of the democratic world are both a two-party system (though there are fringe parties but they play minimal role in the running of government) where the voting populace is not overwhelmed with choices as is the case with the Indian voter in any election be it at the local, regional or national level. Almost all the national parties as well as the regional parties (as prevalent in that specific region, for examples, AIADMK in Tamil Nadu) contest the elections at practically all the levels thus befuddling the voters as to whom they should vote and on what grounds. It is here that they need some sort of a differentiator with regard to the contestants. In this regard, political branding does hold significance but before that we need to understand whether politicians can be branded on the lines of a commodity or not and if yes then to what extent.

Politician : Can S/he be Branded on the Lines of a Commodity?

Before we go further, we need to gauge the significance of branded products and does this concept have much say in the field of politics?

If one goes by the definition of what comprises a brand, there are many versions of it. Some of the popular ones are as mentioned below:

Brands have been around us since "the dawn of history" existing as trademarks (Danesi, 2006, p 10).

Brands are described as any visual symbols that identify a product or service (Danesi, 2006).

A brand is any combination of names, slogans, logos, symbols, shapes, colors, letters, signatures, product design, packaging, advertising, and marketing that together give particular products or services a physical, recognizable form that is visually distinctive (Williams, 2000; Clifton et al., 2009).

When we look at the above definitions related to what goes into the making of a brand, particularly the last one, it does come into perspective as to whether political orientedness could be branded or not. ***As is evident from the definition given by Williams and Clifton, any entity could be branded if it is visually distinctive from others.*** This is very much applicable for a politician who is known for her/his charisma whether at the National level (Mr Narendra Modi) or state level (Ms J Jayalalitha in Tamil Nadu).

Playing the branded card could be double-edged sword for a political party which is projecting one of its leaders as the face of that party as has been found by many parties during the last few elections, particularly during the last general election. This is so because if the political brand is not as strong as presumed by the party, a failed political brand can do much damage and make things worse for the party.

Having said that, it does make sense to go for the 'branded' politician as it increases the visibility of the party and helps the electorate to connect with the party in a better way as the face of the leader becomes the face of the party. Such a phenomenon is very popular in the western democracies where Prime-ministerial (as in the case of UK) as well as Presidential (as is the case with USA) are fought on the charisma of individual leaders more than the party. The current ongoing battle between Hillary Clinton and Donald Trump, the two

nominees of the two-party democracy are far more popular than the parties themselves. In fact, voters vote for the leader and not the party during the US Presidential election. Likewise, German Chancellor Angela Merkel is the face of her party and is considered to the most bankable political brand in that country. Canadian PM Justin Trudeau is the immensely likeable political brand of his country, who took over from his father Pierre Trudeau, another popular political brand, so much so that recently when he visited US some of the locals requested him to lead their country as well in the melee which surrounded the nomination process in that country.

Such things were not much in practice in the Indian context till recently (though there were notable exceptions such as Late Indira Gandhi for Congress and Mr Atal Behari Vajpayee for BJP but they are exceptions rather than norms). Rarely have been elections fought in India riding on the charisma of individual leaders as compared to the popularity of the party to which s/he belonged. In India, first came the party, then the politician.

On the basis of above discussion, we could say that politicians could be branded on the lines of commodity. What matters is whether the 'customer' (read electorate) is willing to 'buy' (read vote) for a particular politician or not. The 'sales pitch' (read election rallies and propaganda) and the 'product' (read the leader and the election manifesto) should appeal to the customer only then they would proceed with their choice of product. The success or failure of a political product could be gauged from the aspect as to how many customers chose it over its rivals. The success of a political event is proportional to the turnout witnessed during it. In this regard, the last general election was indeed a resounding success as a record two-third of the eligible electorate turned up for voting making it the largest exercise of its kind on the globe.

The 'Branded' Indian Politician

The last general election would go down in the history as one in which strategies adopted by various parties with regard to wooing the voters ranged from one extreme to the other, with most of them falling flat in the faces of the parties (out of the 8251 candidates who contested the election, 7000 lost their deposits as per Election Commission of India stats-party contested General Election 2014). Every party tried its best to upend the other. Only a few succeeded, rest of them failed.

Jevons (2005) is of the view that branding is an arena which is quite a broad one and apart from regular products could very well feature politics as one aspect of it. Likewise, Scammell (2007) opines that having the better image related to the party or candidate could act as the ultimlate differentiator among the rival brands. Smith and French (2011) further reiterate this aspect albeit in a different manner. Their perspective is that of established political brands leading to 'simpler' choices for the voters on the virtue of creating mental short-cuts for them.

During the last general election when brand Modi obliterated the rival brands by a huge margin so much so that none of the rival parties of BJP-led NDA coalition could even garner enough seats to be recognized as the opposition party. Congress was reduced to a two-digit count, a first of the party and that too stood at a measly 45 whereas to be recognized as the opposition party, one needs one-tenth of the total LS seats which is 543.

At the same time, even in the Modi juggernaut, there were regional bigwigs like Mamata Banerjee in West Bengal (34 seats), Naveen Patnaik in Odisha (20 seats), J Jayalalitha in Tamil Nadu (37 seats), who held the ground on their own and despite the saffron onslaught, came up with pretty impressive shows solely on the basis of their

individuality and persona. Here the local stalwarts of NDA are not being highlighted for the plain fact that they were not up against brand Modi but an ally to it though they didn't let it overshadow their local clout.

Interestingly, such was the magnitude of brand Modi that it needed none of the abovementioned regional brands to make its mark at the central level and went on to form the first majority non-Congress government at the center in the post-independence era of India. One news channel aptly remarked, "***Jayalalitha has a whopping 37 seats that Narendra Modi doesn't need***" (NDTV.com, May 16, 2014). BJP alone won 282 of the 543 seats thus garnering majority in the lower house of the parliament thereby fulfilling the popular slogans such as 'Abki Baar Modi Sarkaar' and 'Mission 272+' highlighting the true aspect of a winner brand which delivers on what it promises or even more than that (282 as against a target of 272).

On the other hand, such regional powers like Nitish Kumar, Lalu Prasad Yadav, Sharad Yadav, Mulayam Singh Yadav, Mayawati (despite BSP garnering third-largest vote share behind BJP and Congress, it remained seat-less) came a cropper during the general election. So did the projected leader of Congress, namely Rahul Gandhi who was seen as the counter to brand Modi but was no match to it. The experience, relatedness, humility, believability which brand Modi brought with it (not to mention an impressive track record of serving one of the longest-CM tenures in India) were unmatched. Its rivals tried to pull it down by questioning its stand during the 2002 pogrom but had few takers. A reason for the same could the aspect that the youth brigade, which included the first-time voters as well, didn't have much inkling about the same. It was more concerned with the plank of development, employment and performance which brand Modi promised and brand promise holds significance in case of a trusted brand. They believed it because it had a proven track record in the state of Gujarat (though his detractors questioned it as well).

The biggest advantage that brand Modi had over its rivals was the experience which he brought on the table being one of the longest-serving head of an Indian state (he was the CM of Gujarat from 2001 to 2014) before he quit the post to join the race to become the next PM of India. Another aspect related to his immense popularity was the simplicity which brand Modi carried. This is so because as per Adamson (2006), the best brands are those which are simple in their outlook and easily understood and related-to by the target audience, traits which brand Modi had better than the contemporaries. The humble background ('chaiwala' to PM) added brawny points to the suitability of brand Modi in a country where almost 80 percent of the population survives on less than 100 rupees per day. The simplicity of the communication related to brand Modi was reflected across the horizon and was noticed by one and all, even his harshest critique and cut across various divisions and sections of the society.

Similarly, the Delhi assembly polls, which took later that year, saw the rise of Aam Aadmi Party which scored a home run by capturing 90 percent of the seats to run the state level government in the political capital of the country. This was made possible riding on the popularity on its very much visible and vocal leader Arvind Kejriwal who fought the assembly election on his own terms and won thus living up to the expectations of his followers.

Interestingly, when one talks about the Bihar state elections, BJP suffered drubbing there to the hands of Nitish Kumar and Lalu Prasad Yadav, the same people who found it difficult to match the charisma of brand Modi during the general

election thus highlighting a peculiarity of the Indian voter. S/he votes differently when voting nationally (trusts a brand which is national in character like brand Modi) whereas when voting for state assembly trusts a home-grown brand like brand Nitish and keeps the good work done by him in mind. One size fits all doesn't apply to the voter of today as s/he doesn't like to mix national with state politics as both of them are fought on different agendas. And then there are politicians like J Jayalalitha, Naveen Patnaik and Mamata Banerjee who know the pulse of their voters so well that the electorate vote for these charismatic leaders no matter whether the elections are national, state-level or local. Such is their grip on the electorate that they are bigger than any other political brands on their own turf.

Conclusion:

These last few years have indeed gone to prove the arrival of the 'branded' Indian politician in their own way. The political brands have made their mark at every level of elections, be it the local bodies, the state assembly or the Lok Sabha. What has indeed caught the eye and imagination of the voter is that they are beginning to put the leader ahead of the party on many instances thought it would be too early to say that it is the leader who matters and not the party. Also, it has indeed become a trend for the electorate to trust different brands at different levels but then there are certain brands which are so strong that they could be trusted at all the levels. The rise of a national brand during the last general election put paid to all the doubts of the naysayers that there could not be a single brand driving the entire nation. Although it has lost its sheen in the past few assembly polls but still it would be unwise to dismiss the charisma of the leader who held sway over majority of the nation not so long ago. In fact, going by a recent poll conducted by Zee News and subsequently published on May 2, 2016 (almost two years after the historic mandate of May 16, 2014), 70% of the respondents want Modi as the PM till 2024 and 62% are happy with his performance.

The Indian voter has acknowledged the rise of the branded Indian politician in the last few years more than during any other era of post-independence India. The first non-Congress majority government at the center was formed on this simple premise only. Also, simplicity is the essence of a winning brand and politics is no exception to this tenet of branding. Those aspiring to succeed in the arena of political branding would do well to understand and implement the same.

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Performance Measurement of GCC Banks: A CAMEL Approach

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Abstract

The present paper examines the performance measurement of total twelve private and state-owned banks operating in Gulf Cooperation Council (GCC) countries for the period from 2012 to 2015. The main purpose of this study is to evaluate banking performance with the help of CAMEL ratios namely Capital Adequacy, Asset Quality, Management Soundness, Earnings and Liquidity and to define the financial performance, operating competency and regulatory compliance of banks. The findings of this research paper concluded that Mashreq Bank, National Bank of Kuwait and Qatar national bank are the top three banks regarding composite CAMEL ranking. Gulf International Bank, National Bank of Bahrain and the National Commercial Bank are the three banks which are at the bottom of the composite CAMEL ranking. Concerning Bahrain Banks, the two banks of Bahrain are excellent regarding capital adequacy, but they are placed at number ten and twelve positions of composite ranking as they are not doing well in other CAMEL variables.

Key words: CAMEL, performance, bank, GCC and ratio

Introduction

The banking institutions consider as one the fastest developing sector in the world. Nowadays, this area is becoming more complicated. The primary goal of this research is to analyze the performance and financial position of some banking institutions in Gulf Cooperation Council (GCC) countries. This study attempts to evaluate and measure extensively the performance of relative banks in GCC countries. For this study, I will shed light on the performance of private-owned and state-owned banks that are listed on stock markets. This is a service sector, so it is very hard to measure the outcomes since it is non-physical. The best method of examining safety and solidity of banks and as well as supporting in minimizing the potential risks that in turn leads to failure is CAMEL approach. There are five major factors such as Capital adequacy, Asset quality, Management quality, Earnings and Liquidity which interpreted by the acronym "CAMEL". At outset CAMEL model or approach was adopted by the Federal Financial Institution Examination Council on November 13th, 1979; then after it developed by the National Credit Union Administration in October 1987 in U.S.A. The reason I have selected CAMEL approach as the main topic of this research is that to understand the way how to evaluate and measure performance and productivity of banking sector and to realize either if the banks are with abreast

to certain changes in the response to global economy.

Scope and Importance of CAMEL approach

The main scope of this research is to shed light on the comparative financial position and performance of commercial banks at GCC level with regards to in-house commercial banks which would assist the concerned banks to know where do stand towards GCC commercial banks. Secondly, the research would also enumerate the financial health and risk exposure of local banks by enforcing CAMEL approach which would help to translate similar strength and risk exposure of other GCC commercial banks. Thirdly, the research would indicate the perception of bank managers on global banking notion that parallelly add the customer understanding of banks concerning consciousness and demand of different services that currently offered by the banks.

The importance of CAMEL approach is to evaluate the entire banking conditions and level of risks through following a regulatory banking supervision framework. This sort of supervision Information could be measured by CAMEL rating system that is examined by five factors representing Capital adequacy, Asset quality, Management quality, Earnings and Liquidity of the banks. This rating system is designed to help the regulators to identify issues of banks by receiving a rating of 1-5 with one being a good score, and five consider the worst. Banks with an average rating of one or two required less concerned for regulators, but if the score arrived at three so, then it offers some degree of concern and further to those rated five are problems banks which tend to present medium to heightened levels of supervisory concern.

Literature Review

In this area of analysis many of studies in different views that attended by a policy maker, researchers, and academicians to assess the financial soundness of banking institutions through applying CAMEL model that employed by regulators in banking literature.

Measurement of banking performance using CAMELS was done by Wirnkar, A. &Tanko, M. (2008). This study was conducted to determine the sufficiency of CAMEL approach in measuring the overall performance of banking sectors; to find out how important the weight of each relative segment that contributed in CAMEL model; and eventually to report the best financial ratios that usually bank regulators might rely on evaluating bank's adequacy. Secondary data considered as the main source of this research work in which includes the annual reports of eleven commercial banks stated in Nigeria for the period from 1997 to 2005 plus the random data sampling also used as one of the tools in the research paper.

Dash and Das (2009) conducted a study of comparison between Public and Foreign Banks in India by performance analysis by using CAMEL parameters. This research study was performed on samples that collected from fifty-eight operating banks in India in which comprised twenty-nine public sector banks and twenty-nine private/foreign banks. The data gathered from the audited financial statement for the fiscal year from 2003 to 2008. The findings concluded that private/foreign banks were better off public sector in the aspect of two main dimensions of CAMEL model that added to the beast performance of these banks were Management soundness and Earnings/profitability. The findings of this research proposed that for public banks to compete their rivals (private/foreign banks) they must keep abreast with market conditions changes. Based on the results of this research it also suggested that public sector banks should maintain annual income record of customers to reduce the potential risk that regularly emerged from borrower's weak income.

There are a lot of latest studies used successfully by several researchers regarding CAMEL model to evaluate the operational and financial performance of commercial banks. One of these studies collected by Sangmi&Nazir (2010) who conducted carried out a study on analyzing the financial performance of two commercial banks in Northern India to determine their financial position with the help of CAMEL parameters, the latest approach to financial analysis. CAMEL method considered as a primary means of tool analysis used in this research with the help of secondary data that captured from a financial year from 2001 to 2005. As far as the five dimensions of CAMEL were concerned in this research, it highlighted that CAMEL parameters are the best technique for evaluating the financial performance. Moreover, it figured out that the financial position of both Punjab National Bank and Jammu Kashmir Bank was healthy and satisfactory.

Mishra, A.K, Harsha, G.Anand S. &Dhruva N.R., (2012) Evaluation the performance of twelve private and public sector banks in India. The objective of this study is to highlight the financial performance of 12 private and public banks with the help of data collected from the secondary source of data over a period of eleven years for the financial year 2000-2011 using CAMEL model. Considering the five top factors of CAMEL framework, this study demonstrated that based on safety and soundness of performance of private sector banks are the best and at the top of the list. Whereas the public sector banks for example SBI & Union Bank are unfortunately below list due to unsoundness economic display in comparison. Thus, the government perception towards the public sector banks should be further extended to reach the net profit at average profit per employee and assets ratio. However, this could be helpful for bank's soundness in terms to overcome the reason for reducing the comparative rate at which public sector banks can lend.

Misra S.K., and Aspal, P.K., (2013) Assessment of performance and financial safety and soundness of SBI group (including all seven State Banks). The sample of this research based on the use of financial ratios that contributed to five segments of associated with CAMEL parameters for the period two years. This study concluded that despite the best performance of some banks within SBI Group in a particular year, the overall performance of SBI Group was sustained almost at the same level. This is because of no significant statistical change took place in CAMEL ratio during the period of examining the financial soundness of SBI Group.

Roman, A. and Sargu, A (2013) Measurement of financial soundness of commercial banks in Romania. This study highlights descriptive and analytical research design. The set of data sample compiled from fifteen operating commercial banks in Romania that own jointly over 78.10% of overall bank assets. This research supported by the secondary data composed of financial statements including income statement and balance sheet with use of financial ratios that separately computed for each segment of CAMEL framework. The data of financial soundness analysis considered the period of the fiscal year from 2004 to 2011. The report mainly focuses on strengths and weaknesses of examined banks which underline the need for decision makers to promote the concerns from banks towards improving and increasing the financial soundness of commercial banks in Romania. However, these findings of this research illustrated that all the banks are well capitalized and have an enhanced capacity to cover any possible losses that come out of performed activity.

Dr. Mukund Sharma (2014) Comparison and examination of private and public banking

institution performance in India applying CAMEL approach. In this study, six core factors related to CAMELS model were taken into account i.e. capital adequacy, asset quality, management quality, earnings, liquidity, and sensitivity to market risk which affect the solidity of the banking institution system. There were thirty-two commercial banks from India involved in this research study that more specifically selected from sixteen private banks and sixteen public banks. In addition to samples were picked out from secondary data i.e. financial ratios contributed to CAMEL ratio for the fiscal year from 2007 to 2013. The outcomes of this study indicated that 70% of private sector banks were better off public bank areas regarding utilization of employees and assets that considered as available resources and which can be derived from the use of financial ratios such as Profit per Employee, Business per Employee and Return on Asset. Besides, it was noticed that banks with high investment ratios in Government Securities resulted in low net and gross acting asset, but then only a few of commercial banks sustained lower rate net and gross acting asset. However, in final overall ranking, 90% of public sector banks got best rankings as compared to private sector banks that were only representing 67%.

Salhuteru F, Wattimena F, (2015) Performance of banks with the use of CAMEL ratios towards practices of management earnings in private and state banks. Concerning this research study, an effort has made to analyze the impact of CAMEL ratio towards methods of earnings management in national bank limited to PT Bank BTN (Persero), PT Bank Negara Indonesia (Persero), PT Bank ArthaGraha and PT Bank Central Asia Tbk dan. The data sample of this research was gathered from a secondary source of data in which includes a monthly financial report of the state bank issued by Bank Indonesia for the budget year 2012 and 2013. These sampling tools involved random sample that selected from eighteen months of bank financial statements. Examination the effect of the earnings management and the impact of CAMEL ratios toward practices of earnings management was supported by diversified regression. It concluded that government bank and variable net profit margin (NPM) had a positive impact on earnings management. Ratios such as capital adequacy (CAR), and margin ratio (MR) have no substantial impact likewise return on risk assets (RORA), loan to deposit ratio (LDR), and return on assets (ROA) has a positive impact but not significant. By private banks, ratios such as variable NPM and ROA significant affirmative impact on earnings management, LDR, and CAR have passive but not substantial impact likewise; MR and RORA have a positive but not material effect on earnings management.

Data and Methodology

The CAMEL ratios are considered as one of the essential tool used in this study to evaluate the banking performance and outcomes that in turn guide the banking sector to the true direction for upgrading future. The total numbers of 12 banks were selected from different GCC countries in which include two banks from each country. The intended banks that selected for analysis are Bank Muscat and Oman Arab Bank (OAB) from Oman, National Bank of Abu Dhabi and Mashreq Bank from UAE, Qatar National Bank (QNB) and Doha Bank from Qatar, Gulf International Bank (GIB) and National Bank of Bahrain from Bahrain, The National Commercial Bank (NCB) and Riyadh Bank from Saudi Arabia, National Bank of Kuwait (NBK) and Gulf Bank from Kuwait.

This method is an acronym for five major indicators (Capital Adequacy, Asset quality, Management soundness, Earnings and Liquidity) which reflect the financial position of banking institution framework. This study is based on secondary sources of data used in the form of

financial statement collected from annual reports of concerned banks. The time span of research data of using CAMEL approach that would analyze the performance of banking institutions is four financial years for the period from 2012 to 2015. The financial ratios considered under each CAMEL parameter explained in the discussion section of the following part.

Variables Measurement

Capital Adequacy

This section of CAMEL approach highlights the evaluation of the financial strength of banking institutions. Capital Adequacy defined as the available sum of money which help bank's business and act as a cushion in the event of the critical financial situation (Athanasoglou et al. 2005). The The higher the bank capital the less chance of financial support is required (Diamond, 2000). Capital adequacy is not without blemishes that it stimulates little demand for liability, the inexpensive source of fund is the degree of capital needed by the banks to support them to resist the risks exposure such as market, operation, and credit risk with a view to to save hard earned public money. Since Capital Adequacy points out at which level banks cover potential risk in their operations, it also known in banks as the overall use of financial leverage (Freahat, 2009). Besides, Capital Adequacy in banks regarded as a capital position where similarly to shield the depositors from possible losses beard by the banks. (Nimalathasan, 2008). Accordingly, it used as a changeable parameter under CAMEL framework. Hence, Capital Adequacy showed as an improver of the financial performance of banks. In this research, the measurement of Capital Adequacy ratio is about the usage of overall financial leverage of given bank which represents that highly leveraged banks are more likely expected to experience inconstancy in earnings comparing those with low financial leverage. In this study, Capital adequacy is assessed by Capital Adequacy Ratio.

Asset Quality

This parameter of CAMEL model considers the performance of bank's assets, particularly how much loans banks made. Nonetheless, assets quality is influenced by primary elements are diversification degree of assets, volume, and period of loans, the existence of directed or policy lending and related party lending, development of loans portfolios, the caliber of collateral supporting each loan and related party lending (Teck, 2000). Moreover, it exhibits the level of the risk of assets as well as financial rate potency within the bank. Therefore, it plays a role in affecting the financial position of the banks (Dincer et al., 2011). However, measurement of Asset Quality is concerned with different financial ratios such as Total Investments to Total Assets, and non-performing loans (NPLs) to Gross Loan ratio. In this paper, author has used NPLs to Gross Loan ratio as a measure of asset quality.

Management Soundness

Management Soundness is one of the vital essential indexes that play a significant role in shaping bank's performance. It is also known as a pre-condition for success and growth for every banking institution. Likewise, the practice of successful management leads the bank to steady profit, at which it should present professionalism, high standard of probity and prominent quality of services. Therefore, management is treated as one of the paramount indicators in fostering bank performance (Teck, 2000). Management competency in this research is evaluated with the help of Overhead Efficiency ratio.

Earnings

The efficiency and effectiveness in managing the assets and liabilities in banking institutions are the main means of quality earnings improvement. The performance of earnings growth should carry a

trust between investors, creditors, depositors, and the public. The ability to assist current and coming bank operations rely on profitability and earnings outline (Shar, Shah, &Jamali, 2010). The quality of earnings, in fact, is substantial in defining the performance of banking institutions. The earning quality of banks in this study is measured by Return on Equity.

Liquidity

The liquidity of banks depends on their ability in serving depositors' withdrawal, loan calls without time lag and, maturing liabilities (Teck, 2000). Besides, the liquidity considered as one of the significant financial instrument in serving short-term financial indebtedness and to meet customer loan request. While the banks in the event of financial bottlenecks might be desperate and which encourages them to borrow short-term funds and emergency loans at a high-interest rate to meet prompt cash solvency. As a result, it results in the reduction in banking institutions profitability. Soundness of managing the liquidity in banks will result to successful bank performance. In this research, the liquidity position of GCC banks is determined by Liquid Assets to Total Assets.

Summary and Findings

The research findings are tabulated in tables 1-5 for all the CAMEL variables; capital adequacy, asset quality, management efficiency, earnings quality and liquidity.

Capital Adequacy Ratio

Capital Adequacy Ratio or also known as Capital to Risk Assets Ratio, which indicates the measurement of Bank's capital towards its risk. This ratio is used to ensure the ability of banks to control over its losses that emerge from operational losses at a rational level incompatible with statutory capital requirements. The higher the Capital Adequacy Ratio, the stronger the bank is and the more secured the investors will be. CAR is calculated by the use of the ratio: CAR= (Tier-I Capital + Tier-II Capital)/Risk Weighted Assets. Moreover, the table1 below pointed out that National Bank of Bahrain is top ranked with highest average CAR ratio of 30.85% traced by Gulf International Bank (19.10%). Doha Bank graded as last-place with CAR of 15.06%.

Table1: Capital Adequacy Ratios of sample banks and ranking

Bank	2015	2014	2013	2012	Average	Rank
Bank Muscat	16.10%	15.92%	16.40%	16.30%	16.18%	10
Oman Arab Bank (OAB)	14.22%	15.14%	16.52%	16.91%	15.70%	11
National Bank of Abu Dhabi(NBAD)	16.74%	16.39%	18.21%	21.05%	18.10%	3
Mashreq Bank	16.90%	16.60%	18.20%	19.30%	17.75%	4
Qatar National Bank(QNB)	16.30%	16.20%	15.60%	21.00%	17.28%	6
Doha Bank	15.73%	15.03%	15.90%	13.59%	15.06%	12
Gulf International Bank (GIB)	17.80%	19.60%	18.90%	20.10%	19.10%	2
National Bank of Bahrain(NBB)	32.10%	32.20%	31.22%	27.90%	30.85%	1
The National Commercial Bank (NCB)	17.20%	17.20%	17.10%	17.50%	17.25%	7
Riyadh Bank	18.40%	17.30%	17.10%	17.70%	17.63%	5
National Bank of Kuwait (NBK)	16.80%	14.50%	17.30%	18.30%	16.73%	8
Gulf Bank	15.56%	15.45%	17.40%	16.80%	16.30%	9

Asset Quality

This parameter is considered as a significant factor in CAMEL model and used to analyze the level of financial strength of banks. The primary objective to evaluate the quality of asset is to determine the proportion of non-performing assets (NPA) from total assets. NPL to Gross Loan Ratio is usually used as a measurement of asset quality and to determine issues of asset quality that rose in the loan portfolio. The non-performing loan represents the loan amount for which debtors defaulted in serving his or her scheduled payments for a minimum period of 90 days.

Table2: Non-performing loan to gross loan of sample banks and ranking

Bank	2015	2014	2013	2012	Average	Rank
Bank Muscat	0.09%	0.09%	2.90%	3.00%	1.52%	3
OAB	2.87%	2.94%	3.30%	2.70%	2.95%	6
NBAD	3.20%	3.60%	3.60%	3.80%	3.55%	8
Mashreq Bank	2.80%	3.70%	6.00%	9.40%	5.46%	10
QNB	1.40%	1.60%	1.60%	1.30%	1.48%	2
Doha Bank	3.30%	3.10%	3.01%	2.81%	3.06%	7
GIB	2.30%	5.42%	4.59%	4.46%	4.19%	9
NBB	8.30%	10.00%	7.77%	7.85%	8.48%	12
NCB	1.45%	1.28%	1.54%	2.98%	1.81%	4
Riyadh Bank	0.90%	0.80%	0.96%	1.73%	1.10%	1
NBK	1.30%	1.50%	1.96%	2.75%	1.88%	5
Gulf Bank	2.70%	3.30%	6.50%	10.90%	5.85%	11

According to table2, Riyadh Bank is on the top position with the lowest percentage of 1.10% followed by QNB (1.48%). NBB scored the lowest position with a high average of 8.48%.

Management Competency:

Management efficiency is another parameter of measuring the financial strength of the bank. It is used to ensure management efforts in meeting a consistent level of excellence importantly. It entails managing all tasks and activities keep up at the same level of Excellency. Overhead Efficiency Ratio is used to evaluate the burden and the diversification of income inflows. High overhead Efficiency ratio means larger the diversification and fee and commission income. Management efficiency is measured by dividing Non-interest income/Non-interest expenses x 100.

In the above table3, Mashreq Bank is top ranked with a highest average ratio of 183.37% followed by NBK (127.09%). NCB has been rated at the lowest place with least percentage of 82.33%.

Table 3: Overhead efficiency ratio and ranking

Bank	2015	2014	2013	2012	Average	Rank
Bank Muscat	96.98%	98.93%	81.78%	69.27%	79.16%	9
OAB	70.35%	74.76%	63.25%	69.59%	69.49%	10
NBAD	88.46%	100.53%	98.63%	99.22%	96.71%	6
Mashreq Bank	172.87%	196.57%	188.99%	175.05%	183.37%	1
QNB	95.22%	100.27%	99.38%	114.67%	102.39%	3
Doha Bank	80.72%	99.02%	90.89%	98.09%	92.18%	7
GIB	62.36%	60.40%	75.99%	77.59%	69.09%	11
NBB	115.88%	101.51%	90.46%	90.31%	99.54%	5
NCB	77.62%	81.02%	83.61%	87.06%	82.33%	12
Riyadh Bank	95.86%	102.72%	93.94%	115.33%	101.96%	4
NBK	120.63%	121.61%	115.18%	150.92%	127.09%	2
Gulf Bank	82.27%	80.52%	79.20%	106.38%	87.09%	8

Earning Quality

Earning quality is considered as core factor used in CAMEL model to predict the bank's future earnings. Return on Equity Ratio (ROE) is a measure of how efficient a bank is of generating profit from money invested by shareholders. Higher the ratio means better the capital efficiency and the bank's ability in outsourcing the capital. This ratio should ideally be 15% to stay at a competitive level. In this paper ROE, is measured by dividing Net Income/Shareholder's Equity.

Table 4: Return on Equity Ratio and ranking

Bank	2015	2014	2013	2012	Average	Rank
Bank Muscat	12.56%	12.44%	12.55%	13.18%	12.68%	7
OAB	12.84%	13.34%	12.59%	13.73%	13.03%	5
NBAD	12.11%	14.70%	13.65%	13.92%	13.60%	4
Mashreq Bank	13.17%	14.70%	12.45%	9.92%	12.56%	8
QNB	18.26%	18.15%	17.75%	17.55%	17.93%	1
Doha Bank	10.40%	12.03%	11.65%	17.28%	12.84%	6
GIB	3.72%	3.64%	5.37%	5.53%	4.57%	12
NBB	15.15%	14.17%	14.14%	14.89%	14.59%	3
NCB	16.47%	18.74%	18.78%	16.78%	17.70%	2
Riyadh Bank	11.08%	12.25%	11.65%	10.84%	11.46%	9
NBK	8.24%	10.19%	8.17%	11.85%	9.61%	10
Gulf Bank	7.25%	6.93%	6.66%	6.88%	6.93%	11

In the above table 4, QNB hasss been ranked on the top of the list with a highest average ratio of 17.93% followed by NCB (17.70%). GIB scored the lowest position with least percentage of 4.57%.

Liquidity

Liquidity is regarded as the central part of CAMEL model in which high liquid assets used to measure the bank's efficiency in meeting short-term debts. Liquid Assets to Total Assets Ratio can be defined as a measurement of overall cash position of the bank and as well as the ability to weed out any liquidity shock in the short run. Liquidity Assets of banks comprise of cash and balances with the central bank, due from banks, loans and advances, and any other financial instruments declared by the Government and central bank. The total assets incorporate the revaluation of overall assets. A higher ratio shows better liquidity position of the bank in serving short-term obligations.

Table 5: liquidity ratio and ranking

Bank	2015	2014	2013	2012	Average	Rank
Bank Muscat	85.57%	89.04%	89.46%	88.33%	88.10%	3
OAB	90.53%	91.96%	92.29%	93.22%	92.00%	1
NBAD	81.02%	79.65%	82.05%	87.00%	82.42%	5
Mashreq Bank	79.82%	80.15%	78.80%	78.40%	79.29%	8
QNB	81.13%	82.01%	78.29%	83.63%	81.27%	7
Doha Bank	83.50%	84.89%	80.22%	79.98%	82.15%	6
GIB	73.88%	73.17%	72.04%	71.72%	72.70%	10
NBB	44.80%	42.94%	40.52%	55.78%	46.01%	12
NCB	66.78%	62.15%	64.10%	63.83%	64.22%	11
Riyadh Bank	78.26%	76.01%	76.28%	77.26%	76.95%	9
NBK	84.77%	82.49%	79.90%	82.74%	82.48%	4
Gulf Bank	90.98%	92.45%	90.30%	89.86%	90.90%	2

According to the above table 5, OAB has been ranked on the top position with a highest average ratio of 92.00% followed by Gulf Bank (90.90%). NBB scored the lowest position with least percentage of 46.01%.

Overall performance of the Banks

By all the five CAMEL parameters; capital, asset quality, management efficiency, earning quality and liquidity, a composite ranking table 6 is prepared. The average of all the individual parameters average is calculated. By mean of means, the overall rank was calculated. The average for asset quality was considered with the negative sign while calculating the overall rank.

Table 6: Overall Performance Ranking during the Period 2012-15

Bank	C	A	M	E	L	Average	Rank
Bank Muscat	16.18	(1.52)	79.16	12.68	88.10	194.6	8
OAB	15.7	(2.95)	69.49	13.03	92.00	187.27	9
NBAD	18.1	(3.55)	96.71	13.60	82.42	207.28	4
Mashreq Bank	17.75	(5.46)	183.3	12.56	79.29	287.51	1
QNB	17.28	(1.48)	102.39	17.93	81.27	217.39	3
Doha Bank	15.06	(3.06)	92.18	12.84	82.15	199.17	6
GIB	19.1	(4.19)	69.09	4.57	72.70	161.27	12
NBB	30.85	(8.48)	99.54	14.59	46.01	182.51	10
NCB	17.25	(1.81)	82.33	17.70	64.22	179.69	11
Riyadh Bank	17.63	(1.1)	101.96	11.46	76.95	206.9	5
NBK	16.73	(1.88)	127.09	9.61	82.48	234.03	2
Gulf Bank	16.3	(5.85)	87.09	6.93	90.90	195.37	7

Conclusion

It is worth noting that banking system growth in one country has a significant impact on economic growth of the other countries. Despite, GCC countries are dependent more on oil-sector and either indirect development through government spending in the same aspect, the banking system in GCC countries have their credit exposures to several spheres of the economy. The structure of the economy limits the capabilities of the banks to expand their credit portfolio. The financial constancy of banking system is a key driver in lending out the economy of non-oil sectors in GCC countries. This empirical study is conducted to measure the performance of selected banks operating in GCC countries. This research study utilizes CAMEL approach to analyzing the correlation between CAMEL parameters and banking performance of private and state-owned banks among twelve banks in GCC countries during 2012 to 2015 and their ranking on CAMEL ratios. This approach is regarded as best means of measuring the banking performance.

In the context of CAMEL framework, findings of this study concluded that Mashreq Bank, National Bank of Kuwait and Qatar national bank are the top three banks regarding CAMEL parameters. Gulf International Bank, National Bank of Bahrain

and the National Commercial Bank are the three banks which are at the bottom of the ranking. The two banks of Oman are better regarding asset quality and liquidity but poor in capital adequacy and management efficiency. Bank Muscat remains better off than Oman Arab Bank regarding Capital Adequacy, Asset Quality, and Management Competency. In Contrary, Oman Arab Bank held the highest rank regarding Earnings and liquidity. The two selected banks of UAE are not doing well regarding asset quality whereas with other parameters their performance is either good or above average. In UAE, Mashreq Bank ranked at the highest position in all CAMEL parameters except in liquidity and asset quality., whereas National Bank of Abu Dhabi is doing a fair job in almost all the parameters and stood at rank four among the sample banks.

In Qatar, Qatar National Bank(QNB) is better than Doha Bank with former having third rank and latter sixth rank. Only in liquidity Doha Bank is slightly better than QNB otherwise Doha Bank is way behind QNB of Qatar. Concerning Bahrain Banks, the two banks of Bahrain are excellent regarding capital adequacy, but they are placed at the number at ten and twelve positions of composite ranking. Furthermore, CAMEL parameters demonstrate that Riyadh Bank performs better regarding Capital Adequacy, Asset Quality, Management Competency and Liquidity but lowest rank took in Earnings as compared to NCB. From Kuwait, NBK is superior to Gulf Bank with second place in the composite ranking and is better than Gulf Bank, except in Liquidity ratio. The current study pointed out that even the ranking of ratios under CAMEL model seems variable from bank to bank of selected private and state-owned banks. The study has important policy implications for the managers of these GCC banks. This paper may help them in devising strategies and risk management framework.

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Perspectives

Indian Conveyor belt Industry

Gouranga P. Chattopadhyay

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Independent Organisational Development Consultant and Personal Counsellor

Overview:

A **conveyor belt** is the carrying medium of a **belt conveyor system**

A belt conveyor system is one of many types of conveyor system. A belt conveyor system consists of two or more pulleys (sometimes referred to as drums), with an endless loop of carrying medium—the conveyor belt—that rotates about them. One or both of the pulleys are powered, moving the belt and the material on the belt forward.

Primitive conveyor belts were used since the 19th century. In 1892, Thomas Robins began a series of inventions which led to the development of a conveyor belt used for carrying coal, ores and other products. In 1901, Sandvik invented and started the production of steel conveyor belts. In 1905 Richard Sutcliffe invented the first conveyor belts for use in coal mines which revolutionized the mining industry.

Basic Description:

Today there are different types of conveyor belts that have been created for conveying different kinds of materials.

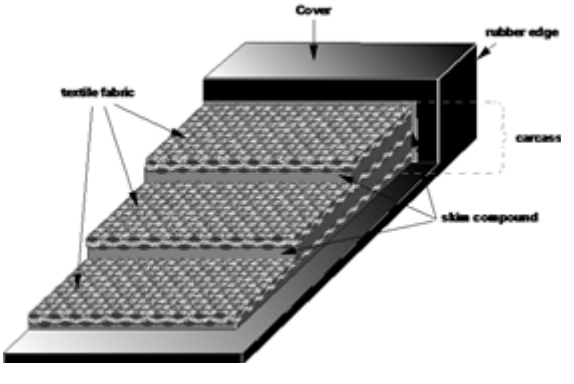
Primarily a conveyor belt consists of two parts:

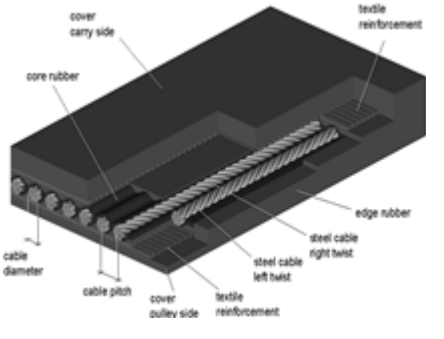
1) **Carcass** –which provides the linear strength and shape to the belt

2) **Cover**- a layers which covers or protect the carcass.

Carcasses are usually of nylon, polyester, steel cords or Aramid fabrics.

The tension requirement in the belt is usually the governing criteria for choosing the carcass material while selection of the cover rubber is dependent on the characteristic or nature of the material which needs to be transported through the conveyor belt.



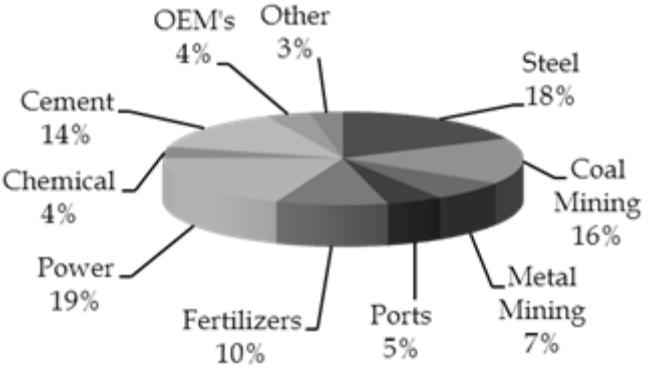


Market Overview:

In India, the use of conveyor belts started post-independence when belts were mostly imported from European countries. During the initial days, conveyor belts were mostly used in mining operation by leading miners including Neyveli Lignite Corporation, NMDC, amongst others & also in the cement sector.

Industry segment wise Demand break up

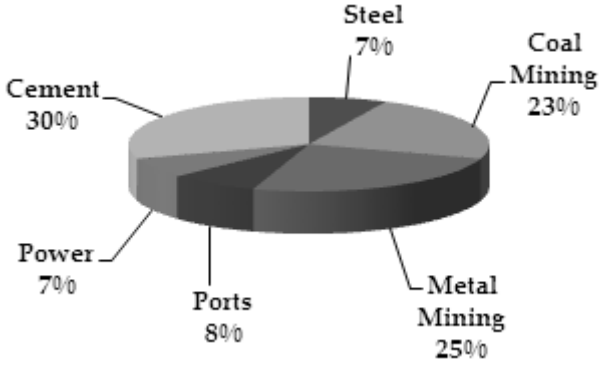
Demand break up of textile conveyor belts



Source: A C Nielson study

Traditionally, demand for textile conveyor belts are largely generated by steel, power & cement industry other than mining. However, it is finding acceptance and widening its react to newer industries like food processing, sugar, wood and paper pulp, waste management, to name a few.

Demand break up of steel cord conveyor belts



Source: A C Nielson study

Accordingly to a study conducted by AC Nielson, approximately, around 48% of steel cord conveyor belt demand is estimated to have been generated by the metal and coal mining industry; interestingly, cement industry is looking into putting more emphasis on steel cord belts for its quarrying operations with 30 % of usage.

Leading users of conveyor belts in India:

Major Users of Conveyor Belt
Steel Plant (SAIL, Tata Steel, Essar Steel, Bhushan Power & Steel)
Coal (Bharat Coking Coal, NCLSingrauli, Central Coalfields ltd, Singareni Collieries)
Mining (Met al) (Indian Rare Earths Ltd ., KIOCL Ltd. , Manganese Ore (Indi a) Ltd ., National Aluminium Co. Ltd , NMDC
Ltd . -,Hindustan Copper Ltd., Bisra Limestone Company Limited)
Ports (Paradeep Port Trust, Mumbai Port Trust, JNPT, Mormugaon Port Trust, Vi shakhapatnam Port Trust,
krishnapatnam Port, Gangavaram Port, Dhamra Port, Kandla Port, Mundra Port - Adani)
Fertilizers (Rashtriya Chemicals and Fertilizers Ltd, National Fertilizers Ltd., Hindustan Fertilizer Corporation Ltd,
Fert ilizersand Chemicals (Travancore) Ltd., Shriram Fertilizers)
Power Plants (NTPC, Tata Power , Damodar Valley Corporation , CESC., JindalWBPDCL)
Chemical Plants (Hindustan Organic Chemicals Ltd, Hindustan Insecticides Ltd., Paradeep Phosphate Ltd, Tata Chemicals
Ltd ., Durgapur Chemic als Ltd)
Cement Plants (ACC, Ambuja , Lafarge, Ultratech, Birla Cement , Binani, JKcement , Jaypee , Madras Cement)
Automobile OEMs (Maruti Suzuki, Hero Honda , Bajaj, M&M)
Agricultural Equipments Manufacturers (Kartar Agro Industries, Hind Agro Industri es, New Hira Farm Equipments)
Tyre Manufacturers (MRF, Ceat , JKTyre, Apollo)
Paper manufacturers (BILT, Emami Paper" Hindustan Paper)
OEM's (McNally Bharat, L&T, BHEL-ISG Bangalore, Elecon,)

Usual product specifications as per industry requirement:

	Cement	Power	Steel	Coal Mining	Metal MIning
Type of conveyor belts used	Textile conveyor belts	Textile and steel cord	Steel Cord	Textile and steel cord	Textile conveyor belts
Width of the belt (in MM)	600 - 2000	Steel cord 1600 - 2000 Textile 1000 - 1200	1500 - 2400	1000 -2000	1000
Potyester Fabric	Nylon rough top	Nylon	Rubber	Rubber	Nylon
Strength (KNIM)	600 - 1200	Steel cord 1780. Textile 800-2000	1000 - 1600	1600 - 2000	1500 -2000
No of pty	4 to 6	4	4 to 6	4	4
Width of top rubber cover (in MM)	3	Steel cord : 6, Textile : 5	14	Steel cofd : 6 Textile : 8	3
Width of bottom rubber cover (in MM)	1.5	Steel cord : 6, Textile : 2	10	Steel cord : 4, Textile : 6	1.5
Grade of rubber cover	M24	M24	DINX	M24	M24
Lenghth Of the belts (Mtrs)	800 - 20000	2000 - 18000	1500 - 4000	4000 - 10000	1000

Market Scenario:

Today the Indian Market is clustered with unorganized players....

Although the conveyor belts industry is here for quite some time now, there was hardly any development till a few years back with only 3-4 major manufacturers. Presently, a host of other players in the unorganized sector have cropped up with small capacities and production volumes making the market more cost competitive. Unfortunately, this has also thrown a new kind of challenge to the market. The second tier manufacturers are clearly more focused on price of the conveyor belt largely compromising the quality. In the short term this has resulted into influencing customers to focus more on cost rather than quality. But with the general awareness improving amongst customer, these marginal manufacturers are finding it more challenging as they are facing increasing pressure to meet quality requirements.

Manufacturers turning into complete solution providers promoting 'One Stop Shop' concept....

In the past few years, almost every other conveyor belt manufacturer has doubled capacity. In fact, some of the conveyor belts manufacturers have taken a step further from just manufacturing conveyor belts to becoming a complete solutions provider. This trend is emerging fast and is likely to become more prominent in the coming years due to increased competition from domestic as well as overseas vendors, especially from China

Replacement market catered to generate regular business

In India, the conveyor belt purchase can be conceptually divided into two baskets, namely replacement demand and project demand.

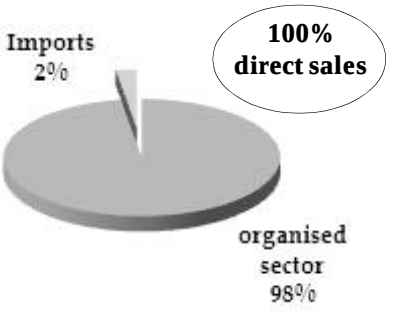
The replacement segment is very critical with a significant share in the total conveyor belt market.

The replacement period ranges from 6 months to 3 years which all depends upon the type & specification of the belt used and part

replacements. The unorganized players are active in this segment (in their mini-skewed share) but are largely absent in the project business segment.

TextIle Vs steel cord belt market dynamics

Textile conveyor belt- Supply breakup



Steel Cord conveyor belt- Supply

Steel cord conveyor belts though occupies a market share of only 7% by volume in length and 15% by weight in MT, has a considerable contribution of 22% by value!

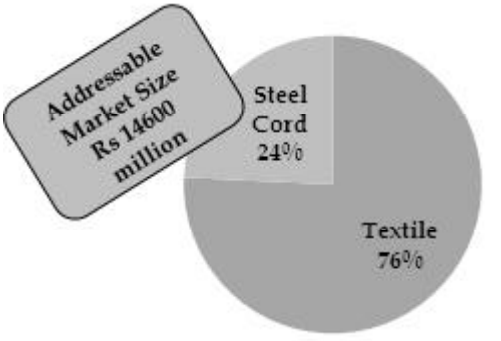
Considerations:

Steel Cord Belt- 1 metre weighs 42.00 kgs

Textile Belt- 1 metre weighs 18.30 kgs.

The domestic textile belt market is estimated @ appx INR 11000 million while steel cord market @ INR 3600 million

In MINR	Textile	Steel cord	Total
2010-11 AC Nielsen	7675	2193	10543
Current	11000	3600	14600



Competitive Landscape:

Share of steel cord conveyor belt market in the domestic scenario is expected to grow in coming years

The domestic conveyor belt market is valued at approximately INR 14600 Million, dominated by textile conveyor belts both by volume and value.

There are 10 major manufacturers of conveyor belts in India along with few unorganized/ regional manufacturers who are catering to the growing demand of conveyor belts in India.

The unorganized sector generally manufactures textile conveyor belts along with few specialized belts (Chevron, Side Wall) also.

However, steel cord conveyor belts are presently manufactured primarily by 2 Indian manufacturer with PHOENIX Conveyor Belt India (P) ltd (part of Germany based PHOENIX Conveyor Belt System AG) being a major player .

However, two other players of Indian origin are also trying to make foray into this segment as well.

Major Manufacturers:

Manufacturer	Inception yr	Plant location	Conventional conveyor belt products
Phoenix Conveyor Belt India Ltd	1979	Kalvani, West Bengal	Textile Convevor Belt, Steel cord Conveyor Belt
Sempertrans Nirlon (P) Limited	1978	Roha, Maharashtra	Textile Conveyor Belt
Oriental Rubber Industries Limited	1949	Pune	Textile Conveyor Belt
MRF	1946	Chennai	Textile Conveyor Belt
Hindustan Rubber (Ravasco)	1979	Maharashtra	Textile Conveyor Belt
Northland	1983	SonePath, Haryana	Textile Conveyor Belt
Anil Rubber	1962	Faridabad, Harvana	Textile Conveyor Belt
NRC Industries	1989	Amritsar, Punjab	Textile Conveyor Belt
Forech	1984	Rai (Haryana), Dhuturi (Haryana), Cheyyar (Tamilnadu)	Textile Conveyor Belt, Steel Cord Conveyor Belt
Jonson Industries	1979	SonePath, Haryana	Textile Conveyer Belt

Source: Industry experts

The industry is currently estimated at approx 5.8 million metre capacity of textile conveyor belt. In 2013-14 it was estimated that 5.02 million metre is the capacity of textile conveyor belt with an average capacity utilization of about 80 %. Earlier estimate stood at 4.53 million metre capacity of textile conveyor belt in 2012 (AC Nielsen study)

Manufacturing Capacities – Textile & Steel Cord Conveyor Belt

Capacity in metre	*Production Capacity 2010-11*	*Production Capacity 2013-14*	*Production Capacity 2015-16 (Estimated)*
Textile	***3567000***	***5025000***	***5815000***
Steel Cord	***240000***	***320000***	***510000***

Source: Internal estimation

Phoenix leads the market for steel cord conveyor belts with market share of around 75% within domestic manufacturers. As per latest available information, of the total consolidated production by the steel cord conveyor belt manufacturers 3-5% is being exported to other countries and remaining is being consumed in the domestic market.

Commercial Details

Basic Price

Steel Cord Conveyor Belts

Cord type 7*7 - 7*19, Belt Width 1200-2400 mm

Rs 5000-25000 (Approx)

Textile Conveyor Belts

Polyster / Polyamide /, Belt Width 1000 -2400 mm, 2-5 ply

Rs1200 to 3000 / meter (Approx)

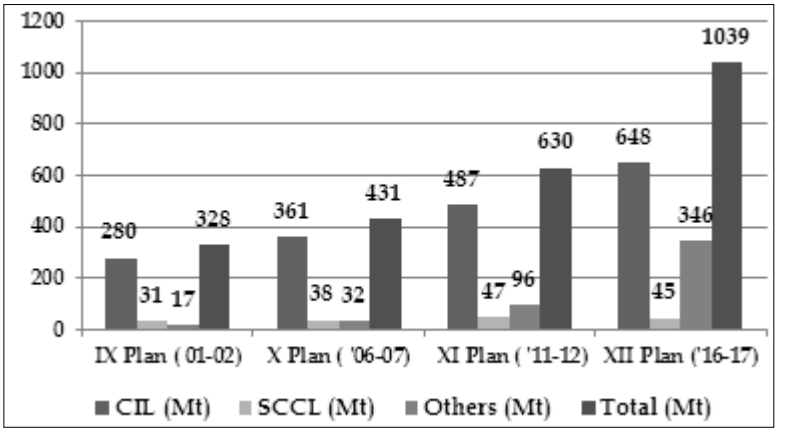
Opportunities for the Conveyor belt Industry

The domestic conveyor belt manufacturers are banking on this high growth in the mining sector as well as other user industries such as port, steel, power, cement, sugar, sponge iron and material handling, food processing etc.

Coal, Steel, Cement - The greatest demand drivers

In the coal sector, the government is targeting huge growth to feed the power sector (75% of power generation is coal based). Coal demand in India is surging as the power companies set up thermal power plants at an astounding rate to triple the power capacity over the next decade.

According to Coal India Limited, the 12th plan estimates a giant leap of 15% growth in the next 5 Years to reach 1039 Mt in 2017 from 431 million tons (mt) in 2010-11



With 167 cement plants and a total installed capacity of around 289 million tons per annum (MTPA), the Indian cement industry is the second largest in the world.

CMA is targeting to achieve 550 MT capacity by 2020.

The steady economic growth likely to support conveyor belt industry

As per the provisional estimates of national income released by Central Statistics Office on 31st

May 2016, the growth rate of Gross Domestic Product (GDP) at constant (2011-12) prices for the year 2015-16 is estimated at 7.6 per cent, as compared to the growth of 7.2 per cent in 2014-15.

Eight core industries registered a growth of 5.2 per cent in June 2016 as compared to a growth of 3.1 per cent in June 2015. During first quarter (April-June) of 2016, core sectors grew by 5.4 per cent as compared to 2.5 per cent growth in the corresponding period of the previous year

Coal production increased by 12.0 per cent in June 2016 as compared to 5.4 per cent growth in June 2015.

Crude oil and natural gas production declined by 4.3 per cent and 4.5 per cent respectively during June 2016.

Fertilizers production achieved a growth of 9.8 per cent in June 2016 as compared to 5.8 per cent in June 2015.

Steel production grew by 2.4 per cent in June 2016 as compared to 4.2 per cent growth in June 2015.

Cement production registered a growth of 10.3 per cent in June 2016 as compared to 2.9 per cent growth in June 2015.

The domestic conveyor belt manufacturers are banking on this high growth in the mining sector as well as other user industries such as steel, ferro alloy, power, cement, sugar, sponge iron and material handling, food processing etc.

Conclusion:

The conveyor belt market has a bright future in India. Although in the recent past the market has seen some several challenges on back drop of global economic meltdown and downturn of commodity cycle, it is already on its path of slow but steady recovery.

In India, production of bulk materials during last few months has seen some rise but that is pretty marginal which is not strong enough yet to excite the mining and industry community to park in a lot of money.

It also needs to be appreciated that volume of bulk material handled alone doesn't determine conveyor belt demand, as it also depends on value realisation of the minerals or materials produced. And in that context, considering the long downturn through which commodity market is passing through, it is but obvious that user companies are closely evaluating their capex / opex and inventory requirement, thereby putting a brake to conveyor belt market's growth across the world.

However, considering the current positive signals coming from the global commodity market, it can be claimed with a reasonable degree of certainty that the domestic commodity market is witnessing a uptick in volume for few month which (if) supported by the very recent price trend will lead to mining, steel and cement giants review their purchase plans once again in a positive way providing a solid boost to the domestic conveyor belt market.

Industrial Prospective on Mini Steel Plant (MSP)

Gopal Krishna Sharan

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The concept of Mini Steel Plant (MSP) started sometime in the year 1970. The shortage of steel in the market due to inadequate supply by major primary steel producer like TISCO and SAIL gave birth to new technology for making steel in Electric Arc Furnace by recycling steel scrap. More than 150 Electric Arc furnaces were installed all over the country with a capacity of around 9 million tones. In the mean time Induction Furnaces of medium Frequency came into existence to produce good quality steel. In fact manufacturing steel through Induction Furnace route was considered to be most popular and India was considered to be highest contributor of steel through this route. Steel Plants used to produce liquid steel by melting scrap of mainly cars and end cuts of steel materials and converted the liquid steel into Ingots of ¾ & 7/8 sizes. These Ingots were supplied to various Rolling Mills for converting into TMT Bars, Wires etc although the cost of such steel making was exorbitantly high but due to inadequate supply by the primary steel producers and because of the shortage of steel in the market, it could survive for many years.

Large capacity Electric Arc Furnaces were invented and got commissioned in the year after 1980, which not only saved electricity due to by purging of oxygen into the furnace but in conjunction with ladle refining furnaces, could boast to produce Alloy Steel and Stainless steel conforming to National and International Standards.

After the industrial revolution in the year in the year 1980 most of the companies started finding out innovative methods to reduce cost of making steel and maximize their production as the cost of input such as scrap etc were so expensive that Steel making became uneconomical by the Mini Plants. The primary producers also added capacities in their plant to meet the market demand. The revolutionary invention of the process of manufacturing Sponge Iron (Direct Reduced Iron) acted as a breather to many Mini Plants (MSPs). They started producing liquid steel with the input of Sponge Iron and Scrap. This reduced the cost substantially. Availability of Iron Ore, Coal, Dolomite and other raw material required for steel making since available is abundance, Mini Steel Plants (MSPs) mushroomed in the country. Mini Blast Furnace up to a minimum of 50 cubic capacities (producing around 50 MT Per Day of crude liquid steel), Palletisation Plant, Sinter plants, Ferro Alloys Plants were added in Mini Steel Plants (MSPs). The byproduct gas emanating from DRI (Sponge Iron Plant) were used to generate electricity thereby not only save cost but made the companies self reliant on the availability of power. Hence all the Mini Plants added facilities by backward and forwarded integration and converted all their Mini Steel Plants (MSPs) into an Integrated Steel Plants (ISPs). The capacity ranged from 50000 Metric Ton to 300000 Metric Ton. These Integrated Steel Plants (ISPs) became a blessing for the Indian economy as the catered to sector specific market. Integrated Steel Plants (ISPs) *manufactures* which catered to mostly construction steel for local needs and confined to local areas readied to meet challenges of supplying high quality and high

grades for Automobile and forging industries but more sophisticated industry in the Defense and Space Sector. Integrated Minis Steel plants are also the largest exporters of Ferro alloys to Europe, Middle east and far East countries competing with mainly China, Australia, Brazil and Malaysia and construction steel materials to under developed countries like Bangladesh, Nepal and many others.

The capacity of the ISPs for quick maneuverability in terms of quality, quantity, cost and accessibility has made the proposition of its existence justified in the present and future economic scenario.

Comparatively with all the productivity tools which are being adopted by these Integrated Steel Plants are at par with their primary producers and therefore price wise there has been very little difference in the similar product range. Though Primary producers have the advantage of larger capacity utilization to produce steel at much cheaper cost and also because of control over the raw materials, the current Government policy on auctioning of important raw materials such as coal, iron Ore and manganese have given these integrated steel plants level playing field with their primary producers. However, the primary producers have better control and research facility over other small integrated plants; hence these plants are more into high value steel making which were being imported earlier. Therefore given the demand projection of 300 Million ton of steel by 2025 with increased per capita consumption, Integrated Steel Plants have very bright future in days to come The Integrated Steel Plants will have to fulfill the gap and meet the challenge.

Case Study

Case Study

Debaprasad Chattopadhyay *
Sumaira Khan **

Spiritual Motivation in Management: A Case Study on how Spirituality in Management can be used by a health-care provider***

"SGCC&RI - A big leap in the service to Mankind"

Dr.(Prof.)Debaprasad Chattopadhyay

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Ms.Sumaira Khan, Research Associate, Globsyn Knowledge Foundation, Kolkata

Abstract

"We say to all our Cancer patients and their relatives - Welcome Home!"

Organizational spirituality has been gaining acceptance world over. While some authors view spiritual leadership leads to spiritual climate in the workplace as a benefit for both employees and organizations, critical authors opine that this is more a palliative approach towards soothing the employees' minds. While majority of critical studies are based on literature analysis and mainly refer to societal developments and how organizations are affected by them, the paper at hand provides a single case study on the institutional level at a leading cancer-hospital in Kolkata. The case study allows a more detailed examination of how a cancer hospital can employ spirituality to serve institutional goals and achieve patient satisfaction. The focus of this study is to provide some of the initial foundation work for the broader empirical framework on how spiritual leaders influence followers to co-create a spiritual climate. We argue that leaders' reputation as a spiritual leader is a strong mediating factor of spiritual climate. Here, we draw from spirituality in management, positive organizational behavior, emotion, identification, and identity theories to describe the processes by which spiritual leaders exert their influence on team climate.

Keywords: Spirituality, Spiritual Leadership, Spiritual Climate.

Introduction

Organizations must now compete in a boundary less economy with worldwide labor markets that are instantly linked with information. These changes call for new organizations that are more agile. The creation of such a work environment may very well be the strategic imperative of the new millennium. This perspective has been articulated by Whetten and Cameron (1998) who

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*** ***This and all other quotes were retrieved by the authors from SGCC&RI (Saroj Gupta Cancer Center & Research Institute) website.***

We would like to thankDr.Arnab Gupta, Director, SGCC&RI and entire team for their very helpful and all-out cooperation. Additionally, we would like to express our sincere gratitude to Prof.R.C.Bhattacharya,Vice-Chairman, Globsyn Business School, who graciously organized this case-study development.

concluded that "good people management" is more important than all other factors in predicting profitability.

To confront the challenges contemporary organizations need to create work environment that help them attract, keep and motivate a team of high-performing employees. The creation of work environments that provide a sense of challenge and meaningfulness for employees has become a priority. These employee demands have been summarized by Pfeffer (2003) who identifies four fundamental dimensions that people seek in the workplace: "(1) interesting work that permits them to learn, develop, and have a sense of competence and mastery, (2) meaningful work that provides some feeling of purpose, (3) a sense of connection and positive social relations with their coworkers, and (4) the ability to live an integrated life, so that one's work role and other roles are not inherently in conflict and so that a person's work role does not conflict with his or her essential nature and who the person is as a human being" (p.32).

In modern society, pressure and anxiety have become the workplace norm and workers often suffer from alienation and exhaustion at work (Palmer, 1994; Cavanagh, 1999). How individuals within organizations can maintain inner and outer balance is an important issue. The basic entities of existence — the body (physical), the mind (logical / rational thought), the heart (emotions / feelings), and the spirit are like the four corners of a table: the table will be in danger of falling over if one corner is missing (Moxley 2000). King and Nicol (1999) proposed the integration of Carl Jung's and Elliot Jaques's approach in management which will result in a "complete" person in a "complete" environment leading to a heightened level of effectiveness of the individual and the organization. According to King and Nicol (1999) it is important for individuals to connect with the spiritual realm of their lives and complete this area of reality or else they will experience extreme emotions often leading to depression and lack of fulfillment. The upcoming section elaborates on the major streams of research in the field of spirituality in management.

Organizations of today have been witnessing a high rate of attrition (Marques, Dhiman, King, 2010). People join companies with lots of hope and high aspirations. Unfortunately, as time progresses in the wake of their on-boarding, employees get disillusioned (Marques, et al.,2011). Their expectations are belied and their confidence in companies to provide them employee-satisfaction, let alone, employee-delight, start dwindling. Many start looking for alternate openings elsewhere while others continue to 'get into the rut' and suffer from boredom and frustration. Health issues develop and it is not unusual to come across employees who suffer from bouts of depression and other organic ailments. Psychologists and consultants are roped in to diagnose the problem. After much of probing and interviews with employees, such specialists infer that the organization climate does not provide an enabling or facilitating work-environment (Marques,et al.,2007). Beset with such a finding, organizations feel intrigued and bewildered and start pondering as to what is meant by an enabling or facilitating organization climate. Initial observations reveal that employees are of the opinion that the culture prevailing in the company is not positive.

Culture, as we know, consists of a set of values and beliefs that help to bind and reinforce work groups and communities. Culture, in turn, creates climate. When this is applied to organization-settings, we find, there exists different types of organization-climate. Accordingly, there can be sales climate, innovation climate, safety climate, quality climate and a host of other climates.

The thinking revolves around the notion that the inappropriate organization-climate is one of the

root-cause of various perils at the work place and may act as the trigger for acrimony, conflict, politicking, and ineffective teamwork. So, not only employees are inconvenienced in terms of their quality of work-life in the organization, the organization also suffers because of less productivity and output. It starts losing its competitive advantage and 'bad-mouthing' of discontented employees bedevils the organization's reputation in the society in general and industry in particular (Marques,et al.,2007).

Today people are finding that there's more to life- and business-than profits alone. Money as the single bottom line is increasingly a thing of the past. In a post-Enron world, values and ethics are an urgent concern. The hottest buzz today is about a "triple bottom line," a commitment to "people, planet, profit." Employees and the environment are seen as important as economics (McLaughlin, 2009). Some people would say it's all about bringing spiritual values into one's workplace. A poll by KRC Research for Spirituality published November 17, 2003 in USA Today found that 6 out of 10 people say workplaces would benefit from having a great sense of spirit in their work environment (McLaughlin, 2004).

The term "spirituality" comes from the Latin "spiro", "inspiratio" (breath), with a meaning close to the sanskrit " atma", or the Greek " pneuma" (Lazar, 2004). What is spirituality in business? There's a wide range of important perspectives. Some would say that it's simply embodying their personal values of honesty, integrity, and good quality work (Giacolone, 2004). Others would say it's treating their co-workers and employees in a responsible, caring way. For others, it's participating in spiritual study groups or using prayer, meditation, or intuitive guidance at work ((Marques, et al.,2007). And for some, it's making their business socially responsible in how it impacts the environment, serves the community or helps create a better world (McLaughlin, 2009). Be that as it may, there lies an enigma in what the word "spirituality" relates to, in the work environment.

This compounds the problem in its usage in organization context, more so, to justify the rationale as to how spiritual leadership can foster spiritual climate in an organization.

Foregoing is the statement of the problem that this study aims to address.

Climate regarding ethics and the role of values

Climate regarding ethics

Schneider's (1975) definition of organizational climate as ''psychologically meaningful molar [envi-ronmental] descriptions that people can agree characterize a system's practices and procedures''prevails as one of the most widely accepted definitions (p. 474). In essence, organizational climate pertains to the ''shared perceptions of the way things are around here'' (Reichers and Schneider, 1990, p.22), which become social norms and expectations that guide behavior in a particular setting (Schneider,1983). Organizations have multiple types of climates(Schneider, 1975), addressing different facets of the environment such as safety (Zohar, 1980) and customer service (Schneider and Bowen, 1995).

Victor and Cullen's (1987, 1988) work has been influential in highlighting the notion that organizations have a type of climate pertaining specifically to ethical issues. They define this type of climate as ''the shared perceptions of what is ethically correct behavior and how ethical issues should be handled''(Victor and Cullen, 1987, p. 52). Dickson et al.(2001) refer to this type of climate as climate regarding ethics, noting that the more traditional term ethical climate is

problematic as some may connote that an organization's climate is ''ethical'' within the context of the values of the larger society. While societal values are likely to influence organizational practices, both organizational climate and organizational ethics are, by nature, defined within the context of a particular setting (Nicotera and Cushman, 1992). As such, this aspect of climate provides norms and expectations of behavior that is viewed as ethically acceptable, and helps members determine what issues have an ethical content as well as the criteria that should be used to determine appropriate actions within a particular organization (Cullen et al., 2003).Multiple factors, both internal and external to the organization, are likely to influence members' perceptions of an organization's norms and expectations of ethical conduct; that is its climate regarding ethics. Schneider and Reichers (1983) suggest that organizational climates, in general, emerge via three processes: (a) exposure to objective structural characteristics, (b) attraction–selection–attrition(ASA) processes which result in similar types of people being attracted to, selected by, and retained by organizations (Schneider, 1987), and (c) organizational socialization processes which teach members what is appropriate behavior in a particular setting. Victor and Cullen (1988) add that an organization's socio-cultural environment and specific history also influence the shape of climates for ethics. While all of these factors provide environmental cues regarding ethics, it is the organization's leaders that establish and enact the goals, policies, and practices that provide these environmental cues, and thus play the primary role in the creation of climates related to ethics (Dickson et al., 2001).This process primarily occurs over two periods of time. First, during the early period of an organization's development, the personal values of the founder and other early leaders become embedded in the social fabric of the organization, which provides the environmental context that either sanctions or discourages behavior. Schein (1992) identifies a series of primary and secondary mechanisms through which the values of a leader become embedded in the culture of an organization. Through the primary embedding mechanisms, leaders communicate the core organizational assumptions by establishing criteria for rewards, resources allocation and gaining organizational status which result in an organization's climate. Through the secondary embedding mechanisms, the organization's values are further articulated and reinforced through organizational design, structure, rituals and mission statements. Then, shared perceptions, assumptions, beliefs, and values emerge from the members of the organization as they find ways to successful work together to build the organization. The perceived norms of ethical conduct that become shared are the foundation of the organization's initial climate regarding ethics, and reflect the personal values and ethics held by the founder and the organization's membership.

Second, as the organization becomes larger and more mature, leaders at multiple levels enforce ethical norms that reinforce the organization's ethical value system. As the organization faces new ethical situations, the shared perceptions of expected behavior will be shaped by those practices that are encouraged and rewarded by the organization's leaders, giving rise to new norms of behavior. Thus it is the leaders of the organization who play the dominant role in creating and maintaining climates regarding ethics. And it is the leader's personal values and ethics that are embedded in and shape the emerging climate regarding ethics, as well as the climate that is maintained.

Values

Values have an important influence on organizational behavior (cf. Meglino and Ravlin, 1998),including organizational ethics (Keeney, 1994).Values are relatively stable beliefs that certain modes of behavior (instrumental values) or end-states (terminal values) are desirable (Meglino and Ravlin,1998; Rokeach, 1973). They influence behavioral choices as people are motivated to act in a manner that is consistent with those things that are valued(Locke, 1991; McClelland, 1985; Rokeach, 1973).Schwartz (1994) provides four useful perspectives on the origin and usefulness of values, and how they are aligned with behavior. First, values are cognitive structures which support the interests of some element of the social environment. Second, values motivate behavior by providing direction and emotional intensity to action. Third, values are standards to judge and justify action. And finally, values are acquired both through socialization activities and an individual's unique experiences.

Values operate at multiple levels – societal, organizational, and personal – to influence organizational behavior. We suggest that the values of the organization, its leaders, and its members play important roles in shaping the organization's climate regarding ethics.

Organizational values

A discussion of values at the organizational level suggests a shift in focus from organizational climate to organizational culture. While both constructs are similar, climate may be viewed as how things are,while culture refers to why things are as they are (Kopelman et al., 1990). Organizational values have been a primary focus of much research on organizational culture as they prompt behaviors that facilitate efficient interactions between individuals leading to organizational survival and prosperity (Meglino and Ravlin, 1998; Schein, 1992), and are perhaps the deepest layer of culture that can be studied quantitatively (Rousseau, 1990).An organization's ethical values are routed in that organization's value system, and an ''action can be judged as ethical if it upholds the value system of that organization'' (Nicotera and Cushman,1992, p. 440). Sinclair (1993) suggests that organizational culture is the ultimate source of ethical and unethical behavior, while Cullen et al. (2003)suggest that climates related to ethics are an extension of an organization's culture. Actions that are considered ''just'' and ''right'' are part of the organization's basic ethical assumptions (Gottlieb and Sanzgiri, 1996). Cultural values regarding ethical issues establish and give priority to modes of behavior that are specific to that organization(Stoner, 1989), and become enacted by the climate regarding ethics.

Leader values

Addressing problems that have an ethical content is an inherent responsibility of organizational leaders. Ethical leadership involves the integration of personal values and the needs of the social system in the development of an ethical framework (Gottlieb and Sanzgiri, 1996). Thus leader values likely have a direct effect on shaping the direction of the organization's climate regarding ethics through this integration. It is important for leaders to have awareness of personal values, ethics and morals as they influence the choices they make and the behaviors in which they engage. Leaders whose personal ethics and values are not supportive of the organization's values will likely convey less importance of these values to the organization's members.

Non-leader values

While values are enduring personal characteristics, they are acquired through a process of social analysis (Rokeach, 1973), and may change somewhat over time due to the influences of social factors. Values are stable enough to reflect continuity of beliefs and

behaviors within a specific culture or society, ''yet unstable enough to permit rearrangements of values priorities as a result of changes in culture, society, and personal experiences'' (Rokeach, 1973, p. 11). People develop value hierarchies through a cognitive social comparison process (Rokeach and Ball-Rokeach,1989). Those values that are emphasized reflect interpretations of socially accepted modes of conduct or desired needs (Kluckhohn, 1951; Rokeach, 1973; Williams, 1968).Once acquired, values determine what is and what is not personally rewarding (Locke, 1991), which influences the intention to act (McClelland, 1985).Individuals have been shown to experience some rearrangement of individual value systems by understanding and accepting the values of a particular organization (Cable and Parson, 2001; Chat-man, 1991). The values that people emphasize influence the actions they engage. It is based upon overview of climate and values that we put forward that leaders impact the climate regarding ethics within their organizations.

SGCC&RI (Source: website)

Previously known as Cancer Center Welfare Home & Research Institute, Saroj Gupta Cancer Center and Research Institute(SGCC&RI) is the only Indian Cancer Hospital with a sprawling 16 acres of land with an ecosystem that create an ambiance of care and comfort. The underlying idea of such a landscape is to integrate nature and nurture and provide loving care to ameliorate the anxiety of patients, who come for alleviation from a medical menace called Cancer.

It was in early 1973 that seeing the plight of cancer patients who failed to get even a bed, not to talk about cancer care, Dr Saroj Gupta, then a young Radiotherapist, formed a Society with a group of Doctors, social workers and philanthropists. His mission was to form a Cancer Center for the cancer afflicted patients and their families, with special emphasis on the underprivileged people. At Thakurpukur, on a piece of marshy land donated by the family of Late Chintaharan Das, SAROJ GUPTA CANCER CENTRE & RESEARCH INSTITUTE was initially built to provide a sojourn to the distressed cancer patients who came from all nooks and corner for treatment of cancer. No one ever thought that the-then little known Thakurpukur would be an internationally known place. The first fund-raising event was a drama staged by a group called "Sikha", based on a story written by Dr Saroj Gupta, where he himself enacted the role of a poor cancer patient who was denied a bed in the city hospital. Tears rolled down the cheeks of all those who were present there by the touching fact that there was no place for a little body of him in a big city with tall buildings and big hospitals, although he had traveled all the way from a remote village with a strong desire to live. Many in the audience became a part of the Society and joined hands with Dr Gupta to help him with his fight against Cancer.

Over a period of 3 decades, with astounding help from all walks of life starting from poorest of the poor and school children to different Industrialists and celebrities, the hospital now has become a fully comprehensive, 280 bedded dedicated cancer hospital, now rechristened as SAROJ GUPTA CANCER CENTRE & RESEARCH INSTITUTE. Set in a wonderful ambiance spread on sprawling 16 acres of land with lush green lawns, water bodies, hillocks, Amusement park, Toy train, patients get the vital dose of energy and solace in between toxic chemo-therapies or painful surgeries. The institute has kept pace with science and technology, and continuous up-gradations have been done. Thus the latest Diagnostic facilities and Radiotherapy machines, Surgical gadgets for all kinds of complicated surgeries are now available in specially designed Units. All these facilities are available at prices affordable to all classes of people. This Institute is a recipient of many National and International acclaims and is recognized by WHO and a member of UICC, the International Organization against Cancer.

Methodology /Data Collection Method: Sampling

- The target population comprised of cancer patients, both males and females, their respective relatives in SGCC&RI.
- A random sample of 200 respondents were surveyed.
- In most of the cases, initially the subject was requested to sit comfortably in a calm and cool room, post-discharge.
- Rapport established with the subject so that the subject was free from any doubts or uncertainties about the survey.
- Next the questionnaire administered in person.
- Standard instructions to fill up the questionnaire given.
- Once she/he had answered all the questions, the questionnaires collected back and feedback analyzed.

Results

To analyze the impact of ethical environment on good governance at Saroj Gupta Cancer Center and Research Institute (SGCC & RI), the parameters were divided into six main types as follows:

- Behavior of the Nursing Staff
- Behavior of the Ward Boy/Female attendants
- Behavior of Doctors
- Quality of food
- Cleanliness
- Atmosphere of the Hospital

A random sample survey was conducted, where 200 patients/relatives were requested to share their personal experiences as per the above six categories. The results were as follows

	Poor	Fair	Good	Excellent
Behavior of the nursing staff	0	3	84	113
Behavior of the Ward Boy/Female attendants	1	5	106	86
Behavior of Doctors	1	2	75	122
Quality of food	1	10	103	86
Cleanliness	1	3	102	94
Atmosphere of the Hospital	1	3	86	101

Each category has been analyzed to understand expectation of the patients towards SGCC & RI and are ranked as poor, fair, good and excellent. They are then converted in bar diagrams for quicker interpretation.

1. Behavior of the Nursing Staff

Poor	0
Fair	3
Good	84
Excellent	113

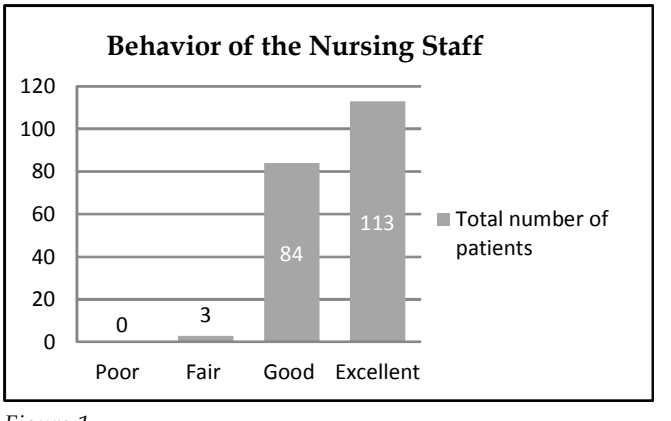

Figure 1.

In Figure 1, the x axis represents the classification of the behavior of the nursing staff and y axis represents the number of patients. There is no one who has ranked the behavior of nurses as poor, 3 people consider it fair, whereas 113 consider it to be excellent.

2. Behavior of the Ward Boy/Female attendants

Poor	1
Fair	6
Good	106
Excellent	86

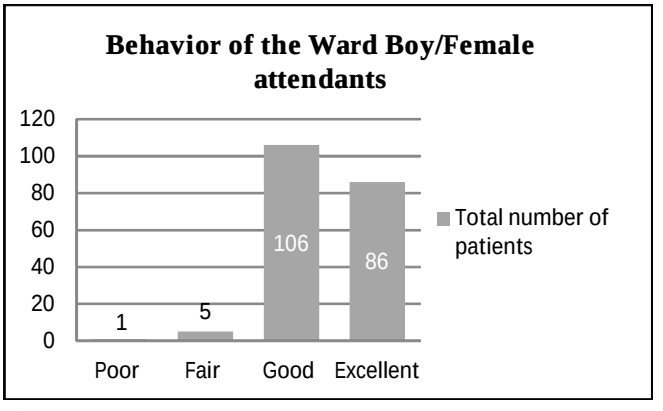

Figure 2.

In Figure 2, the x axis represents the classification of the behavior of the Ward Boy/ Female attendants and y axis represents the number of patients. 1 patient finds the behavior as poor, 5 find it fair, 106 consider it to be good and 86 excellent.

3. Behavior of Doctors

Poor	1
Fair	2
Good	75
Excellent	122

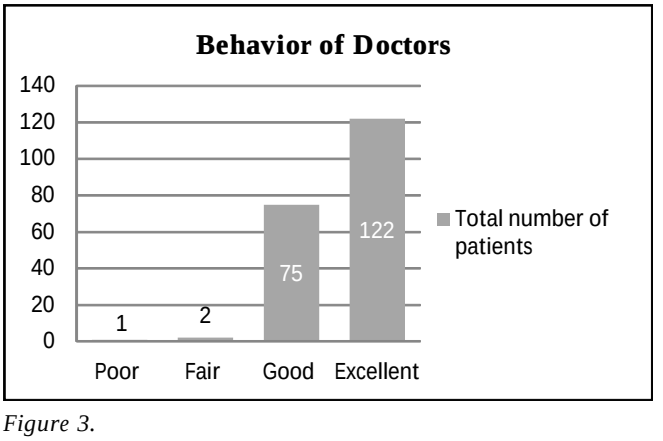

Figure 3.

In Figure 3, the x axis represents the classification of the behavior of the doctors and y axis represents the number of patients. 1 patient finds the behavior as poor, 2 find it fair, 75 consider it to be good and 122 excellent.

4. Quality of food

Poor	1
Fair	10
Good	103
Excellent	86

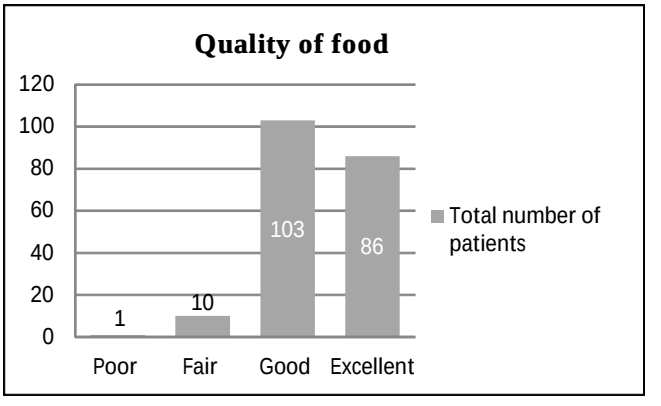

Figure 4.

In Figure 4, the x axis represents the classification of the quality of food and y axis represents the number of patients. 1 patient finds the food quality to be poor, 10 find it fair, 103 consider it to be good and 86 excellent.

5. Cleanliness

Poor	1
Fair	3
Good	102
Excellent	94

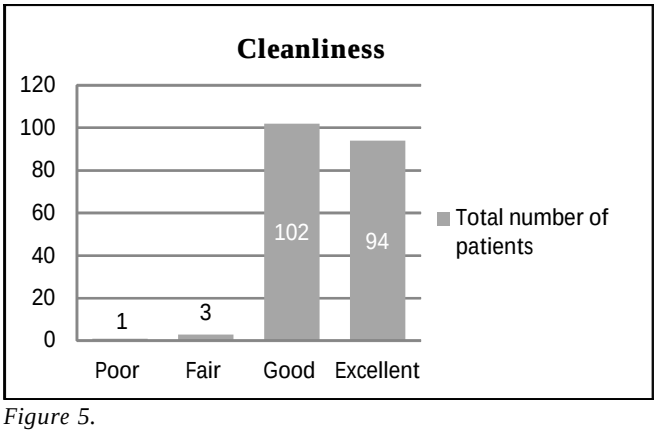

Figure 5.

In Figure 5, the x axis represents the classification of cleanliness and y axis represents the number of patients. 1 patient finds the hospital unclean, 3 find it fairly clean, 102 consider it to be good in terms of cleanliness and 94 are extremely satisfied and find the hospital to be very clean as they found it excellent.

6. Atmosphere of the hospital

Poor	1
Fair	3
Good	86
Excellent	101

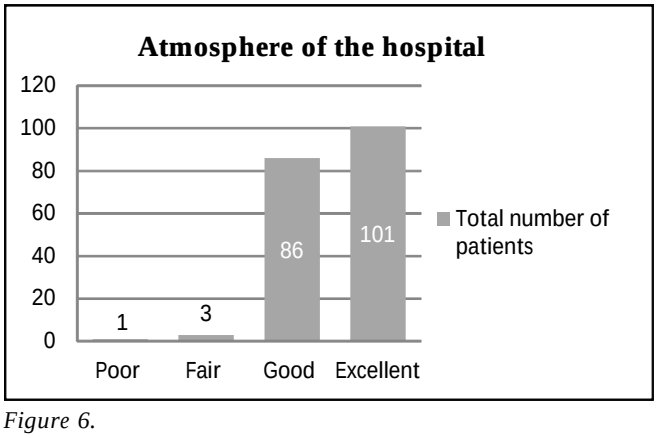

Figure 6.

In Figure 6, the x axis represents the classification of atmosphere of the hospital and y axis represents the number of patients. 1 patient does not find the hospital atmosphere to be good, 3 find it fair, 86 consider it to be good and 101 find it excellent.

Overall :

If we do an average for all the categories we see that approximately 46 % of the patients find SGCC& RI to be good in all the domain and 50 % find it to be excellent. Around 96 % of the total respondents find the hospital to be either good or excellent.

Interpretation of Results

Evidently, the results bear testimony to the fact that SGCCRI is a service-provider, in the health-care sector, of a very high order. The care taken by various personnel in this institution has been ranked appreciably significant by the patients/ relatives. Doctors are compassionate towards patients, paramedical and service-staff have been congenial to patients. Quality of food, cleanliness and hygiene, atmosphere of the hospital deserve praise. This is spiritual environment which we refer to, in our present case-study. Altruistic and selfless-service rendered by all concerned is the key to its success in winning over the 'hearts and minds' of patients and their kin. Evidently, foregoing would not have been feasible had spiritual motivation been not rendered by Management. The facts and figures favorably point to the quality and style of leadership of SGCCRI. The treatment meted out to patients at SGCCRI by doctors and paramedical staff have been consistently rated to be high. Atmosphere of the hospital was very much enabling to foster a conducive ambiance.

Discussion

Effective leadership, therefore, is essentially about showing the way and helping or inducing others to pursue it (Gill 2011: 9). Spiritual leadership concerns creating or providing meaning, purpose and value to others in what they seek and do by ensuring appropriate environmental conditions, displaying behavior, and articulating messages

that reflect their needs and wishes. Meaning, purpose and value come from a sense of shared vision of an attractive future, a shared purpose, and shared values and beliefs — three core characteristics of effective leadership (Gill 2011). Our study at SGCCRI revealed these notions being put to practice.

Spiritual leadership takes followers beyond mere self-interest. It is associated with integrity, independence and justice, says Gilbert Fairholm (1996). He suggests that the foundation for spiritual leadership is morality, stewardship and community. Spiritual leadership is about identifying and affirming shared core values, beliefs and ethics; a shared vision and a shared purpose that have meaning for everybody; meaningful work; empowering people; and stewardship — holding the community's, and indeed the world's, resources in trust. In several instances, we witnessed that SGCCRI rose above the mere call of duty to display selfless service.

Spiritual leadership is about creating meaning and value for people, in work life, family life or community life. A high-SQ leader is likely to be a servant leader: 'bringing higher vision and value to others ... a person who inspires others' (Zohar and Marshall 2001: 16). Spiritual intelligence does not merely reflect existing values: it leads to new values, which may be highly desirable for fostering a spiritual climate. While we studied SGCCRI environment, we found a spiritual climate in place.

Purpose, according to Ratan Tata, Chairman of the Tata Group, is 'a spiritual and moral call to action; it is what a person or company stands for' (Tata et al. 2013). The instrumental argument for purpose is as follows: when a purpose exists, it provides employees with a clear sense of what needs to be done, helps them prioritize their tasks, and inspires them to 'go the extra mile', which should ultimately help to increase profits (Birkinshaw, Foss and Lindenberg,2014). SGCCRI have been instrumental in coming to the aid of needy patients by subsidizing treatment costs.

Research at Regent University in the USA found that managers in local government who displayed greater servant leadership and spiritual intelligence also reported lower levels of stress and higher levels of workforce engagement with their jobs and organization (Roberts 2013). There is also a relationship between spirituality and employee absenteeism, productivity, turnover, ethicality, stress, and well-being, according to another study (Giacalone and Jurkiewicz 2003). SGCCRI Management amply demonstrated servant leadership in their day-to-day operations.

Spiritual leadership may serve both an organization's needs for effectiveness, however measured, and employees' psychological needs (Steger 2012: 232). In serving employees' needs, it should be understood that no form of effective moral leadership coerces people to change or compromise deeply held personal values and beliefs. Rather, true spiritual leadership enables employees to find meaning, purpose, value and a sense of worth in their work as a contribution to their well-being and happiness in their lives as a whole. Success and happiness may meet in the workplace through spiritual leadership. Achieving that is the spiritual challenge for leadership today. It was heartening to note that SGCCRI have been effectively meeting such challenge.

The following recommendations will further bolster the service-delivery at SGCCRI:

- Giving a training program to the key employees about a shared Belief in Spirituality in Workplace
- Tie-ups with large companies to create

blocks/structural-buildings in their names withing SGCCRI compound where treatment to cancer patients are sponsored by such companies. This is a revenue model and will augur well both for SGCCRI and its patients. The sponsoring companies will also benefit through respective brand-building

- Policies to ensure full disclosure of information about appropriate treatment options to patients
- A mechanism to coordinate services
- Psycho-social support services
- Identify financial and other resources needed to improve the cancer data system to achieve quality-related goals; and
- Develop strategies to improve data available on the quality of cancer care.
- Create a feeling that SGCCRI respected patients, listened to them, and advocated on their behalf

Conclusion:

Spirituality in the workplace therefore is fast gaining ground. This concept of Spirituality in Management is not only important to provide motivation to employees but also germane with regard to improved quality of work life, reduced attrition-rate, bolstering total employee involvement and creating all-round happiness. When this happens, elements like customer satisfaction and other parameters also enhance. Organizational Citizenship Behavior improves leading to sustainability and growth. The present case-study at SGCCRI indicates that this institution does symbolize Spiritual Motivation in Management. People who come here experience this aura and eventually reminisce the wonderful treatment that was meted out to them. The subject, Spirituality in Management, hence, holds out ample promise for further study in organizations in various sectors.

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Book Review

Case Study

Effective Business Solutions With Big Data Analytics: Key for Business Growth

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Abstract

Over the years in the world of business, decision making has become a very complex process.

The data in the business environment has no bound and growing years after years at a rapid speed, in various forms due to end to end accumulation of business information. It has become the primary challenge with these business entities to formulate different task and procedures to tackle such huge amount of data. It is not only about accessing the new data sources, making transactions and collecting information but proper analysis of data and the relationship that they form among themselves is to be seen. This is where big data comes to provide effective solution to complex business issues. This paper focuses on the role of big data analytics and its application in business decision making. This business decision making may happen at the operational, tactical or strategic level. Proper integration of big data with other frameworks has been studied and we will put an insight into its future prospects. The business units across industries are now looking ahead to redefine their operational processes. But to be operationally effective and to make day to day operations efficient, the data handling processes must be altered. And such processes can only be improved with proper integration of business methodology and analytical tools. As the data volume is huge and the variety is unlimited. It is the shift in thinking of organizations in terms of changing technology. Now the time has come to do away with the traditional dashboard reporting system that comes mainly from data warehouse. Now any forecasting or financial planning cannot be done merely on the basis such traditional tools. Because we know how the pattern of data is changing years after years. Or even if we say for the sake of predictive modelling, data handling is a big issue to deal with. It is about the right mix of analytical tools to address organizational issues. It all goes with proper big data processing techniques. This is how the whole big data management shows the path towards process improvement. However, every process improvement is prone to replication so it always relies with differentiation of big data management techniques. The primary focus of this paper is to examine how established organizations are making their way to analytical tools that can handle enormous amount of Big Data critical to the business sustainability.

Keywords: Big Data Analytics, Data Warehouse, Unstructured Data, Data Analysis, Operations.

Introduction

When the volume and variety of structured or unstructured data increases so that it questions the ability of the IT system to operate on than that

data is termed as big data. Many organizations have analytical tools in place to handle large quantities of data but as the volume and flow of data increases the intelligent action on such data becomes difficult. Earlier it was data warehouse where data was loaded for processing. Now as the volume of data increases day by day and the speed at which they arrive, it has become difficult to manage such large quantities of data. This is where we get to know software techniques to manage this enormous quantity of data.

Big data analytics can be termed as the process that examines very large data sets containing various data types (which itself is big data), that uncovers the hidden pattern, relations among the data, market movement, market trend analysis, customer orientation and all other significant business information. After processing of such data on the basis of outcome the business takes certain vital decisions which helps to generate revenues, provide better customer service, enhances the marketing function and gaining competitive advantages over the rivals. So based on this certain decisions are taken at operational, tactical and strategic level. Overall it makes the organization grows faster. With the help of big data analytics now organizations are able to take more informed decisions. Earlier it was data warehouse where the data resides and that analytical data was analyzed by using tools like OBIEE (Oracle business Intelligence). The data within data warehouse comes mainly from the business transactions recorded in the transaction processing system. Companies have now shifted their focus from traditional dashboard reporting to forecasting and financial planning. Now organizations undergo what if analysis and gets the benefit out of big data analytics. It has become possible that today with the help of analytical data processing the response time has been reduced considerably. It was not so in earlier days. Now data analysts can expect to fetch data within a few minutes. This is the speed at which data arrives. The variation among the data has changed a lot. One set of data is forming one type a pattern and another type of clustered data is forming different pattern. It is very necessary to identify what actually the pattern they form among themselves. So in all the organizations require high performance analytical tools to process extremely large volume of data that business has collected for analysis. It is to be noted that every day around 3 quintillion bytes of data is generated and this figure is doubling every 2.5 years. The accumulation of this data is not only from internet but also from various other sources. We can say social networking sites and e-commerce industry are one of the biggest sources of big data generation. Analyzing this big data may be a cumbersome task but becomes easier with the proper use of analytical tools. There are various statistical techniques to draw an inference over big data. Hadoop is one of the cloud based tools that store and processes big data. We will explore later on how Hadoop came up with solutions for big data analytics.

Techniques Used In Analysing Big Data

There can be many techniques involved in big data analysis that are applicable across the industries. Here some of the major techniques are discussed. However this is not an exhaustive list but is widely used in industry.

- Regression Analysis- This process tells us the relationship among the two variables. One is the dependent variable and the other is independent variable. It determines how the value of dependent variable changes for different values of independent variable. It is majorly used for prediction and forecasting. Regression analysis is help in many ways. Below are some of the points.

- It increases the level of customer satisfaction by affecting overall customer loyalty.
- Predicting number of purchase made by customers.
- Knowing the relationship between wait time of callers and number of complaints in a call centre.
- In insurance industry it is used to estimate the number of policy holders needs to be insured.

- Social Network Analysis- Basically social network analysis establishes relationships among the individuals or organizations referred to as nodes within a specific network. The relationships are also called ties which can be of many forms results in a complex graphical structure. Social network analysis has shifted its focus to an analytical approach from the conventional suggestive model. Below are the uses of social network analysis.
  - Identifies the relationship among people of different populations and how they are well tied.
  - To determine the influence of a particular node within a network.
  - Understanding the base of customers for an organization and its social structure.
  - To determine the most efficient way to establish connection between two individuals.
  - Evaluates how much value an individual can expect to receive from social networks.
- Machine Learning- Machine learning is one of the data analysis method which helps in building the analytical model. It has been derived from artificial intelligence theory and has its root in pattern recognition and computational learning. We can consider a case where human speech is converted into ASCII text. It is done by developing algorithms and machine learning makes it possible to analyze large set of human utterance collected from different sets of people. Three major machine learning tasks are supervised learning, unsupervised learning, reinforcement learning. Data mining which is often confused with machine learning is unsupervised learning. Machine learning has many applications in diverse domains. Below are some of the points.
  - Developed systems for speech and handwriting recognition.
  - Analysis of past sales data by retail companies helps in learning customer behaviour and enhances sales.
  - Prediction of customer's credit risk by financial institutions.
  - Medical diagnosis in healthcare industry.
  - Optimization, controlling service delivery.
- Genetic Algorithm- Genetic algorithm is a process based on artificial intelligence. It includes theory of evolution and natural selection. Here individuals represented by chromosomes go through the process of evolution. It is applied in game theory to find non-zero sums. In the prison's dilemma it is used to determine any possibility of cooperative behaviour. Use and application of genetic algorithm is mentioned below.
  - Scheduling of doctors in emergency cases.
  - Inspection and repair of pipelines and oil tanks.

- Design of industrial equipments and high end trading systems.

- Classification Tree Analysis- In this technique analysis is done on a finite set of values within a target variable. It works on a tree model where leaves represent class labels and branches show the conjunctions between the labels. Below are the uses of classification tree analysis.
  - Assigning of documents to different categories.
  - Profiling of students taking online courses.

- Association Rule Learning- It is one the techniques to find interesting relationships between variables hidden among large data sets. This method is widely applicable to various domains such as market basket data, bioinformatics, medical diagnosis and Earth science data. In case of earth science data this rule identifies interesting relationship atmospheric processes, land and ocean. So it helps the Earth scientist to understand that how different elements of Earth are related. Below are some of the uses of association rule learning.
  - Extracting information from web log servers for number of visitors to a website.
  - Analysis of bioinformatics data to reveal new relationships.
  - Placing related products close to each other for better sales.
  - Monitoring system logs for any illegal activities.

- Sentiment Analysis- Sentiment is the opinion, feeling directed towards something without any proof or certainty. Sentiment analysis determines which words carry a positive or negative meaning with respect to a person or place. It has applications across various domains like business intelligence, policy making, politics, sociology etc. Some of the uses of sentimental analysis are mentioned below.
  - Taking opinions of voters and analyzing them
  - Customers reactions about blogs, tweets on social media
  - Reviewing guest comments to improve hotel services

Popular Tools – Working With Big Data Made Easy

Working with big data can be a challenging task if we don't know the exact tools to analyze it. There are numerous big data tools available in the market. Some of the key compatible tools are discussed here.

- Hadoop- An open source framework that stores and process data within a distributed environment. Apache Hadoop was written in Java platform. Hadoop has two components known as HDFS(Hadoop Distribution File System) and MapReduce. HDFS stores massive amount of data and MapReduce is responsible for processing that data. Hadoop is considered of one the best platform for big data analysis.

- Tableau- Tableau is a BI tool that focuses primarily on data visualization. It works on both structured as well as unstructured data. The components of tableau are Tableau Server, Tableau Desktop, Tableau Online Tableau Public and Tableau Reader.

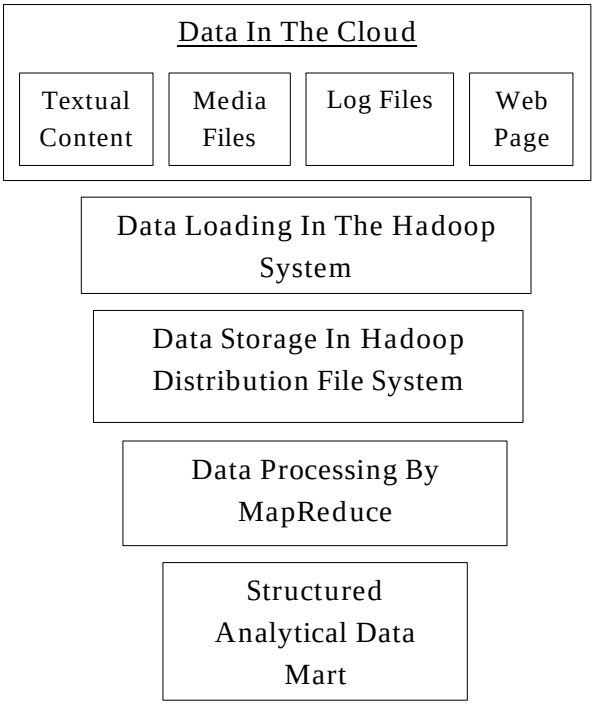
- Cloudera- A cloud based tool with more enhanced features. This tool is a value addition to Hadoop. It has enterprise data hub that provides efficient data

management. This is where all the data is stored. Cloudera is one of the most reliable tools to process big data.

- SAS- This packaged tool provide data mining solutions to complex business problems. It is highly effective to perform data analysis on structured as well as on unstructured data. That data may come from data warehouse or HDFS or even a simple flat file.
- Python- Python is basically a programming language that supports big data analytics. Python can easily be integrated with HDFS. Python has more data manipulation capabilities then conventional languages like Java or C++. It is widely used in the industry for business data analysis.
- R- It is a platform on which statistical functions can operate supported by many operating systems. As it is free to use and perform efficient data analysis so business organizations relies on this packaged software for their business decision making.

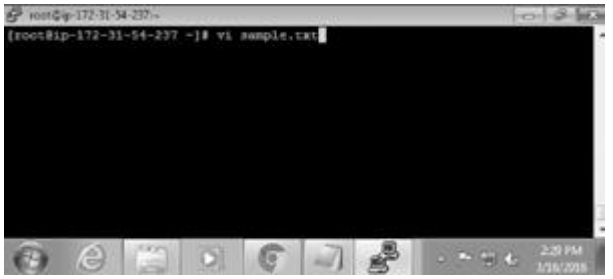
Integration Of Big Data With Hadoop - Data Analysis And Processing

Now coming back to Hadoop, it can be considered as the new age technology to process our present data scenario related to different domains. Be it social media, banking Industry or even hospitals. Data has changed its structure a lot, which was not so about 15 years back. Today the data sets do not have any pre-defined schemas. Be it semi-structured or unstructured, huge amount of data is available from various data sources. Now the challenge lies in parsing those data first and secondly perform analytical activities on those set of data that can result in meaningful business outcome. This is where Hadoop finds itself to hit on big data. This framework has nicely placed itself to deal with the big data. It is the efficient role played by the Hadoop Distribution File System (HDFS) that supports data storage. Once the data is available in HDFS it is processed with the help of MapReduce component of Hadoop. Once the data is processed it becomes structured and is stored into analytical data mart. We must remember that Hadoop is not a database like Oracle where we can write and execute queries but simply an open source framework that is capable of handing large amount of data. Which means pull the unstructured or semi-structured data from cloud, perform data loading, store and finally process it to gain some meaningful insight that helps in business decision making. Below is a basic flow diagram that depicts the data flow in and around Hadoop framework.



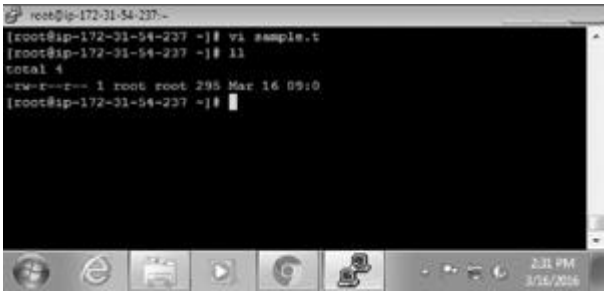
Working of Hadoop in real Environment

- *Create a sample file in root directory*

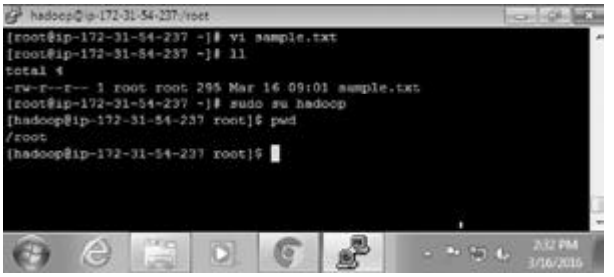


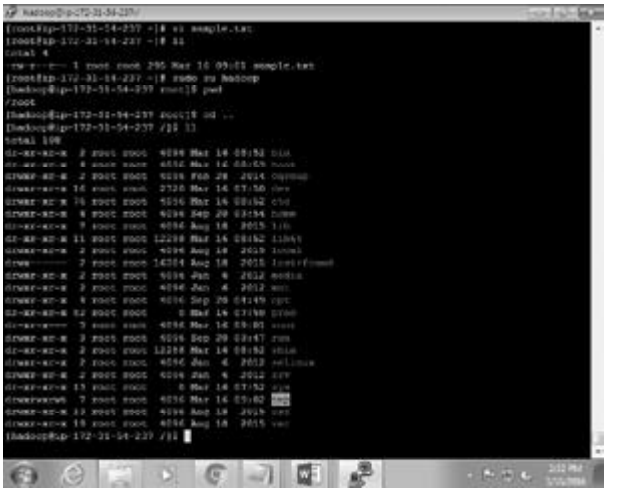
- *Enter some data in it and save it*

- *Viewing that file*



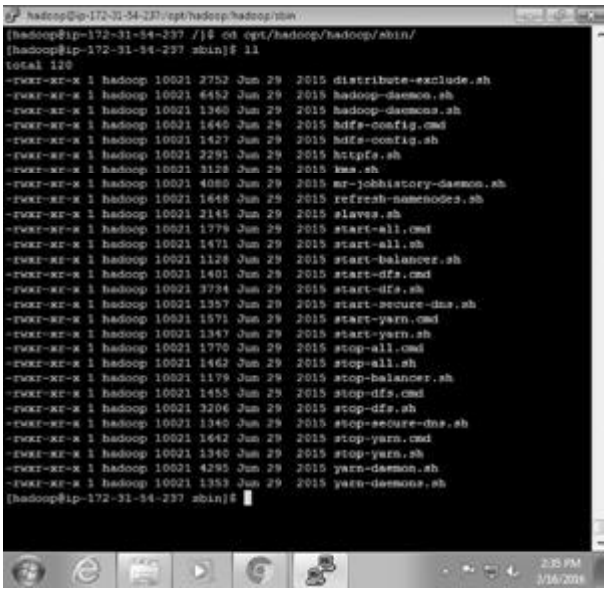
- *Entering to the Hadoop Environment*



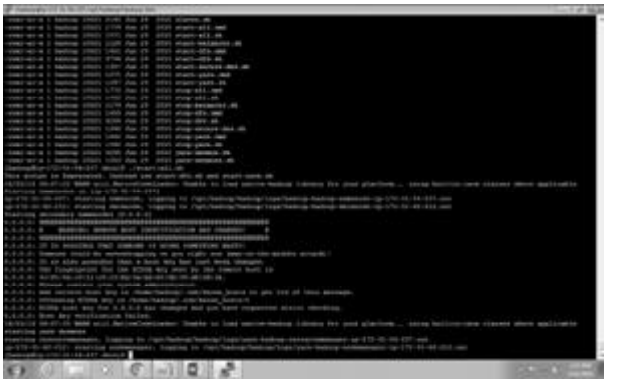


- *Go to the directory"opt/hadoop/hadoop/sbin/"*

- *All shell script files are visible*



- *Type "./start-all.sh"*



- *Go to the root directory*

- *Create a user using "hadoop fs -mkdir/user/ Hadoop"*

  (This directory is already exist)

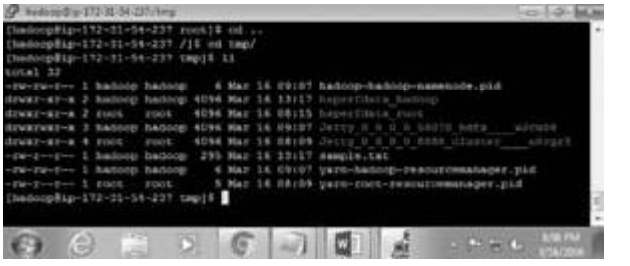
- *First come out of the safe mode using "hadoopdfsadmin -safemode leave"*

- *Copying single file or multiple files from local file system to the Hadoop Distributed File System using "hadoop fs -put sample.txt/user/ hadoop/testing/output1/sample.txt"*

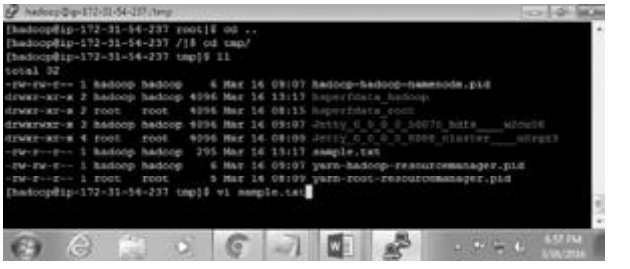
- *Displays size of files and directories contained in the given directory or the size of a file if it's just a file using "hadoop fs -du /user/hadoop/ user/hadoop/testing/output1/sample.txt"*

- *Copies or downloads files from HDFS to the local file system using "hadoop fs –get/user/ hadoop/testing/output1/sample.txt/tmp"*

- *Check the local location "/tmp"*



- *The data in the file sample.txt using "vi sample.txt"*



- *Verifying data in HDFS in directory "/user/hadoop/testing/output1"*

- *Verifying data in HDFS in directory "/user/hadoop/testing/output2"*

- *Inter/intra-cluster (inside HDFS) copying of the file sample.txt using "hadoopdistcp/user/hadoop/testing/output1/ /user/hadoop/testing/output2/".It uses MapReduce to effect its distribution copy, error handling and recovery, and reporting.*

- *Inter/intra-cluster continues*

- *Checking the file in another directory "/user/hadoop/testing/output2/output1" of HDFS using"hadoop fs -ls /user/hadoop/testing/output2/output1"*

Conclusion

It has been found that major business challenges to provide effective business solutions to their clients has been addressed by the role of big data across industries. However, compatibility of big data with other analytical tools still uncertain. So there is always scope for better future improvement. But sometimes business units go for unrealistic expectations which are beyond the scope of big data. There might be cases where users want to fetch data within seconds but performance of analytical tools goes down while retrieving a dataset. Such type of issues relies on many factors. That may be because of response time of analytical tools. Finally it remains with the management of different organizations to decide what relevance the big data will from in their long term growth strategy.

The healthcare industry is now focusing heavily on big data management. Initially it was their apprehension towards changing technological investments because of uncertainty of returns. They opened their doors lately towards such movement. Majority of the companies in this industry are building applications and other software tools for quick response to the needs of the patients. It helps in better connectivity between the patients, physician as well as the stakeholders. Though we can see some significant changes are undergoing in this industry to accommodate such technological changes. Major beneficiaries include the sales representative who can have vital information to deal with marketing functions.

Other sectors like retail and banking were the foremost entrant in this arena. They knew the importance to invest rightly in big data evolution. And hence this resulted in an overall better business as well as customer management.

Predictive modelling works on the datasets but it questions the capability of tools to operate on such huge amount of data as it is growing day by day. What business entities should do in such scenarios? Shall they stop exploring beyond the scope as defined by the nature of the tools in use of analyzing data? Such issues can only be resolved with the help of constant innovation in the world of analytical. Every sets of analytical tool have certain limits can processing capability. They can actually work on the datasets through which we can draw inferences that are critical to the business functions, but it also questions their data processing capability beyond a range of data. And every sets of analytical tool is also prone to replication in some form, so industries should be aware of this and try to differentiate the functionality of tools predominant in market. In all investment in Big Data analytics has become a crucial factor for the organizations to run effectively as well as efficiently. Even constant innovation required in the field of big data analytics as analytical tools have limited functioning powers. In coming years the hidden patterns of data can bring in versatile operational issues that business units should work. This is the need for big data analytics scoring an operational excellence to provide effective business solutions.

Case Study-United Healthcare

United Healthcare is the largest health care unit based in United States. It is a sister company of UnitedHealth Group. Founded in the year 1977 with the mission to improve quality and effectiveness of health care for all Americans, provide proper access to different segments of healthcare benefits, taking its product and services easily available to its customers and efficient use of up to date technology to constantly innovate its health care system. It caters to various health care benefits for individuals, employers, defence personnel and retirees as well as family members serving over 70 million individuals over USA. Over the years it has established contacts with

more than 1 million physicians and care professionals including hospitals and other medical care facilities across the nation. The Optum brand which currently exists under United Healthcare works closely with United Healthcare to provide proper technological support for all its medical services. Earlier United Healthcare has to incur huge losses due to unplanned clinical processes, inefficient financial analysis, unidentified medical claim frauds and other monetary wastes. The traditional reporting system was not efficient to put a check on such issues due to their less analytical functionality and capability.

So now they altered their operational processes to accommodate new changes. United Healthcare has various relational data sources that serve as the input to its operating activities. It accumulates huge amount of interrelated data across its departments. This growing volume of data is and its regular flow gets processed using Hadoop by creating MapReduce programs. It is processed across distributed servers. Custom scripts are built using Python and R packaged programming software to carry on with the data analysis which is processed through Hadoop. This combination works very well to provide effective solutions. It is not the case that the same set of combination will work every time, rather it depends largely on the dataset and the relationships they form among themselves becomes the deciding factor for further data analysis. Understanding the data patterns has become very important for the smooth functioning of operations. R has different sets of capabilities and python has other sets of functioning. Which tool will give what kind of predicted result and what will be its future impact, that depends the data scientists and statistical analysts employed with the organization. As evident the analytical gap on data analysis that has happened earlier now been narrowed down considerably. It has now become easier to visualize data from different angles. In the front end they have software like SAS visual analytics, Tableau which supports data explorations. Going further predictive modelling techniques help the company to broadly recognize patterns in data sets in a systematic way. It is helping them a lot by the extensive use of analytical packaged software like R and SAS. So the company has actually took the right decision at the right time to invest on the above sets of technologies that can handle enormous amount of data accumulated from different sources.

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Book Review

Nimble Focused Feisty: Organizational Cultures That Win in the New Era and How to Create Them

Sara Roberts

Publishers: Benbella Books, Inc., Dallas, TX. Price: $26.95.

Preamble:

Culture consists of a set of values and beliefs which help to reinforce work groups and communities.It forms the DNA of an organisation. Cultures can either make or break companies. Examples are galore as to how an enabling culture has helped a start-up firm to proliferate into a gigantic set-up. The reverse has also happened, namely, an inhibiting culture has bedeviled a giant company.

A snapshot of the book under review:

This book is segregated into two parts. The first part describes the attributes of an organization which are nimble, focused and feisty The latter part dilates on how to create such winning organizations.In the ultimate analysis therefore, How out-beats the What factor. The fulcrum is a different mindset which is the trigger to success.

Introduction: The initial fifty pages:

Sara rightly points out, in most organizations, WHAT is an urgent priority, while HOW is usually taken for granted. The catchphrase lies in switching from defense to offense. Placid approach is derogatory for sustenance. Dynamism is the key to continuity. Nimble organizations are more swift and much wary than ordinary organizations. Focused companies are customer-centric and purposive to market needs. Feisty organizations are courageous and play big to cash-in on advantages and overpower competition.Blockbuster became extinct only because of its inability to identify the foregoing. Once innovative-culture takes a back seat, the writing on the wall is evident. The company is inevitably slated for demise. Netfix is a case in point. VUCA (volatility, uncertainty, complexity, ambiguity) was initially ignored but eventually taken cognizance of, leading to potential gains. Companies obviously need to aggressively reinvent themselves in consonance with changing customer needs. However, strategy, operations, leadership, technology are only issues that are the tip of the iceberg. Fundamentally, it is culture and only culture which is deeper and lies at the bottom of the iceberg and is the prime mover for success and even turnaround for an ailing company. Sara nicely elaborates the success of Airbnb and hiccups of Myspace, the former held strong on its culture while the latter did not defend its culture. Apple, Uber, Facebook, Alibaba aptly find place in initial pages of Sara's book under review. Everything hinges on culture as the etiology for organizational good-health and success. Wherever culture took a beating, the company languished, till it was properly restored in its recovery-path. Google and McDonald are no exceptions.Mindset of top-management matters. Amazon is a powerful example of mindset. Microsoft is yet another case in point. Outrospective companies possess feisty cultures in that they are outwardly directed than inwardly focused.

Part 1:

Organizations That Win: How They're Nimble, Focused and Feisty: The story begins with that of Nokia.It dilates how Apple's vaunted capability

for innovation and new product development made Apple the winner and Nokia the loser. Nimble companies have a special ability to innovate. Cisco 's success rests on nurturing start-up mentality. GE, Toyota have been avid subscribers to transformational change. Very interestingly, Sara chips in the case of HCL Technologies which went on to become an ardent advocate of EFCS implying Employees First, Customers Second. Inverted pyramid is a key. A flat hierarchy leads to trust, decisions and speed. Nordstrom allows employee empowerment as an element of the company's culture. Such companies including hotels like Ritz-Carlton rely on values, not rules, to guide decisions. They depend on self-organised teams and individuals to run the show. Sara cites scores of organizations where problems are resolved by co-creation and collaboration, keep the customer close, treat employees like the adults they are.

Part 2:

Organizations that win: How to Create Them: This is a true prescription-guide. What matters are: organization purpose, philosophy, values, narratives, metric+indicators. Architecting culture involves a three-pronged credo, namely. Lead, Align and Engage. Making personal iconic commitments by leaders in organizations create the desired culture. Organizational practices must be in alignment with the above ethos. Only then,one can walk the talk and be instrumental in shaping the right culture that will build and sustain a truly winning organization.

Final Word

So for successful organizations of the present days, culture is not about playing defense but about going on offense. It is purposely designed, leveraged, and honed to deliver value and drive growth.The book provides not only a look into what these organizations are doing differently but also a blueprint and framework so that a company can create a cultural strategy to thrive in the current era.

I enjoyed reading the author's perspective on being nimble that is being swift and agile, focused implying purposeful and feisty in terms of being bold and courageous.

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The Bright Idea Box

Jag Randhawa

ISBN: 978-81-8495-867-6, Price: Rs.299

Number of pages: 257, Publisher details: Jaico Publishing House

Employee engagement is about being included fully as a member of the team, focused on clear goals, trusted and empowered, receiving regular and constructive feedback, supported in developing new skills, thanked and recognized for achievement which is really needed to go extra mile in the era of globalization and competition.

Jag Randhawa being a technology executive and passionate business thinker felt the importance of 'Culture of engagement and innovation' in the corporate world which he shared in his recent book 'The Big Bright Box'. It provides an overview on empowering employees through employee engagement and innovation. It depicts simple step-by-step guide to create an organizational environment in such a way where both the company and employees' best interests can be met.

Throughout the book the author emphasized to increase employee engagement, productivity, efficiencies and customer satisfaction to create a positive powerful and lasting impact on business performance. Though it is not a new concept we know, but here Jag Randhawa showed us the importance of a small and simple suggestion box to every organization. How a suggestion box can be transformed into a useful tool to improve business and employees. He narrated beautifully with examples of current companies like Toyota, Google, Amazon, P&G, 3M, Wholefoods, Starbucks, and Zappos etc. and how they successfully implemented and got benefitted from employee idea.

Mr. Jag Randhawa is a technology executive who was born and raised on a farm in rural India, where he developed a sense of appreciation for doing the best with what you have, which he translated well into the corporate world through pragmatic and quantifiable means like his six-step MASTER innovation program for employees to submit, develop and implement ideas. MASTER is an acronym for Mobilize, Amass, Support, Triage, Execute and Recognize. Each step is of great importance which he clearly discussed in a lucid manner for everyone who has a bare minimum sense that business is something more than a'brick and morter model/system'.

Though I have enjoyed reading the whole book but found some sentences remarkable, like:

i) *"Do employees understand the relationship between the company's success and their success"*- *by this he meant that do the employees really understand that their job objective is directly linked with the organizational objective, they are not mutually exclusive.*

ii) *"You will learn why employees both quit and leave, or quit and stay"-* *a very important line the author said. Quit and leave is not welcomed but a usual picture in today's competitive scenario but quit and stay is dangerous for an organization, this means an employee who have already withdrawn his mind from his job but continuing in payroll, thus company will definitely suffer bearing such kind of employee who is not involved in their job at all and may percolate the same and damage the work culture of the organization as a whole.*

iii) & iv) ***"Looking for process improvements should be an everyday habit and part of everyone's job" and "Do not wait for that genius product idea; start enhancing the products or services you have now"-*** he meant that improvement is not a sudden case it can be achieved through regular practice only and a very important suggestion that never wait for a genius idea, as it develops through every day's job exercise, knowledge gathered out of it and experience.

Having said all of the above, I can conclude that it is a very well written and easy to understand book which in turn is thought provoking too, as it includes a rich skillful blend of business experience and extensive research of Mr. Jag Randhawa. It is a must read for all who want to entry, survive, achieve and sustain successfully within the world of business in this incredible time of competing pressures such as demand for profitable growth, financial market volatility, political uncertainty, global shifts in workforce demographics and a rapidly shifting technology – a closer view must be put on that core engagement question as this has been proved as a key factor for organizational development and success.

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Globsyn Management Journal is an EBSCO enlisted bi-annual publication of Globsyn Business School, Kolkata, India. GMJ is also available in the Pro Quest database and in enlisted in the Cabell's dictionary. Its objective is to contribute to a better understanding of organizations and their functioning by presenting conceptually sound and methodologically rigorous articles which provide insights and advance knowledge on managerial, business and organization issues.

A typical issue of the journal would carry a mix of research articles, book reviews, perspectives, interfaces and case studies. ***Research Articles*** would be analytical and/or empirical in nature and focus on the analysis and resolution of managerial issues in organizations. ***Book Reviews*** would present reviews of current books on various domains of management. ***Perspectives*** would aim to identify and highlight emerging issues and paradigms in management ***Interfaces*** would present articles from professionals focusing on managerial applications of management practices, theories, and concepts and ***Case Studies*** would aim at an intensive analysis of a real life decision taken at the individual or the organizational level, which may be functional, operational or strategic in nature.

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3 Objective of the Study
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