



# PJMTR

## Presidency Journal of Management Thought & Research

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2. **Business Disclosure & Reporting Practices: An Empirical Study**  
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### Article

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*Bhaskar Sailesh*

# Presidency Journal of Management Thought & Research

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## From the Editor's Desk ...

Dear Reader,

Wishing you a Happy New Year, our Editorial Team is happy to present you, at the dawn of 2017, with a new volume (VII-1) of *Presidency Journal of Management Thought & Research*.

This issue of the journal carries for you five research papers, two case studies and an article. While the first three of the research papers bring you findings from the corporate sector and the next one gives you a peek into the digital banking services, the fifth paper ventures into the retail field.

Do the financing methods in mergers impact the latter's financial performance? Check out your answer against the findings in the paper by Turamari and Hyderabad. What are the reasons for failures in mergers & acquisitions? By analysing the responses of 115 (bootstrapped to 380) Fortune-500 companies, Nagaraju and Mubeen identify the relative significance of the two major factors that contribute to flaws and failures in M&A. Alok Kumar analyses the disclosure and reporting practices of selected Fortune-500 Indian companies vis-a-vis the SEBI regulations.

Change is everywhere. While some changes are initiated by us, we are often subjected to changes whose agents are other than ourselves. In the latter category, people are to adopt, and adapt themselves to, the change introduced by others. Digital banking services have been encouraged and given a big push by the Government of India. In this context of digitalisation of banking services, Malik's study of service quality and its impact on customer satisfaction and customer retention bears a topical relevance.

Having moved from the corporate to the banking sector, the research-paper section forays into the retail segment and presents Chiplunkar's study of in-store category management and its impact on the operational efficiency of retail stores.

Of the two case studies we have here, one describes the various steps involved in, and a firsthand feel of, implementing a MOOC (Massive Open Online Course) within the normal PGDM curriculum of a B-school. The other is a case study of how the technique of growth hacking, a disruptive invention, was successfully used by a company for its growth.

The final entry is an article on tourism in the Varkala-Beach region of Kerala, capturing the local community's perceptions of the socio-economic and environmental impact of tourism in the region.

Before signing off, here's an appeal: Please write the Abstract of your research paper with care so as to convey the essence of the paper to the reader. Make the Abstract as brief as permitted (about 250 words) and yet adequately representative of the paper by saying: i. what was studied and why (i.e., the topic and its significance), ii. how it was studied (i.e., the sample and nature of data), iii. what analyses were carried out and iv. the major findings and their implications. You will do well to remember that people read your Abstract before they decide to, or not to, read your main paper.

Wishing you an academically productive & rewarding year of 2017.

**M. J. Arul**  
**Chief Editor**

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## Payment Methods and Their Effect on Announcement Returns: A Study of Indian Mergers

Rashmi I Turamari \* & R L Hyderabad \*\*

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### Abstract

*The present paper is an attempt to explore the influence of the methods of payment employed in financing mergers in India. The study finds that the method of payment has an impact on the wealth effect on the acquirers. For a 41-day event window, the CAAR for cash financed mergers was 0.25% and it was 0.21% for stock financed mergers. The 3-day (-1, +1) event period showed CAAR of 0.45% for cash mergers which was higher than the CAAR of 0.20% for the stock financed mergers. This shows that in India cash financed mergers perform better than stock financed mergers. The study also found that the shareholders of acquiring companies react positively with a CAAR of 0.48% for the entire sample in the 41-day event period.*

### Introduction

The process of mergers and acquisitions has gained substantial importance in today's corporate world. In India this process is extensively used for restructuring the business organizations which were initiated by the government bodies and also by some well known financial organizations. The increased competition in the global market has encouraged the Indian companies to go for mergers and acquisitions as an important strategic choice. With the increasing number of Indian companies opting for M&As, India is now one of the leading nations in the world in terms of M&As. The volume of M&A deals has been trending upwards particularly in the fields of pharmaceuticals, FMCG, finance, telecom, industrial development automotive and metals. Various factors which lead to this healthy growth of mergers and acquisitions in India were liberalization, favorable government policies, economic reforms, need for investment, and dynamic attitude of Indian corporations. Almost all sectors have been

opened up for the foreign investors in different degrees which has attracted this market and enabled industries to grow.

### Need for the Study

A vast number of studies have analyzed the short run effects of merger announcements on share prices of acquiring and target companies in India. Pradip (2012), Arun Kumar (2008), Stuart and Geeta (2011), Hyderabad (2010), Mallikarjunappa (2013), Amitabh Gupta (2008), Neelam (2013) et al., used market model method for analysis of short effects in their studies. A very few studies analyzed the merger performance based on method of financing of mergers. The choice of payment method in mergers is influenced by several variables. Empirical studies show that the method of payment used in mergers has a significant effect on bidder and target returns. A firm will issue stock only when it is overvalued and will prefer to pay cash if their stock is undervalued (Myer and Maljuf, 1984). Returns to target shareholders are higher in cash offers than in stock offers. Bidders' returns are also higher in

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cash offers although abnormal returns are zero reflecting a competitive takeover market (Weston, 2001). Several theories explain the effect of method of payment. Target shareholders taxable gains in stock-for-stock exchanges may be deferred indefinitely, while the taxes on gains in cash transactions are payable immediately. Cash offers must therefore be higher to compensate. The availability of asset write-ups for future depreciation tax shelters may also explain the higher return to bidders in cash offers. Some writers argue for the information effect of stock versus cash. Using stock implies that the bidder thinks its stock is overvalued. The signaling hypothesis says that using cash is a positive signal that future cash flows will be large enough to exploit investment opportunities or the takeover will generate large cash flows; using stock suggests that the bidder may not have sufficient internal financing. Cash offers indicate managers' confidential level and higher expected profitability of mergers, while stock offers give a signal of lower level of managerial confidence regarding future profitability. Stock offers indicate overvaluation while cash offers signal existence of free cash flow. Stock offers might also indicate lack of cash and exhaustion of debt levels. Considering the limited research on performance of mergers based on method of payment in the Indian corporate history, the present study has been done to analyze the stock price performance of acquiring firms based on method of payment over a short time horizon.

### **Literature Review**

Several research studies have been done across the world on merger performance. Several approaches have been followed to examine the impact of M&A on corporate performance like, accounting based measures, market based measures, mixed measures, or qualitative based measures, event study analysis, operating performance studies, etc. In addition many researchers find that factors such as method of payment (Cash or Stock), book to market ratio, type of merger or acquisition transaction (related or unrelated), cross-border versus domestic M&A, mergers versus tender offers,

firm size, macro-economic conditions, and time period of transaction etc affect the performance of mergers and acquisitions. The paper covers an overview of short run and long run performance of mergers in general and payment method in particular.

Bradley et al. (1983) report that unsuccessful bidders gain on average 2.32% over -20 to +1 day, but lose -2.96% as soon as the bid failure is revealed (+2 to +20 days), both statistically significant. Unsuccessful bidders exhibit insignificant gains of -0.64% over -20 to +20 day period. Jensen and Ruback (1983) find average excess returns to target firms' stockholders as 30% and 20% for the successful tender offers and mergers, respectively; while bidding firms' stockholders gained an average of 4% around tender offers but no abnormal returns around the merger. Gregory et al. (1997) considers the short run and long run performance of UK firms' acquisitions and results indicate the significant negative abnormal returns to acquiring firms around the event date which are not statistically significant from zero.

Sudarsanam and Mahate (2003) report significantly negative abnormal returns of 1.4% (over the -1 to +1 day period) with only a third of acquirers experiencing wealth gains. Gupta (2008) find that bidders lose a significant 1.57% over the -1 to 0 day period and returns for the -10 to -2 days or +1 to +10 days are insignificant. An empirical investigation of European M&As made by Campa et al. (2004) find that regulated EU acquirers lose -1.96% over 60 days (-30-+30) around the bid announcement while bidders from unregulated industries do not earn significant returns for the same period. Danbolt (2004) analyze abnormal returns to UK target company shareholders and reports that during the month of bid announcement, highly significant abnormal returns accrue to shareholders in both domestic and cross border targets amounting to a highly significant 18.76%. A study by Huing et al. (2005) shows that bidders for domestic targets

earn significant abnormal return of 4.73% where as abnormal returns to global bidders is insignificant at -1.27% during 41 day event window. Isfandiyar (2006) report that target firms experience significant positive abnormal return of 6.35% on announcement day, where as it is -0.95% for acquiring firms.

Yunfei and Sagaram (1998) find that acquirers react positively with a significant cumulative average abnormal return (CAAR) of 1.92% (-1, +1) for Indian sample where as CAAR is -16.48% for (150 +150) event window for Chinese acquirers. Paul and Walid (2009) report that acquiring firms earn CAAR of 1.60% over 3-day event period. Wong et al. (2009) investigate the effect of acquisition announcements on the pricing behavior of the six Asian bidding and target firms. The study finds that market reaction of target firms in Asia is -2.4% on announcement day and -5.2% for post announcement period where as the CAAR of bidding firms a shareholder is positive for post announcement period. Sehgal et al. (2012) examined 214 acquirer companies listed in Brazil, Russia, India, China, South Korea and South Africa (BRICKS). The study finds significant pre-event returns for 5 out of 6 sample countries. On post event returns, there is reversal in signs of abnormal returns, i.e. India, China, South Korea provide negative returns while south Africa experiences strong positive returns.

Several studies have examined the long-term stock performance following mergers and acquisitions. Agrawal, Jaffe, and Mandelker (1992) find that acquiring firms suffer a statistically significant wealth loss of about -10% over a five-year post-merger period. Loughran and Vijh (1997) find that five-year buy-and-hold abnormal returns are -15.9% ( $t = -2.36$ ) for mergers, but 43% in the case of tender offers ( $t = 1.67$ ). They also perform the same tests on a sample in which there is no overlapping of events by the same firm and find long-term abnormal returns of -14.2% ( $t = -1.69$ )

for mergers and 61.3% ( $t = 1.86$ ) for tender offers. Similarly, stock acquirers earn 24.2% less than matching firms whereas cash acquirers earn 18.5% more than matching firms. Rau and Vermaelen (1998) use a three year window and find that long-term abnormal returns are respectively negative and significant for mergers (-4.04%), but positive and significant for acquisitions (8.85%). Claude Francoeur (2005) evaluate the long term financial performance of acquiring firms and suggests that acquiring firms engaged in cross border M&As are able to realize efficiency gains and create value for their share holders under certain conditions.

Healy et al. (1990) document that merged firms have significant improvements in operating cash flow returns after the merger resulting from increases in asset productivity relative to their industries. Anderson and Mandelker (1993) also find significant five-year CAARs of -9.6% and -9.3% under a size and book-to-market adjustment model respectively. Agrawal and Jaffe (2000) conclude that the long-run post-merger stock performance is significantly negative. Using BHAR model, Abhay et al. (2005) find for UK public mergers under performance over 3 year post merger period. The study attributes overpayment as a possible reason for under performance. The classification of sample on payment basis shows that cash mergers outperform mergers financed by stock. Dutta and Jog (May 2007) report that acquiring firms show negative long term abnormal performance

Several studies linked the method of payment to the performance of M&As in the short run as well as in the long run. Some important studies are reviewed in this section.

Travlos (1987) reports that share exchange as the means of payment usually results in significant losses to the shareholders of bidding firms. The results are almost similar with the studies undertaken by (Huang and Walking (1989), Franks, Harris and Mayer (1988)),

confirming that the choice of payment method has an impact on the profitability of a takeover. Myers and Maljuf (1984) show that in a world of asymmetry information, the choice of payment method by the bidding firms in acquisitions can reveal information concerning the bidder. The managers who own information and want to act in the interest of their actual shareholders will use stock if they are overvalued. They will put some positive net present value investments aside if the stocks that would be used to finance the operation are undervalued by the market. Da Silva et al. (2003) find that acquirers who made cash based tender offers exhibit abnormally positive returns in the three- year following target listing where as it shows negative for the acquirers involved in mergers. A study by Andre et al.(2004) report that Canadian acquirers underperform significantly in a 3 year post acquisition period. Further, the study finds that M&As financed entirely by equity underperform relative to cash transactions. It also finds that cross border deals perform poorly in the long run. Isfandiyar (2006) shows that target firms experience negative abnormal returns on announcement day for stock financed acquisitions. The AAR for cash financed acquisitions on announcement day is 6.59% for target firms and for acquiring firms it is -0.70%, while the AARs for stock acquisitions are +6.12% and -1.09% for target and acquiring firms respectively. The empirical analysis by Mansor and Siew (2011) report that acquiring firms in cash acquisitions earn a positive return of 0.12% and share acquisitions earn a negative return of 0.6% over the period of day -1 to day 0.

Harjeet et al. (2013) report that acquirers making cash purchases experience statistically significant positive CAARs for all the windows around the announcement date. The CAARs for (-1 +1) and (-2 +2) event windows for cash acquisitions are 2.25% and 2.37% respectively and statistically significant. On the other hand, stock acquisitions are accompanied by

insignificant negative CAAR. Finally the study documents overwhelming evidence of positive wealth gains for acquirer shareholders over the 3-year post acquisition period. Using the buy-and-hold abnormal-return (BHAR) approach, the cash acquirers earn market adjusted BHARs of 74.05% over a 3-year period where as stock acquirers earn negative returns over 36 month after acquisition.

Studies on market performance of mergers in both short and long run are in expected lines of western studies. Arun Kumar et al. (2008) find, on an average for target and acquiring companies, an uptrend in the CAAR few days prior to the announcement. The increase in the CAAR around the merger announcement period for the acquiring companies was greater compared to the target companies. It is also observed that there is sudden downfall in the CAAR for the target companies from the day after the announcement which continues for a period of ten trading days. Pradip et al. (2012) study the announcement returns to Indian acquirers and finds that that announcement returns to Indian acquirers, on an average, significantly decline overtime. The results show that positive CAARs of 2.87% and 2.80% for the period 1995-2003 and 2004-2007 respectively, whereas the CAAR is negative (-0.11%) for the period 2008-2011 for (-2,+2) window period. Hyderabad (2010) finds negligible (0.0008%) returns on announcement and negative overall CAAR (-2.79%) to the shareholders of acquiring firms in a 41 day event. The 3-day window generates positive returns to the shareholders of both the firms. The target shareholders earn a CAAR of 4.38% while the acquiring shareholders earn 0.64%.

Neelam et al (2012) show that there are significant positive abnormal returns of 0.382% in case of foreign based target mergers and 0.634% in case of foreign based acquisitions. Mallikarjunappa (2013) reports that takeovers

in India create wealth for the target company shareholders. They earn a CAAR of 27.37% for 61-day event period. Gupta (2004) also finds significant positive returns (AAR of 0.68%) on the date of announcement for 30 target companies in case of mergers in India during Jan 2003- Jan 2007. Pitbas and Supriti (2014) find that mostly poor performing companies go for mergers and acquisitions and conclude that the Indian acquiring companies have been able to realize synergy from the mergers. Another study by Neelam (2012) concludes that M&A financed with cash, experience higher returns than the acquisitions financed with stock and that the acquirers acquiring listed firms resulted in positive abnormal returns for the shareholders of the acquiring firms.

In conclusion it can be said that there are very few studies have been done relating to payment method in India. Considering limited research on performance of mergers based on method of payment in the Indian corporate industry, the present study has been done to analyze the stock price performance of acquiring firms based on method of payment over a short time horizon.

### Description of Data and Methodology

This study considers 135 cases of acquiring firms announcing mergers in India for the period 2000 to 2010. These 135 cases are selected from CMIE Prowess data base. Due to lack of data regarding method of financing among the total samples selected, the study identified only 85 stock financed mergers and 41 cash financed mergers. In all, the study uses two sample sizes, 135 companies for analyzing acquiring firms stock price performance in general and 126 companies (85 stock financed and 41 cash financed mergers) to analyze the performance of acquiring companies based on method of payment in particular.

The Stock Exchange announcement date or the High Court approval date, whichever

announcement date first occurs, is taken as the 'event date'. The daily adjusted closing prices of the stocks of selected acquiring companies are used for computing abnormal returns. The study employs 41-day and 3-day event windows. BSE-500 is being used as a proxy measure of market index. The necessary data regarding the adjusted closing prices of sample companies and of BSE-500 index are collected from CMIE Prowess Data Base. A 41-day window is divided into 20 days before and 20 days after announcement which is almost equal to a two-month period.

The study employs 'market model' for predicting the abnormal returns of merger announcement. "Abnormal Return (AR) is the part of the return on a security on day 't' that is not predicted and therefore, is an estimate of the change in firms' share price on that day which is caused by the event" (Weston, 2007).

To calculate predicted /normal return, the market model method is used. It is computed as under;

$$R_{jt} = \alpha_j + \beta_j R_{mt} + e_{jt}$$

Where:

$\alpha_j, \beta_j$  = the regression parameters;

$R_{jt}$  = observed daily return on the equity share of firm j at day t;

$R_{mt}$  = observed daily return on the market; and

$e_{jt}$  = random error term having the standard normality properties

The firm's beta and intercept are measured over an estimation period of 200 days prior to event window and the actual return is measured over a period of 20 days before and 20 days after announcement date as followed by Brown and Warner (1980, 1985).

The abnormal returns are predicted by using following formula:

$$\hat{R}_{jt} = \hat{\alpha}_j + \hat{\beta}_j R_{mt}$$

Where  $(\hat{\alpha}_j, \hat{\beta}_j)$  are OLS estimates of  $(\alpha_j, \beta_j)$  and are estimated over 200 days estimation period.

We define the abnormal return for firm  $j$  at time  $t$  as the difference between the actual and expected return. The formula is:

$$AR_{jt} = R_{jt} - \hat{R}_{jt}$$

The cross-section Average Abnormal Return (AAR<sub>t</sub>) and the Cumulative Average Abnormal Return (CAAR<sub>t</sub>) are:

$$AAR_t = \sum_{j=1}^{N_t} AR_{jt} / N_t, \text{ and}$$

$$CAAR_t = AAR_t + CAAR_{(t-1)}$$

Where  $N_t$  is the number of firms at day  $t$ .

To test the hypothesis of significance of abnormal returns,  $AR_{jt}$  is divided by its estimated standard deviation to yield a standardized excess return,  $S(AR_{jt})$

$$t = \bar{AR}_{jt} / S(AR_{jt}),$$

Where

$$S(AR_{jt}) = \sqrt{\sum_{t=-21}^{t=-220} (AR_{jt} - \bar{AR}_j)^2 / 200}, \text{ and}$$

$$\bar{AR}_j = \frac{1}{200} \sum_{t=-21}^{t=-220} AR_{jt}$$

The test statistic for any given day is given by

$$\text{test stat}_t = \sum_{j=1}^{N_t} AR_{jt} / (N_t)^{-1/2}$$

Assuming that the standardized excess returns are independent and identically distributed with finite variance, t-test is distributed standard normal for a large  $N_t$ .

### Analysis of Data

Table 1 gives year wise distribution of sample mergers in India. The sample companies are also classified on the basis of method of payment. The sample includes more number of mergers for the period 2000 to 2008, i.e. almost 91% of the total size. Among the total sample size, the stock financed mergers are more (almost 63%) when compared to the cash mergers.

**Table 1: Year-wise Distribution of Sample of Firms**

Year	No of Mergers		
	Total	Cash	Stock
2000	13	1	10
2001	14	3	10
2002	9	2	7
2003	12	4	8
2004	13	3	8
2005	22	8	13
2006	17	5	9
2007	12	5	7
2008	11	4	7
2009	7	4	3
2010	5	2	3
	<b>135</b>	<b>41</b>	<b>85</b>

Source: Compiled from CMIE Prowess Database

### Abnormal Returns for 135 Acquiring Companies for 41- Day Event Window

The AARs and CAARs along with test statistic values of acquiring companies for 41 day event period are depicted in following Table 2

**Table 2: Announcement Returns of Sample Companies in India**

Event Day	AAR (%)	CAAR (%)	t-test	COUNT	% OF COs with +VE RETURNS
-20	-0.11	-0.11	-1.24	48	35.56
-19	0.02	-0.09	0.24	63	46.67
-18	0.06	-0.02	0.74	64	47.41
-17	-0.05	-0.07	-0.54	57	42.22
-16	0.05	-0.02	0.54	58	42.96
-15	0.08	0.05	0.90	57	42.22
-14	0.02	0.08	0.27	64	47.41
-13	0.15	0.23	1.79	66	48.89
-12	0.02	0.25	0.23	63	46.67
-11	0.08	0.33	0.88	66	48.89
-10	0.05	0.38	0.59	63	46.67
-9	0.03	0.41	0.33	68	50.37
-8	0.07	0.47	0.77	65	48.15
-7	-0.04	0.43	-0.49	61	45.19
-6	-0.01	0.42	-0.12	62	45.93
-5	-0.02	0.40	-0.25	62	45.93
-4	0.08	0.48	0.91	69	51.11
-3	0.03	0.51	0.32	63	46.67
-2	0.12	0.63	1.40	58	42.96
-1	0.13	0.75	1.50	66	48.89
0	0.22	0.97	2.55	74	54.81
1	-0.12	0.85	-1.44	61	45.19
2	-0.08	0.77	-0.97	58	42.96
3	-0.16	0.60	-1.91	52	38.52
4	-0.17	0.43	-2.00	58	42.96
5	0.05	0.48	0.60	61	45.19
6	-0.07	0.41	-0.85	58	42.96
7	0.03	0.43	0.30	58	42.96
8	0.14	0.57	1.62	63	46.67
9	0.02	0.60	0.26	62	45.93
10	-0.07	0.52	-0.86	60	44.44
11	-0.26	0.26	-3.04	51	37.78
12	0.15	0.41	1.77	61	45.19
13	0.10	0.52	1.20	62	45.93
14	0.03	0.55	0.38	61	45.19
15	0.11	0.66	1.24	61	45.19
16	-0.11	0.54	-1.33	56	41.48
17	-0.05	0.49	-0.61	65	48.15
18	-0.16	0.33	-1.91	65	48.15
19	0.00	0.33	0.01	66	48.89
20	0.15	0.48	1.79	64	47.41
<b>Avg.</b>	0.01	0.41	0.09		
<b>Median</b>	0.02	0.43	0.29		
<b>S.D</b>	0.1	0.25	1.21		
<b>Sq. rt.</b>	0.02	0.04	0.19		
<b>t-test</b>	0.5	10.24	0.5		

\*, \*\*, \*\*\* indicate significance at 1%, 5% and 10% levels respectively

Source: Computed from CMIE Prowess Database

The results show that Indian stock market reacts strongly to the merger announcement which is demonstrated by the changes in the daily market adjusted rates of returns or abnormal returns. The AAR on day '0' is positive (0.22%) significant at 5% level. The results are similar to Hyderabad (2010) who finds a negligible AAR of 0.008% on the announcement day for 40 day window period. The results show that AAR is positive for 26 days and negative for 15 days out of 40 days event period. In pre-announcement period, AAR is positive for 15 days and significant only for 1 day. However AAR is positive only for 10 days in post announcement period but significant only for 2 days. AAR is positive and is in increasing order continuously from the day '-4' to '0'. This may be because of leakage of information about the merger which indicates that stock market reacts with the merger related information. AAR after event day '0' becomes negative (-0.12%) and continues its negative trend for three more days after announcement.

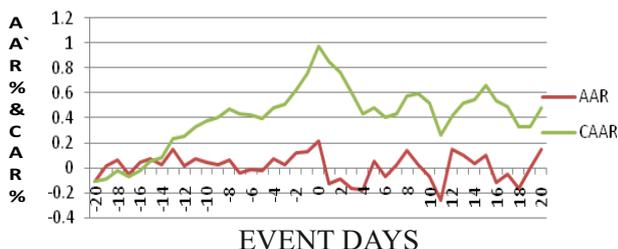
The overall effects of merger announcement on stock prices are determined by observing the CAARs. The CAAR on the announcement day is 0.97% which decreases to 0.48%.on +20th day. The results are similar with Mansor and Siew (2011) who found a positive CAAR of 2.41% for -30 to 30 day window while the 3 day CAAR is 2.64%. Neelam et al. (2012) investigates the returns to 14 acquirer companies' shareholders in the case of cash and stock financed acquisitions and document positive returns for 11 companies. The CAAR is 5.29 per cent (significant at 1 per cent) for 5- day window. The CAAR is also positive for longer event windows of 11 days (-5, +5) days, 21 days (-10, +10) days and 41 days (-20, +20) days.

The acquiring company shareholders gain from days '-15' to '0'. CAARs are negative only for 5 days ( from -20 to -16) and rest of the days( from -15 to +20) it is positive. This indicates that in

the short run shareholders of acquiring company earn nominal return. 54 % of acquiring companies generate positive abnormal returns on the announcement day and this percentage decreases to 47% on +20 –day.

Figure 1 shows the graphical representation of movement of AAR and CAAR for 135 acquiring companies firms in India.

**Figure 1: Movement of AAR and CAAR of 135 acquiring companies**



**Movement of AAR and CAAR for Various Sub-Periods**

The wealth effect of merger announcements on the acquiring company shareholders is further analyzed for different time intervals of 41 day over period. The various sub periods considered are (-20 to -1), (-20 to -11), (-20 to -16), (-15 to -11), (-10 to -1), (-10 to -6), (-5 to -1), (+1 to +20), (+1 to +10), (+1 to +5), (+6 to +10), (+11 to +15), (+11 to +20) and (+16 to +20) indicating a time period of 20 days, 10 days, & 5 days before and after merger announcement. The following Table 3 shows the data relating to CAAR for various sub-periods

**Table No 3: Movement of AAR and CAAR in Sub-Periods**

Movement of CAAR	CAAR	t-test
-20 to -1	0.75	2.76*
-20 to -11	0.33	1.45
-20 to -16	-0.02	-0.14
-15 to -11	0.35	2.89*
-10 to -1	0.43	2.34*
-10 to -06	0.09	0.94
-5 to -1	0.33	2.34**
+1 to +20	-0.49	-0.91
+1 to +10	-0.45	-1.41
+1 to + 5	-0.49	-2.42
+6 to +10	0.04	0.21
+11 to +15	0.13	0.36
+11 to +20	-0.04	-0.10
+16 to +20	-0.18	-0.64

\*, \*\*, \*\*\* indicate significance at 1%, 5% and 10% levels respectively

Source: Computed from CMIE Prowess Database

Table indicates that the CAARs for pre-announcement period are positive for 6 sub-periods and after the announcement it is positive and insignificant for only 2 sub-periods [i.e. (6 to 10), (11 to 15)]. The overall analysis shows that acquiring firm returns are not significant over the event period which is similar with the studies of Bradely, Desai and Kim, Stegmoller and Stutz (2004). The post announcement window period (+1 to +20) is -0.49% which is similar with the findings by Rani who found negative overall CAAR of -5.48% and -5.71% for (+1 to +30) and (-30 to +30) sub periods respectively for 319 M&As in India during 2001-2007. Hyderabad (2010) also finds a negative CAAR of -2.64%, -1.48% and -1.90% for (+1, +10), (-7, +7) and (-5, +5) sub-periods respectively. Barring the -1 to +1 sub-period, for all other sub periods in pre and post announcement periods and for both the acquiring and target firms there are negative returns.

**AAR and CAAR for 3-day Event Period for 135 Indian Acquiring Companies**

The study computes AAR and CAAR for 3 day event period and Table 4 depicts the details:

**Table 4: AAR & CAAR for 3 day Window Period**

Event Day	AAR (%)	CAAR (%)	t-test	% OF COS +VE RETURNS
-1	0.15	0.15	1.78***	48.89
0	0.24	0.39	2.78*	55.56
1	-0.13	0.26	-1.50	45.93
<b>Avg.</b>	0.20	0.27	2.28	
<b>Median</b>	0.20	0.27	2.28	
<b>S.D</b>	0.06	0.17	0.70	
<b>Sq. rt.</b>	0.04	0.10	0.41	
<b>t-test</b>	5.60	2.79	5.60	

\*, \*\*, \*\*\* indicate significance at 1%, 5% and 10% levels respectively.

Source: Computed from CMIE Prowess Database

The AAR on the announcement day is positive (0.24%) which is significant at 1% level. But it becomes negative after the merger announcement. However, the overall 3 day CAAR is positive of 0.26%. The finding of the positive CAAR is consistent with the study by Geeta Rani et al. who find overall 3 day CAAR of 0.48% for outward foreign direct investment related M&As. Study on Chinese M&As by Harjeet et al (2013) find a positive CAAR of 1.11% for 3 day event period. The results of the study are also similar with evidence for acquirers by Chang (1998), Fuller et al. (2002), and Faccio et al. (2006). Paul and Walid (2009) report positive announcement returns of 1.6% for a sample of 138 listed Canadian acquirers. However, the results are inconsistent with Mitchell and Lehn (1996), Sudarsanam and

Mahate (2003), and Sehgal et al. (2012) who report a negative CAAR for the 3 day event window. The overall analysis shows that shareholders of acquiring firms have gains on the announcement day. The investor would be in profit if they sell immediately after the announcement rather than holding it in future as the AAR becomes negative day after the merger announcement.

**Announcement Returns and Method of Payment**

The AAR and CAAR for 41 cash financed mergers and 85 stock financed mergers for 41 day event window are summarized in the Table 5

**Table 5: AAR and CAAR for Cash and Stock Financed Acquiring Companies**

Event Day	Cash (41)				Stock (85)			
	AAR	CAAR	t-test	% OF COS VE RETURNS	AAR	CAAR	t-test	% OF COS +VE RETURNS
-20	-0.12	-0.12	-0.79	36.59	-0.09	-0.09	-0.83	35.29
-19	-0.14	-0.27	-0.92	36.59	0.12	0.03	1.08	51.76
-18	0.31	0.04	1.98	53.66	-0.08	-0.05	-0.7	44.71
-17	0.07	0.11	0.43	51.22	-0.06	-0.11	-0.56	41.18
-16	-0.07	0.04	-0.44	39.02	0.09	-0.02	0.84	43.53
-15	-0.05	-0.01	-0.3	39.02	-0.1	-0.12	-0.93	42.35
-14	0.04	0.03	0.25	46.34	-0.1	-0.22	-0.93	44.71
-13	-0.11	-0.08	-0.69	46.34	0.31	0.09	2.89	51.76
-12	-0.04	-0.11	-0.23	36.59	0.01	0.1	0.08	50.59
-11	0.13	0.01	0.8	46.34	0.07	0.17	0.64	51.76
-10	-0.1	-0.09	-0.64	43.9	0.15	0.32	1.36	49.41
-9	-0.12	-0.2	-0.74	43.9	0.07	0.39	0.64	50.59
-8	0.18	-0.02	1.14	46.34	0.01	0.4	0.13	47.06
-7	0.08	0.05	0.5	41.46	-0.07	0.34	-0.6	48.24
-6	-0.06	0	-0.36	39.02	-0.01	0.33	-0.05	48.24
-5	0	0	0.02	46.34	-0.09	0.24	-0.86	42.35
-4	0.16	0.16	1.04	51.22	0.05	0.29	0.49	52.94
-3	0.12	0.29	0.79	43.9	-0.04	0.25	-0.36	49.41
-2	0.16	0.44	1.02	43.9	0.03	0.28	0.24	41.18
-1	0.46	0.91	2.97	68.29	-0.1	0.17	-0.96	37.65

0	0.26	1.17	1.70***	56.1	0.24	0.42	2.24**	55.29
1	-0.28	0.89	-1.82	41.46	-0.03	0.39	-0.25	48.24
2	-0.19	0.7	-1.2	36.59	0.01	0.4	0.12	44.71
3	-0.11	0.59	-0.72	39.02	-0.18	0.22	-1.67	37.65
4	-0.2	0.39	-1.26	39.02	-0.22	0	-2.05	41.18
5	-0.2	0.19	-1.27	41.46	0.17	0.17	1.54	47.06
6	-0.02	0.17	-0.12	41.46	-0.09	0.07	-0.87	42.35
7	0.07	0.24	0.42	53.66	0.01	0.08	0.11	37.65
8	0.16	0.4	1.04	51.22	0.14	0.23	1.31	45.88
9	0.12	0.52	0.74	51.22	-0.01	0.22	-0.05	44.71
10	-0.1	0.42	-0.65	46.34	-0.1	0.12	-0.92	41.18
11	-0.27	0.14	-1.75	41.46	-0.22	-0.09	-1.99	37.65
12	0.13	0.27	0.8	41.46	0.2	0.1	1.8	47.06
13	-0.12	0.15	-0.75	34.15	0.19	0.3	1.8	52.94
14	0.03	0.18	0.19	46.34	-0.03	0.26	-0.32	43.53
15	0.18	0.36	1.16	51.22	0.1	0.36	0.92	42.35
16	-0.15	0.21	-0.97	43.9	-0.05	0.31	-0.46	41.18
17	-0.01	0.2	-0.05	48.78	-0.1	0.21	-0.91	47.06
18	-0.11	0.09	-0.73	46.34	-0.19	0.03	-1.71	49.41
19	0.03	0.12	0.19	48.78	0	0.02	-0.03	49.41
20	0.13	0.25	0.82	51.22	0.19	0.21	1.75**	44.71
<b>Avg</b>	-0.03	0.14	-0.2		-0.1	0.09	-0.89	
<b>Median</b>	-0.01	0.12	-0.05		-0.1	0.03	-0.91	
<b>S.D</b>	0.07	0.06	0.47		0.09	0.11	0.84	
<b>Sqrt</b>	0.04	0.03	0.27		0.05	0.06	0.48	
<b>t-test</b>	-0.73	4.08	-0.73		-1.83	1.4	-1.83	

\*, \*\*, \*\*\* indicate significance at 1%, 5% and 10% levels respectively

Source: Computed from CMIE Prowess Database

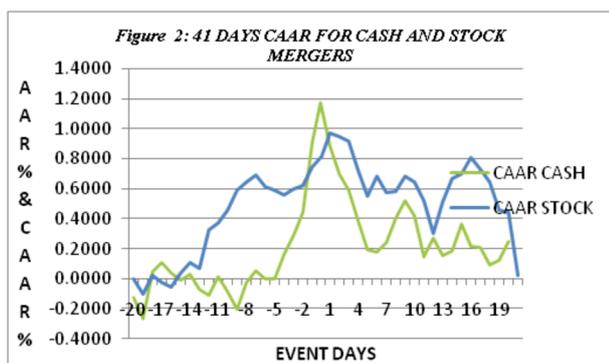
The AAR on the announcement day for cash mergers is more than the stock mergers implying that cash mergers generate more wealth. The AAR on announcement day for cash merger is 0.26% significant at 10% level, whereas AAR of stock mergers is 0.24%. The CAAR on the announcement day is 1.17% for cash financed mergers and 0.42% for stock financed mergers. The overall CAAR for 41 day event period is 0.25% for cash mergers and 0.21% for stock mergers. This is similar to the study by Mansor and Siew (2011) who reports a CAAR of 2.85% for cash offers and -0.52% for stock offers around 61-days window period. Travlos (1987)

also find share exchange as a means of payment showing significant losses and Hansen et al. (1987) find cash offers producing higher abnormal returns in the short run. Walker (2000) reported a positive significant return of 2.38% for cash offers and insignificant abnormal returns for share offers in 5 day event period.

There are 56% of the acquiring companies which generate positive returns on the announcement day in case of cash mergers where as it is 55% in case of stock mergers, while this percentage decreases to 51% in case of cash mergers and 44% for stock mergers on

20th day after the announcement of merger. Overall analysis indicates that in India cash financed mergers perform better than stock financed mergers in the short run.

Figure 2 presents the pictorial depiction of movement of CAAR for cash mergers and stock mergers.



### CAARs for Various Sub-Periods Based on Payment Method

Table 6 shows the details of movement of CAAR based on method of payment for 41 event window.

Table 6: Movement of CAAR for Cash and Stock Financed Mergers for 41 Day Event Window.

Movement of CAAR	Cash Mergers		Stock Mergers	
	CAAR	Z-Value	CAAR	Z-Value
-20 to -1	0.87	1.38	0.08	0.17
-20 to -11	0.06	0.12	0.07	0.17
-20 to -16	0.19	0.48	-0.08	-0.35
-15 to -11	-0.13	-0.53	0.15	0.4
-10 to -1	0.81	1.66***	0.01	0.02
-10 to -06	0.01	0.04	0.19	1.18
-5 to -1	0.8	2.27**	-0.19	-1.1
1 to 20	-0.99	-1.54	-0.2	-0.33
1 to 10	-0.65	-1.23	-0.25	-0.67
1 to 5	-1	-5.37	-0.23	-0.7
6 to 10	0.35	1.53	-0.02	-0.1
11 to 15	-0.23	-0.69	0.23	0.56
11 to 20	-0.35	-0.88	0.05	0.1
16 to 20	-0.11	-0.46	-0.18	-0.57

\*, \*\*, \*\*\* indicate significance at 1%, 5% and 10% levels respectively

Source: Computed from CMIE Prowess Database

The CAAR for cash mergers in the pre-announcement period are positive only for two sub-periods, whereas for the rest of sub-periods CAAR are positive except for the period (-15 to -11). However the pre-announcement CAAR for stock mergers are positive for 5 periods and negative for 2 sub-periods. Post announcement CAAR for cash mergers for all sub-periods are negative but positive for 2 sub periods. Whereas stock merger CAAR for post announcement sub periods are also negative except for two sub periods which shows insignificant positive CAAR.

### AAR and CAAR for 3-day Event Window Based on Method of Financing

Table 7 shows the AAR and CAR for 3-day window for acquiring firms based on method of payment

Table 7: AAR & CAAR for 3-day Event Window for Cash and Stock Financed Mergers

Event Day	Cash Mergers				Stock Mergers			
	AAR (%)	CAAR (%)	t-test	% of Cos with +ve returns	AAR (%)	CAAR (%)	t-test	% of Cos with +ve returns
-1	0.43	0.43	2.72*	65.85	-0.03	-0.03	-0.32	18.82
0	0.29	0.72	1.87***	56.1	0.26	0.23	2.41**	31.76
1	-0.27	0.45	-1.72	43.9	-0.03	0.2	-0.26	25.88
Avg.	0.36	0.57	2.3		0.11	0.1	1.05	
Median	0.36	0.57	2.3		0.11	0.1	1.05	
S.D	0.09	0.21	0.6		0.21	0.18	1.93	
Sq. rt.	0.05	0.12	0.35		0.12	0.11	1.11	
t-test	6.59	4.79	6.59		0.94	0.9	0.94	

\*, \*\*, \*\*\* indicate significance at 1%, 5% and 10% levels respectively

Source: Computed from CMIE Prowess Database

The AAR and CAAR on the announcement day in case of cash financed mergers are 0.59% and 0.78% respectively, whereas AAR and CAAR are 0.26% and 0.23% for stock financed mergers. The overall CAAR for 3-day window period is 0.45% for cash mergers and 0.20% for stock financed mergers. This indicates that in the short run cash mergers gain more than stock mergers. These results are consistent with the findings by Harjeet et al. (2013) who find significant positive CAARs of 2.27% and 2.37% for 3 day and 5 day event windows respectively in case of cash mergers.

On the other hand, stock acquisitions have insignificant negative CAARs. Yunfei and Sagaram (1998) investigated 159 Indian and 109 Chinese acquiring companies and find that cash financed Indian M&As earn CAARs of 2.02% and 1.64% for 3 day and 5 day event window respectively, whereas equity financed M&As earn 1.72% and 0.62% for the said event windows. In case of Chinese M&As, CAAR for cash mergers is 0.3% and 0.60% for 3 day and 5 day event windows respectively, whereas for stock financed mergers it is 0.08% for 3 day window and -0.70% for 5 day event window. Moeller et al. (2004) find large cash bidders gain 0.693% and large equity bidders lose -0.96% over three days (significant) if the bid is for both private and public companies.

### **Summary and Conclusions**

The present study analyzes market reactions to 135 merger deals which include 41 cash financed mergers and 85 stock financed mergers for the period 2000 – 2010. A short term wealth effect to acquiring companies' shareholders is found to be similar with those found by US and UK studies. We find that the shareholders of acquiring companies react positively with an AAR of 0.26% for the entire sample. However in (-20, +20) window period the CAAR is 0.48% significant at 10% level. The study finds that the

method of payment has an impact on the wealth effect on the acquirers. For the 41 day event window, the CAAR for cash financed mergers is 0.25% and 0.21% for stock financed mergers. The 3 day (-1, +1) event period shows the CAAR of 0.45% for cash merger which is more than stock financed merger CAAR of 0.20%. This shows that in India cash financed mergers perform better than stock financed mergers.

### **References**

1. Abhay Abhyankar., (2005). Long-run Post-merger Stock Performance of UK Acquiring Firms: A Stochastic Dominance Perspective, *Applied Financial Economics*, 2005, 15, 679–690.
2. Agrawal, A., Jaffe, J.F. and Mandelker, G.N., (1992). The Post-Merger Performance of Acquiring Firms: A Re-examination of an Anomaly. *Journal of Finance*, 57(4): 1605 – 1621.
3. Alan Gregory and Steve McCorrison. Foreign Acquisitions by UK Limited Companies: Short and Long-Run Performance. Working Paper no: 01/01, <http://papers.ssrn.com/>
4. Amitabh Gupta., (2008). Market Response to Merger Announcements. *The ICFAI Journal of Applied Finance*, 14(8): 5-017.
5. Anderson, S. Christopher and Gershon Mandelker (1993). Long Run Return Anomalies and the Book-to-Market Effect. Unpublished paper, Joseph M. Katz Graduate School of Business, University of Pittsburgh.
6. Andre, P., Kooli, M. and L'Her, J.F., (2004). The long-run Performance of Mergers and Acquisitions: Evidence from the Canadian stock market'. *Financial Management*, Winter, pp. 27-43.
7. Anson Wong and Kui Yin Cheung. (2009). The Effects of Merger and Acquisition Announcements on the Security Prices of

- Bidding Firms and Target Firms in Asia. *International Journal of Economics and Finance*, 1(2):274-283.
8. Arun Kumar Gopaldaswamy., (2008). Stock Price Reaction to Merger Announcements: An Empirical Note on Indian Markets. *Investment Management and Financial Innovations*, 5(1): 95-103.
9. Berkovitch, E., and Narayanan, M., (1990). Competition and the Medium of Exchange in Takeovers. *The Review of Financial Studies*, 3, 153–174.
10. Bradely M, Desai. A. and Kim H.E (1988). Synergetic gains from corporate acquisitions and their division between the stockholders of target and acquiring firms. *Journal of Financial Economics*, Vol 21:3-40.
11. Bradley, M., Sundaram, A.K., (2004). Do acquisitions Drive Performance or Does Performance Drive Acquisitions? SSRN Working Paper Series.
12. Brown, S.J and Warner, J.B., (1985). Using Daily Stock Returns: The Case of Event Studies. *Journal of Financial Economics*, 14(1):3-31.
13. Campa, J. M., and Hernando, I., (2004). Shareholder Value Creation in European M&As. *European Financial Management*, 10(1), 47-81.
14. Chang, S., (1998). Takeovers of Privately Held Targets, Methods of Payment, and Bidder Returns. *Journal of Finance*, 53:773-784.
15. Claude Francoeur., (2005). The Long-Run Performance of Cross-Border Mergers and Acquisitions: The Canadian Evidence. A report submitted to Social Sciences and Humanities Research Council of Canada (SSHRC). <http://papers.ssrn.com/>
16. Da Silva Rosa, R., Izan, H.Y., Steinbeck, A., and Walter, T., (2000). The Method of Payment Decision in Australian Takeovers: An Investigation of Causes and Effects. *Australian Journal of Management*, 25(1): 67 – 94.
17. Danbolt J., (2004). Target Company Cross-Border Effects in Acquisitions into the UK, *European Financial Management* 10(1): 83-108.
18. Dutta, S., and Jog, V., (2009). The Long Term Performance of Acquiring Firms: A Re-Examination of an Anomaly. *Journal of Banking and Finance*, 33:1400–1412.
19. Eckbo, B. E., Maksimovic, Y., and Williams, J., (1990). Consistent Estimation of Cross-Sectional Models in Event Studies. *Review of Financial Studies*, 3, 343-365.
20. Faccio, M., McConnell, J.J., Stolin, D., (2006) Returns to Acquirers of Listed and Unlisted Targets. *J. Financial Quant. Anal.* 41 (1), 197–220.
21. Franks, J., Harris, R.S., and Titman, S.D., (1991). The Post-Merger Share Price Performance of Acquiring Firms, *Journal of Financial Economics*. 29: 81-96.
22. Fuller, K., Netter, J., and Stegemoller, M., (2002). What do Returns to Acquiring Firms Tell Us? Evidence from Firms that Make Many Acquisitions. *The Journal of Finance*. 57(4): 1763-1793.
23. Gregory, A., (1997). An Examination of the Long Run Performance of UK Acquiring Firms. *Journal of Business Finance and Accounting*, 24: 971-1002.
24. Harjeet S. Bhabra., (2013). An Empirical Investigation of Mergers and Acquisitions by Chinese Listed Companies, *Journal of Multinational Financial Management*, 23: 186–207.
25. Healy, P., K. Palepu and R. Ruback., (1992). Does Corporate Performance Improve After Mergers? *Journal of Financial Economics*, 31: 135-175.

26. Hansen, R. 1987. A Theory for the Choice of Exchange Medium in Mergers and Acquisitions. *Journal of Business* Vol. 60:75-95.
27. Huang, Y.-S., and Walkling, R. A., (1989). Target Abnormal Returns Associated with Acquisition Announcements: Payment, Acquisition Form, and Managerial Resistance. *Journal of Financial Economics*, 19(2): 329-349.
28. Huong N Higgins and Judy Beckman (2006). Abnormal Returns of Japanese Acquisition Bidders-Impact of Pro-M&A legislation in the 1990's, *Pacific –Basic Finance journal* , Vol. 14:250-268
29. Hyderabad R.L., (July 2010). Shareholders Wealth Gains in Corporate Merger Announcements in India. *South Asian Journal of Management Research*, 2(2): 78-91.
30. Isfandiyar Shaheen. Stock Market Reaction to Acquisition Announcements using an Event Study Approach. Submitted May 5, 2006, in partial completion of the requirements for departmental honors. <http://www.google.com>
31. Jensen, M.C. and Ruback, R.S., (1983). The Market for Corporate Control: The Scientific Evidence. *Journal of Financial Economics*, 11: 5-50.
32. Krishnaswami, S. and V. Subramaniam. (1999) . Information Asymmetry, Valuation, and the Corporate Spinoff Decision. *Journal of Financial Economics* 53: 73-112.
33. L'Her and Jean-Francois, The long-run Performance of Mergers and Acquisitions: Evidence from the Canadian Stock Market. <http://papers.ssrn.com/>
34. Loughran, T. and Vijh, A.M., (1997). Do Long-term Shareholders Benefit from Corporate Acquisitions? *Journal of Finance*. 51(5): 1765-1790.
35. Malatesta, P. H., (1983). The wealth Effect of Merger Activity and the Objective Functions of Merging Firms. *Journal of Financial Economics*, 11: 155-181.
36. Mallikarjunappa T and Panduranga Nayak., (2013). A Study of Wealth Effects of Takeover Company Shareholders, *Vikalpa* 38(3): 23-51.
37. Mandelker, G., (1974). Risk and return: The Case of Merging Firms. *Journal of Financial Economics*, 1(4): 303-335.
38. Mansor Isa and Siew-Peng Lee. (Aug 2011). Method of Payment and Target Status: Announcement Returns to Acquiring Firms in the Malaysian Market. *International Journal of Economics and Finance*, 3(3): 177-189.
39. Mitchell, Mark L and J Harold and Mulherin (1996). The Impact of Industry shocks on Takeover and Restructuring Activity. *The Journal of Financial Economics*, Vol. 4, No 2:193-229.
40. Moeller, S. B., Schlingemann, F. P., and Stulz, R. M. (2004). Firm Size and the Gains from the Acquisitions. *Journal of Financial Economics*, 73(1), 201-228.
41. Myers, S. and Majluf, N., (1984). Corporate Financing and Investment Decisions when Firms have Information that Investors Do Not. *Journal of Financial Economics*, 13: 187-221.
42. Neelam Rani., (July 2012). Innovative Mode of Financing and Abnormal Returns to Shareholders of Indian Acquiring Firms. *Proceedings of GLOGIFT University of Vienna, Austria*: 758-772.
43. Neelam Rani., (2011). Impact of Mergers and Acquisitions on Shareholders' Wealth in Short-Run: An Empirical Study of Indian Pharmaceutical Industry. *International Journal of Global Business and Competitiveness*, 6(1): 40 - 52.

44. Neelam Rani., (2013). Impact of Corporate Governance Score on Abnormal Returns of Mergers and Acquisitions. *Procedia Economics and Finance* 5: 637–646.
45. Paul André and Walid Ben-Amar., (2009). Control Threat and Means of Payment: Evidence from Canadian Mergers and Acquisitions. A report submitted to Social Sciences and Humanities Research Council of Canada (SSHRC). <http://papers.ssrn.com/>
46. Pitabas Mohanty and Supriti Mishra., (2014). Run-up in Stock Prices Prior to Merger and Acquisitions Announcements: Evidence from India, NSE WORKING PAPER, WP/12/2014.
47. Pradip Banerjee. (2012). An Analytical Study of Returns and Characteristics of Indian Cross-Border Acquisitions. Indian Finance Conference, December 18-21, 2012, Indian Institute of Management, Kolkata, India.
48. Rani, N., Yadav, S. S. and Jain, P. K., (2011). Impact of Mergers and Acquisitions on Shareholders' Wealth in Short-run: An Empirical Study of Indian Pharmaceutical Industry. *International Journal of Global Business and Competitiveness*, 6(1): 40-52.
49. Rau, P.R. and Vermaelen, T., (1998). Glamour, Value and the Post-acquisition Performance of Acquiring Firms. *Journal of Financial Economics* 49, 223-253.
50. Robert S. Harris and Julian Franks. Means of Payment in Takeovers: Results for the U.K. and U.S. National Bureau of Economic Research, Working Paper No. 2456.
51. Sehgal. S and Siddhartha Banerjee and Florent Deisting., (2012). The Impact of M&A Announcement and Financing Strategy on stock Returns: Evidence from Bricks Markets. *International Journal of Economics and Finance*, Vol 4, no 11:76-92.
52. Stuart Locke and Geeta Rani Duppati., (2011). Market Reactions to Foreign Investments in Mergers and Acquisitions: An empirical study of Indian Corporates. International Conference on Economics and Finance Research IPEDR, 4: IACSIT Press, Singapore.
53. Sudarsanam, S., and Mahate, A. A., (2003). Glamour Acquirers, Method of Payment and Post-Acquisition Performance: The UK Evidence. *Journal of Business Finance and Accounting*, 30(1): 299-341.
54. Travlos, N. G., (1987). Corporate Takeover Bids, Methods of Payment, and Bidding Firms' Stock Returns. *The Journal of Finance*, 42(4): 943-963.
55. Walker, M., (2000). Corporate Takeovers, Strategic Objectives, and Acquiring-firm Shareholder Wealth. *Financial Management*, 29(1), 53-66.
56. Weston J, Juan S and Brian J., (2001). *Takeovers, Restructuring and Corporate Governance.*, 3rd edition, Pearson Publications, New Delhi.
57. Yunfei Cheng, J. Wickramanayake and. Sagaram J. P. A. (1998) Acquiring Firms' Shareholder Wealth Effects of Selected Asian Domestic and Cross-Border Takeover Bids: China and India 1999-2003, <http://papers.ssrn.com/>

## Business Disclosure & Reporting Practices: An Empirical Study

Alok Kumar\*

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### Abstract

*The foundation of any composition of corporate governance is disclosure and reporting. This study examines the disclosure and responsible reporting practices adopted by Indian companies listed in Fortune top 500 companies along with the extent and compliance of business responsibility report in their annual reports.*

*Data was collected from different web sources and annual reports of selected companies for the period 2014-15. In order to study the extent of disclosure practices, a composite disclosure index score was framed. The information of disclosure in the annual report of the companies was categorized into different sub categories: Governance disclosures & disclosures in Business Responsibility Report. An index of disclosures in corporate governance (Board of Directors, Board Meeting & Independent directors) and Business Responsibility Report disclosures consisting of 77 items, was constructed. Bivariate Analysis (Parametric test) ANOVA was used to generalize the hypothesis. The assumptions of normality (Kolmogorov-Smirnov Test) and homogeneity of variance were also verified. The result of the ANOVA test reveals that there is no statistically significance difference between governance disclosures & disclosures in business responsibility report adopted by the selected Indian companies.*

*It is evident from the study that it's not only accountability rather its business firm's responsibility to adopt mandatory and voluntarily disclosure and reporting as per regulatory guidelines for greater transparency ensuring mandatory compliance of corporate governance norms. Currently, firms in India carry out their disclosure and reporting practices by following the voluntary and mandatory guidelines issued by SEBI's LODR Regulations 2015 regarding corporate governance.*

### Introduction

Corporate governance is all about maximizing stakeholder's value lawfully, ethically and sustainably. Good corporate governance includes a vigilant board of directors, rational disclosure and adequate reporting of meaningful information about the board and management process. Traditionally, the reporting practices of Indian companies have been poor as compared to their western counterparts. The lack of demand from Indian stakeholders' may be one reason for slow pace of adoption of responsibility reporting. Globally, there is an

augmented realization and acceptability that superior corporate governance is indispensable to build a business environment of trust, transparency and responsibility in order to support sustainable economic growth. SEBI with idea of convey the fundamental frame governing the regime of listed entities in line with the Companies Act, 2013 and at the moment compiling all the mandates of different SEBI Regulations/Circulars governing under the ambit of a single document, has notified SEBI (listing obligations and disclosure

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requirements) Regulations (hereinafter referred as “LODR” or “Listing Regulations”) on September 02, 2015, thereby giving all the listed entities and Stock Exchanges, a time span of 90 days to implement the said listing regulations. To have a uniform disclosure policy to follow best in class of corporate governance practices with respect to disclosures, to ensure timely, adequate and accurate disclosure on an ongoing basis.

With the prologue of the SEBI (LODR) Regulations, 2015 an attempt has been made to mandate disclosures by a listed entity in an adequate, accurate and timely manner by proper and timely disclosure through different reports before their stakeholders to maintain transparency between the Company and the shareholders and in order to enhance and retain investor’s trust. The SEBI (LODR) Regulations provide comprehensive disclosure framework that companies will be compelled to comply with in order to maintain their status as listed company. Moreover, the ultimate responsibility to make disclosures has been cast upon the Board of Directors of the listed entity. Thus, Regulation 34 has also introduced the concepts of transparency and accountability in a stricter sense which will result in more accurate and adequate disclosures in a timely manner (Annual reports Within 21 work days of being approved and adopted at the AGM). As per clause (f) of sub regulation (2) of the SEBI LODR 2015 Regulation 34, the Annual Report should contain a Business Responsibility Report (Clause 55 of listing agreement) explaining the programs undertaken by the listed companies from environmental, social and governance (ESG) perspective, as per the layout/format as specified by SEBI.

### **Theoretical Background**

Management accountants, academicians, regulators and other practitioners have analyzed and emphasized the role of reporting and disclosure in reducing information irregularity between insiders (management or major shareholders) and outsiders (minor

shareholders, creditors, and other stakeholders). It is not only a commitment of an enterprise to operate in an economic, social and environment sustainable approach while balancing the interests of diverse stakeholders but basic aim of these reporting and disclosure practices is twofold, firstly to help businesses to use their entrepreneurship to effectively contribute to the economic and social betterment of society and secondly to make their operations sustainable in a manner that enables them to meet their contemporary needs without compromising the needs of the future generation.

Now a day’s business organizations are more and more seen as decisive components of social system and they are considered responsible not merely to their stakeholders from a returns and profitability perspective but also to the society as whole which is also regarded as its stakeholder. Consequently, adoption of responsible business practices in the interest of the social set-up and the environment are as crucial as their financial and operational performance. This is all the more relevant for listed entities which, considering the fact that they have accessed resources from the public, have an element of public interest involved, and are obligated to make extensive continuous disclosures on a regular basis. The key areas required to be reported by the entities include environment, social, governance and stakeholder relationships. This SEBI directive has been applicable to the listed companies from April, 2016 and remaining companies would be fall under its ambit in a phased approach.

### **Indian Companies Listed in Fortune Top 500 Companies**

The Fortune Global 500 is an annual listing compiled and published by Fortune magazine which ranks 500 major corporations by their total revenue for particular fiscal years. This model of the Fortune 500 was created by Edgar P. Smith, a Fortune editor, and the foremost list was published in the year 1955. The listing includes public companies, along with privately

held corporates for which revenues are publicly available. In FY 2015-16, seven Indian companies made into the list of the 'Fortune 500' list of the world's biggest corporations, the same number as last year 2014-15.

**Table: 01: Top Indian Companies Listed in Fortune Top 500 Companies**

Sl. No.	Name of Company	Ranking in 2016	Ranking in 2015	Revenue (\$M)	Sector/Industry
1	Indian Oil Corporation Ltd.	161	119	\$54,711	Oil & Gas
2	Reliance Industries Ltd	215	158	\$43,437	Oil Gas power
3	Tata Motors	226	254	\$42,092	Automobiles
4	State Bank of India	232	260	\$41,681	Banking
5	Bharat Petroleum Corp Ltd.	358	280	\$29,082	Petro
6	Hindustan Petroleum Corp.	367	327	\$28,829	Petro
7	Rajesh Exports Ltd.	423	---	\$25,237	Gems & Jewelry

**Sources:** <http://beta.fortune.com/global500/list/filtered?hqcountry=India>

Majority of state-owned companies from India dominate the list. Among Indian Firms, Indian Oil Corporation ranked the top at 161st, but ONGC has moved out of the rank for 2016. Indian Oil Corporation Ltd. is followed by State Bank of India (SBI), Bharat Petroleum Corporation Ltd. and Hindustan Petroleum Corporation Ltd. In comparison, more than 100 Chinese companies made it to the list, behind only the US, which had the most companies. Over a dozen new companies from China made it for the first time on the list. In 2015-16 Indian private gems and jewellery major Rajesh Exports has been listed for the first time on the list at 423rd position. Among private sectors firms Reliance Industries Limited top ranked on 215, followed by Tata Motors. Overall, Walmart topped in the list, followed by State Grid and China National Petroleum.

## Literature Review

The lack of interest towards the degree of corporate disclosure and reporting followed by poor corporate governance in the corporate world led the global economy to face financial scandals, and frauds. The accounting meaning of disclosure is not very exhaustive since it talks about revealing information with respect to the financial statements. When we are trying to seek information about a business, how it is being conducted, how it is performing when performance in itself has many contexts so mere accounting definition is not sufficient. There are various users of accounting information with their diverse needs for such information. Hence the explanation of disclosures as provided by GRI G3 Guidelines is more apt which states “Disclosure is the practice of measuring, reporting, and being accountable to internal and external stakeholders so as to provide a balanced and reasonable representation of performance (National Voluntary guidelines, 2011)”.

Disclosure is an “act or process of revealing or uncovering (The Free Dictionary, 2013).” In accounting terminology disclosure is defined as a “statutory or good faith revelation of a material fact (or an item of information that is not generally known) on a financial statement or in the accompanying notes e.g. footnotes (The Business dictionary, 2013)”.

Cooke, T. E. 1989 in his paper examined the extent of corporate annual report disclosure in Sweden and further tries to find an association between a number of corporate characteristics and extent of disclosure. In order to capture disclosure a scoring sheet was developed. 224 items were listed in the scoring sheet which were distributed under financial statements, measurement and valuation methods, ratios, statistics and segmental information, projections and budgetary disclosures, financial history, social responsibility accounting. It was

inferred that the capital needs and foreign regulation led to more disclosures in case of companies with more disclosures.

S P Kothari, J E Short, 2003 emphasized the importance of corporate disclosures and its impact on the financial health of the company. Although the study was successful in providing empirical evidence demonstrating the importance of positive news disclosure on cost of capital yet there have been no findings which suggest the impact of negative news disclosures. The information analysis suggests strong and different patterns in disclosure content made by firms, analysts and the press and laid emphasis on the role of agency in assessment. This was found that as the role of information intermediaries increased, the level of information discerned also goes up. The sample comprises of companies in four sectors- Pharmaceutical, Telecommunication, Financial Services and Technology and four electronic data sources were accessed- Dow Jones Industrial, Investex, Factiva and Securities and Exchange Commission's Edgar site. The researchers not only studied the annual reports of the companies concerned but also include all other disclosures made by companies.

Mohammad Hossain, 2008 in his paper "The extent of disclosures in annual reports of Banking Companies: the case of India" argued attributes like size, profitability, board composition and market discipline are significant in explaining the extent of disclosures. The study empirically examines the extent to which Indian listed banks disclose mandatory and voluntary items in their annual reports. The sample size covered all the banks listed on BSE and NSE in the year 2004. A list of mandatory and voluntary items were selected by the researcher and the study revealed an average score of 88 in case of mandatory disclosures which was much higher than the average score of 25 in case of voluntary disclosures. This paper

was a major contribution in the concerned field showing that disclosure and high compliance could be attained through a strong monitoring system.

Mohammed Hossain, Helmi Hammami, 2009 argued in their study "Voluntary disclosure in the annual reports of an emerging country: The case of Qatar" that some of the company specific factors that are significant in explaining the extent of voluntary disclosures are age, size and asset-in-place. The study focuses on finding out the factors which determine the extent of voluntary disclosure in the annual reports of listed firms in Qatar. The sample selected is 25 listed firms of Doha Securities Market (DSM) in Qatar, constitute almost 86% of the total market. The study based on relationship between company – specific characteristics and voluntary disclosures of the sample.

Ragini, 2012 examined a comparative study of Intangibles disclosure practices among Indian, US, and Japanese companies for a period of five years. The study developed a disclosure index of 180 items both mandatory and voluntary to examine the type and extent of disclosures. Both univariate and multivariate techniques were used to analyze the data. In order to test the difference between the disclosures score over the years Wilcoxon matched pair-sign rank test and paired t-test were used. It was found that though the disclosures have improved over a period in these countries. In context of India it was suggested that narrative nature disclosures should be emphasized by accounting and regulatory authorities to improve the level and extent of disclosures.

### **Objective**

The present study aims to identifying and analyzing the contents and extent of corporate governance disclosure scores and disclosures in business responsibility reports under clause 49 and clause 55 in the annual reports by top Indian

companies listed in Fortune top 500 companies.

### **Hypothesis**

H1: There is no significant mean difference amongst disclosure scores of firms.

H2: There is no significant difference between corporate governance disclosure scores and disclosures in business responsibility reports of selected companies.

### **Need for the Study**

The disclosure and reporting mandate by SEBI is part of larger efforts to advance corporate governance disclosure practices and more transparency in terms of reporting of various socially responsible activities carried out through SEBI's LODR Regulations 2015. One of the serious facet of accountable business is that businesses should not only be responsible but they should also be seen as socially, economically and environmentally responsible by Better disclosure and greater transparency through responsible reporting ensuring mandatory compliance of corporate governance norms.

### **Methodology**

The nature of the said research work is analytical to measure the reporting practices by the selected listed seven Indian companies, which are top Indian companies listed in Fortune top 500 companies are selected for the purpose of this study viz., Indian Oil Corporation Ltd., Reliance Industries Ltd, Tata Motors, State Bank of India (SBI), Bharat Petroleum Corporation Ltd. and Hindustan Petroleum Corporation Ltd. Being listed Indian companies got listed in Fortune top 500 companies; they came under mandatory disclosure of BRR as per SEBI Clause 55. This study is based on the secondary data collected from annual reports/responsibility reports from the websites of the selected companies based for the year 2014-15.

The study calculated the governance disclosure and responsibility reporting disclosure score for companies further Bivariate Analysis (Parametric test) ANOVA has been used to generalize the hypothesis; since ANOVA is probably the most useful technique in the field of statistical inference (Montgomery 2001, p 63). As explorative statistical analysis, an ANOVA is an organization of additive data decomposition, and their sum of squares specifies the variance of all component of the decomposition (or, equivalently, each set of terms of a linear model). It is computationally elegant and relatively robust against violations of its assumptions. ANOVA has long enjoyed the status of being the most used (some would say abused) statistical technique (Howell 2002, p 320).

### **Limitations of the Study**

Due to nature of the topic, this study is subject to certain limitations. The key limitations are:

- The limited disclosure index may be considered as limitations, results may be more robust.
- Only six companies have been selected for the study, results may be stronger, if more listed companies would be included under study.

### **Discussion and Analysis**

Ho has tested by using test of significance ANOVA that has applied on the final score index data. All such tests have some assumptions that are tested first and if data satisfy those assumptions only then proposed test can be applied on the data. There are some assumptions of ANOVA that have been tested first. These assumptions are samples are independent, Normality of data and Samples have equal variance. Since all data sets and samples of different companies are naturally independent to each other. Equality of variances of samples has

been tested by using Levene’s Test of Homogeneity (see table 3).

Table: 02. Normality Test: (Kolmogorov-Smirnov Test)

		Disc_Score
N		6
Normal Parameters <sup>a,b</sup>	Mean	77.67
	Std. Deviation	12.738
	Absolute	.200
Most Extreme Differences	Positive	.200
	Negative	-.134
Kolmogorov-Smirnov Z		.490
Asymp. Sig. (2-tailed)		.970

Table: 03. Test of Homogeneity of Variances

DISC Index

Levene Statistic	df1	df2	Sig.
2.900 <sup>a</sup>	2	13	.091

a. Groups with only one case are ignored in computing the test of homogeneity of variance for DISC Index.

Table: 04. ANOVA

Disc\_Score

	Sum of Squares	Df.	Mean Square	F	Sig.
Between Groups	89.333	3	29.778	.082	.963
Within Groups	722.000	2	361.000		
Total	811.333	5			

The data is satisfying all the assumptions of the ANOVA test of significance, thus this tool found to be appropriate for testing Ho. Given that  $p=0.970$  we would conclude that each of the levels of the Independent Variable (Disclosure) are normally distributed at 5 % level of significance. Therefore, the assumption of normality has been met for this sample (See table 2). Since the p value is more than 0.05 at the 5% level of significance depicts that all samples have equal variances thus Ho is accepted that means there is no significant difference in the disclosure practices of the companies and all are performing at par. Table No. 04 from the ANOVA (ANOVA output) is the

key table because it confirms whether the overall F ratio (F test) for the ANOVA is significant. Based upon the sample data, it is concluded that, result of the ANOVA test reveals that there is no statistically significance difference between governance disclosures & disclosures in business responsibility report adopted by selected Indian companies. The finding is contrary to (Ragini, 2012) but consistent with (Verma & Saxena, 2016). The findings are contrary to the theory that difference between governance disclosures & disclosures in business responsibility report adopted by Indian companies.

## **Conclusion**

As the business for sustainability emerges stronger with every passing year, policy-makers and regulators across the world have been seeking better disclosure in order to induce the corporate sector to acknowledge and manage the environmental and social externalities of their business operations and to make their governance processes more robust and transparent. The study has carried out to research objectives connecting to disclosure and reporting practices by selected Indian companies. In this, the comparison of extent of disclosure and reporting practices in business responsibility reports has been considered. When regulatory guidelines and standards being adopted and companies characteristics have an influence on disclosure score. The quality of accounting standard and strict adherence of the accounting standard leads to higher disclosure score. The mode of reporting practices has an impact on disclosure score. The total disclosure index framed for these categories have scored against the disclosed information. The hypothesis of no significant difference between the disclosure practices adopted by selected Indian companies has been accepted because the ANOVA test shows that all the companies Indian Oil Corporation Ltd., Reliance Industries Ltd., Tata Motors, State Bank of India, Bharat Petroleum Corporation Ltd., Hindustan Petroleum Corporation Ltd. and Oil and Natural Gas Corporation are at par with regard to their disclosure and reporting practices in their annual reports at the 5% level of significance.

## **References**

1. Business Responsibility Disclosures: IICA-GIZ Business Responsibility Initiative. (December, 2014) Price water house Coopers Private Limited.
2. Cooke, T, E. (1989). Disclosure in the Corporate Annual Reports of Swedish Companies, Accounting and Business Research.
3. Dagar, Kailash. & Dagar, Dhanraj. (2014). Business Responsibility Report – An Effective Tool to Encourage Social Welfare Measures, Chartered Secretary. Vol.XLIV, No.14, 48-53.
4. Gelos, R. Gaston. & Wei, Shang-Jin. (2005). Transparency and International Portfolio Holdings, The Journal of Finance. Vol- Lx, No-6.
5. Hossain, Mohammed. & Hammami, Helmi. (2009). Voluntary disclosures in the annual reports of an emerging country: The case of Qatar, Advances in accounting incorporating advances in international accounting, Elsevier. 25, 255-265, doi:10.1016/j.adiac.2009.08.002.
6. Howell, David C. (2002). Statistical methods for psychology (5th ed.). Pacific Grove, CA: Duxbury/Thomson Learning. ISBN 0-534-37770-X.
7. [http://www.hbs.edu/faculty/Publication%20Files/11-100\\_35684ae7-fcdc-4aae-9626-de4b2acb1748.pdf](http://www.hbs.edu/faculty/Publication%20Files/11-100_35684ae7-fcdc-4aae-9626-de4b2acb1748.pdf)
8. <http://beta.fortune.com>
9. Kothari, S. P. & Short, J. E. (2003). The Importance of Corporate Disclosures: How Market Transparency Affects the Firm's Financial Health, Centre for eBusiness, Vol II No.2.
10. Kumar, Alok., & Pandey, Shri Narayan. (2015). Environmental Accounting of Mahartna Companies. The Management Accountant, 20-25.
11. Montgomery, Douglas C. (2001). Design and Analysis of Experiments (5th ed.). New York: Wiley. ISBN 978-0-471-31649-7.
12. Ragini. (2012). Corporate Disclosure of Intangibles: A Comparative Study of Practices among Indian, US, and Japanese Companies. Vikalpa, Volume 37, No 3, July- September.
13. SEBI Annual Reports ([www.sebi.com](http://www.sebi.com)).
14. The Consequences of Mandatory Corporate Sustainability Reporting. (2012) Ioannis Ioannou (London Business School) & George Serafeim (Harvard Business School), Harvard Business School Working Paper, 11-100.
15. Verma, Sachin. & Saxena, Praveen. (2016). Corporate Transparency & Disclosure Practices, IJETSR, vol. 03, issue 01.

## Reasons for Flaws & Failure in M&A: An Empirical Study

Y. Nagaraju\* & Samiya Mubeen\*\*

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### Abstract

*Mergers and Acquisitions(M&A) have become the most widely used corporate strategy for restructuring and strengthening of business to achieve greater market share, long term profitability, entering new markets, capitalizing on economies of scale, etc. M&A is an ongoing phenomenon, where many companies fail and succeed in their M&A deals. Globalization, liberalization, technological developments and intensely competitive business environment have given a boost to M&A deals. The synergistic gains from M&As effect on efficient management, economies of scale, profitability, exploitation of market power, the use of complementary resources, etc. Many empirical studies show that M&As fail to create value for the shareholders of acquirers. This study was conducted in order to analyse causes of the flaws and failure in post M&A Performance. Cultural compatibility and financial aspects were taken to analyse the post M&A performance of the companies in the study. The data was collected from both Primary and Secondary sources. The data analysis has been done by using statistical software tool LISREL 9.20, SPSS 16, and Excel. The sample for the study was taken from Fortune 500 companies. Select Two hundred companies/firms has taken for the study out of which, 115 responded and gave filled online questionnaire (Google forms) .The data has been, Bootstrapped to 380 companies/firms. Major findings of the study indicate that financial aspect has more impact than cultural compatibility. Financial aspects are one of the reasons for the failure of mergers and acquisition. More prominence has to be given to the integration of financial aspects at the deal, so that the flaws can be reduced and success rate increased in the M&A deals.*

### Introduction

The Boston Consulting Group's 2015 M&A report, "From Buying Growth to Building Value": Increasing Returns with M&A, shows that M&A can make development and esteem yet just when arrangements are all around planned and post-merger integration (PMI) is viably executed. In 2015 Corporate Leaders M&A Survey, four of the most cited reasons for deal failure (by half or more of the respondents) relate to PMI:

- Poor Integration
- High Complexity
- Difficult Cultural Fit
- Low Synergies.

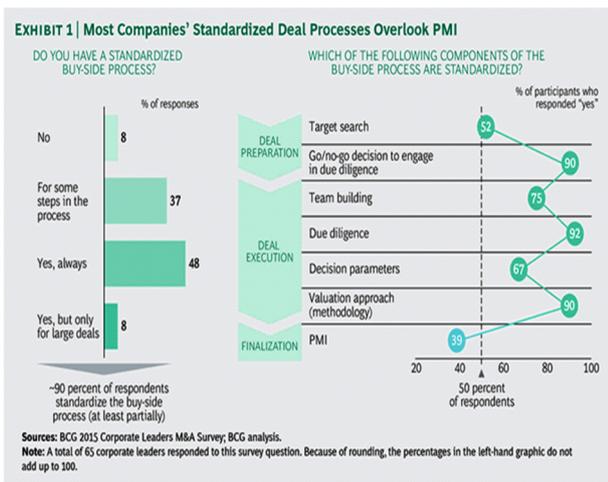
While most companies have standardized processes for such endeavors as target search, due diligence, and valuation methods, less than 40 percent have a standardized approach to PMI. (See Exhibit 1.)

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### About the Authors

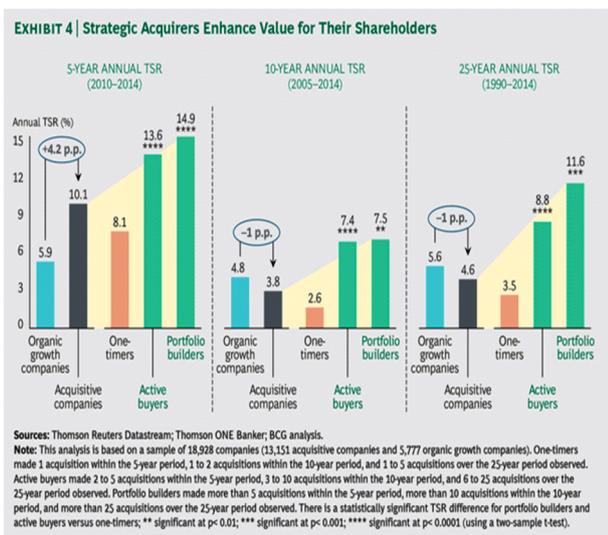
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(Source: <https://www.bcgperspectives.com/content/articles/mergers-acquisitions-divestitures-why-deals-fail/>)

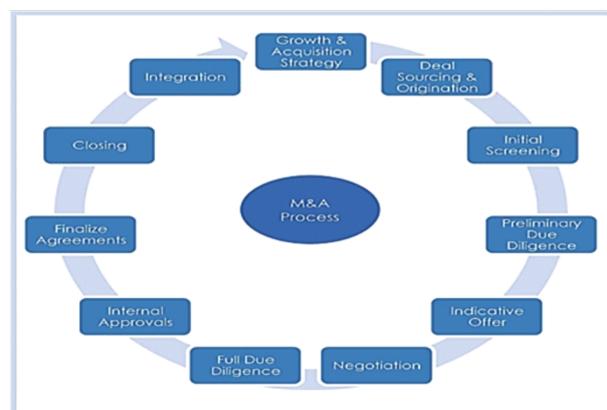
Only 47 percent of all deals produce a positive relative total shareholder return one year after the transaction date. The information demonstrates why in M&A, careful discipline brings about promising results or sufficiently closes. Vital acquirers that make general acquisitions improve for their shareholders. Dynamic purchasers and portfolio developers accomplish yearly Total Shareholder Return (TSR) rates generously higher than those accomplished. (See Exhibit 4.)



(Source: <https://www.bcgperspectives.com/content/articles/mergers-acquisitions-divestitures-why-deals-fail/>)

In 2016, many companies announced over 44'000 transactions with a total value of more than 4.5 trillion USD (4.1 trillion USD/2.9 trillion GBP). Compared to 2014, the numbers of deals grew only marginally by 2.7% while the value rose at 16%. Despite the highest degree of strategy and planning and investments of hundreds of crores, the majority of the mergers and acquisitions cannot create a value and fail miserably. In 1987, the professor of Harvard, Michael Porter found that around 50% to 60% of the mergers and acquisitions ended in a failure. In 2004, McKinsey also found that only 23% acquisitions ended in a positive note on investment. In its strictest sense, the term merger and acquisition describes two different phenomena. A merger is the unification of two or more firms into a new one. While an acquisition is one company's purchase of the majority of the shares from another (Bressmer et al. 1989, Pausenberger 1990, and Brauchlin 1990).

### Merger & Acquisition Process



(Source: [yahh.dvrlists.com](http://yahh.dvrlists.com))

M & A process gives a clear plan for the deal execution between corporates, so that integration of the deal creates synergy. Merger and Acquisition process is the most challenging and most critical one when it comes to corporate restructuring. One wrong decision or one wrong move can actually reverse the effects in an unimaginable manner. It should certainly be followed in a way that a company can gain

maximum benefits with the deal. Many studies have been conducted on Mergers and Acquisition, on different factors like organizational behavioral, financial parameters, value creation, and building synergy in a process. Few studies have also identified the successful mantra and reasons for failures in M&A. Majority of the findings on failure in M&A states the following reasons

### **1. Excessive Premium**

In a competitive bidding situation, a company may tend to pay more. When the acquirer fails to achieve the synergies required compensating the price, the M&As fails.

### **2. Poor Cultural Fits**

Cultural fit between an acquirer and a target is one of the most neglected areas of analysis prior to the closing of a deal. However, cultural due diligence is every bit as important as careful financial analysis. Cultural due diligence involve steps like determining the importance of culture, assessing the culture of both target and acquirer. It is useful to know the target management behaviour with respect to dimensions such as

- Centralized versus decentralized decision making
- Speed in decision making
- Time horizon for decisions
- Level of team work
- Management of conflict
- Risk orientation
- Openness to change etc.

### **3. Poor Organization Fit**

Organizational fit is described as "the match between administrative practices, cultural practices and personnel characteristics of the target and acquirer." It influences the ease with which two organizations can be integrated during implementation. Mismatch of organization fit leads to failure of mergers.

### **4. Poor Strategic Fit**

A Merger will yield the desired result only if there is strategic fit between the merging companies. Mergers with strategic fit can improve profitability through reduction in overheads, effective utilization of facilities, the ability to raise funds at a lower cost, deployment of surplus cash for expanding business with higher returns.

### **5. Incomplete and Inadequate Due Diligence**

Lack of due diligence is lack of detailed analysis of all important features like finance, management, capability, physical assets as well as intangible assets results in failure.

### **6. Ego Clash**

Ego clash between the top management and subsequently lack of coordination may lead to collapse of company after merger. The problem is more prominent in cases of mergers between equals.

### **7. Flawed Intention**

Flawed intentions often become the main reason behind the failure of mergers and acquisitions. Companies often go for mergers and acquisitions getting influenced by the booming stock market. Sometimes, organizations also go for mergers just to imitate others. In all these cases, the outcome can be too encouraging.

- Ignorance
- No common vision
- Team resourcing
- Poor governance
- Poor communication
- Poor programme management
- Lack of courage
- Weak leadership

### **Literature Review**

Researcher studies have examined the bad performance of mergers and acquisition from

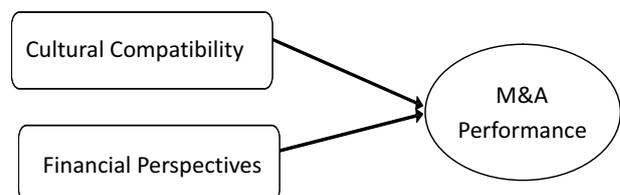
various aspects. The very observable aspects like finance, stock market and legal issues. However, with the growing rates of failure, Researchers and business analysts started acknowledging the facts that this poor performance leads to conflict and failure. Many researchers analysing the impact of M&As flaws and failure on various parameters which is as follows

Sl. No.	Authors / Researcher	Year	Findings/ Observation
1	Datta	1991	Organizational fit
2	Datta	1992	Emphasize the impact of the bidding process on M&A performance.
3	Cartwright and Cooper	1992	Cultural compatibility
4	Weber	1996	Cultural fit
5	Peter Dixo,	1998	Lack of Communication
6	Irene Rodger	1999	Corporate Culture Differences
7	Marks and Mirvis	2000	Managerial Reasons
8	Wayne R. Pinnel	2001	Loss of Customers
9	Raymond	2002	60-80% of all mergers are financial failures when measured by their ability to outperform the stock market or to deliver profit increases.
10	Anne Freedma	2002	58% of mergers failing to achieve their stated goals
11	De Pamphilis D.	2005	Found that overpayment often has destroys consequences, overpayment leads to expectation of higher profitability which is not possible
12	Dogra	2005	Acquisition goodwill plays a major role in the evaluation of the purchase price
13	Thomas Straub	2007	Issues on Integration
14	Marina Marty nova, Sjoerd	2007	Profitability of the combined firm

15	Maria Koul	2009	Cultural differences
16	Meena Smita	2011	Financial Performances
17	Dr. K.A. Goyal and Vijay Joshi	2012	Policy Makers, Strategy Makers, HR People,
18	Nihan yildirin and Seda Birinci	2013	Organizational change
19	Neelam Rani,Surendra S. Yadav and P. K. Jain	2013	Abnormal Returns
20	V Radha Naga Sai and Dr. Syed Tabassum Sultana	2013	Financial Ratios
21	Sohini Ghosh, Dr Sarboni Dutta	2014	Financial parameters such as PAT ratio, EPS, Market share
22	Ramachandran Azhagaiah and Thangavelu Sathishkumar	2014	Operating Performance
23	Yanki Hartijasti and Gottfried Hotma Toar	2015	Corporate culture
24	Syazliana Astrah Mohd Idris, Rabiah Abdul Wahab and Aini Jaapar	2015	Cultural integration
25	Wieke Otterspeer	2016	Cultural difference

### Need for the Study

There is no doubt that M&As have been and continue to be a popular strategic alternative to organisation growth. Very few study done on the various factors, but for the study two prime causes (Cultural compatibility and financial aspect ) has taken for the analysis to determine the failures flaws in the post M&A performance .



## Objectives

- To analyse the impact of cultural compatibility on M&A performance
- To analyse the impact of financial aspects on M&A performance

## Research Design

The research began with a discussion of the theoretical background, that the cultural compatibility of mergers and acquisitions (Cartwright and Cooper 1992). An analysis of the definition helped to get the item variables which influence on failure of mergers and acquisition. These variables were factored and regressed to get the latent variables (cultural compatibility and financial perspectives). Analysis of the proposed theoretical model, using the Structural Equation Modeling (SEM) method, for cultural compatibility and financial perspectives was done through the SPSS 16, LISREL 9.20 and Excel was used. Data collection is done by both primary and secondary data. Primary Data Questionnaire is developed and given to the head of M&A, managers, executives, member of board of director and other(Google forms online survey) and Secondary Data collected by respective websites of firms and company and online links such as Fortune 500 firms and companies, Google forms, Wikipedia, economy-watch, BCG perspectives.The Fortune 500 Firms and Company as population taken for the study on which the sample of select 200 companies/firms has taken out which, 115 firms /companies responded and gave filled online questionnaire (Google forms) and later the data was, Bootstrap to 380 firms and companies. The Duration of the study July – Nov 2016 and the Sample Frame taken for the study is firms and companies located in Bangalore. The scale items were checked for reliability measures with a Cronbach Alpha of 0.882. According to Nunnally (1978), Alpha values greater that 0.7 are considered indicators of sufficient reliability.

Values above 0.8 are indicators of strong reliability. Respondents were asked to rate each question on a 5-point Likert Scale, ranging from "strongly disagree" to "strongly agree". Each construct had two items. There were totally 07 questions to measure the various aspects of the research paper, as the nature of the paper is descriptive in nature.

## Research Gap

As a research gap many study has been conducted on organisation behaviour, cultural fit, cultural difference and pre and post financial performance, but in this paper an attempt is made in order to link both cultural compatibility and financial aspect and analyse the impact on reasons for failure of M&A. To ascertain this hypothesis is framed.

## Hypothesis

**Hypothesis 1:** Cultural compatibility has a significant influence on post-M&A performance.

**Hypothesis 2:** Financial aspects have significant influence on post- M&A performance.

## Data Analysis and Interpretation

### Reliability Analysis

Particulars	Question	Cronbach's Alpha
Cultural Compatibility	Q1-Q3	<b>0.913</b>
Acquisition Premium	Q4-Q5	<b>0.879</b>
M&A Performance	Q6-Q7	<b>0.819</b>

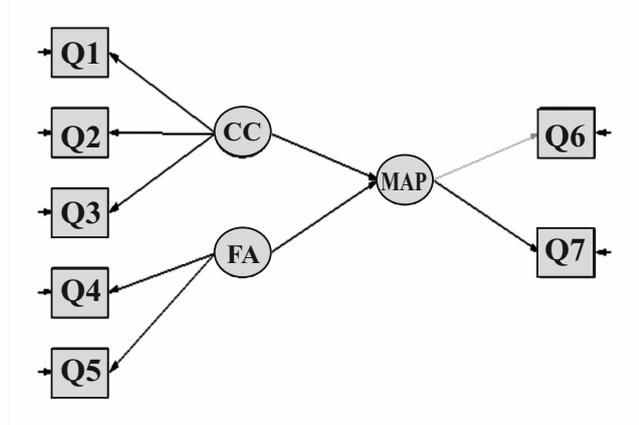
**(Source: Primary data calculated by using SPSS)**

Cronbach's Alpha overall from question 01 to question 07 is 0.882. According to Nunnally (1978), Alpha values greater than 0.7 are considered indicators of sufficient reliability. Values above 0.8 are indicators of strong reliability.

**Statistical Tools**

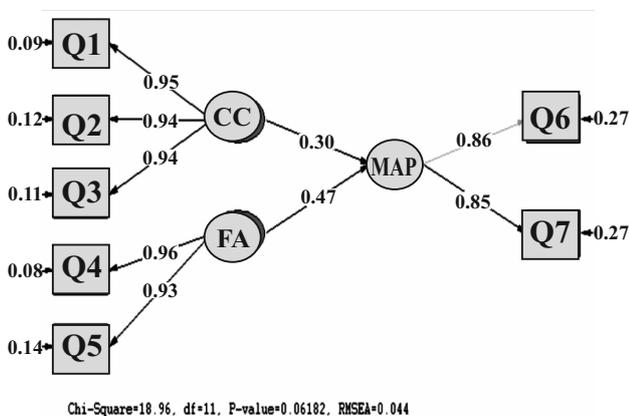
The Structural Equation Modelling (SEM) techniques are by far covariance-based methods as implemented by software such as LISREL 9.20. Usually, SEM-based approaches give the researcher flexibility to: determine model relationships between multiple predictor and criterion variables construct unobservable latent variables, model errors in measurements in respect of observed variables, and, finally, statistically test a priori substantive/theoretical and measurement assumptions against empirical data (i.e., Confirmatory Analysis).

**Conceptual Diagram**



Source: (Primary data calculated by using LISREL 9.20)

**Standardized Solution**



Source: (Primary data calculated by using LISREL 9.20)

**Threshold Values Calculated by using LISREL 9.20**

Threshold Values	Std. Value	Observed Value
P-value	>0.05	<b>0.0618</b>
RMSEA	<0.07	<b>0.044</b>
GFI	>0.95	<b>0.986</b>
AGFI	>0.95	<b>0.965</b>
CFI	>0.95	<b>0.997</b>
SRMR	<0.08	<b>0.0104</b>

Source: (Primary data calculated by using LISREL 9.20)

**Major Findings**

The overall objective of this paper is to develop empirically confirm a comprehensive research framework that bridges rival perspectives and promotes a modern understanding of factors underlying M&A performance and identify the flaws for frequent failures. The first important step towards this objective was the development of a common frame of reference that spans conflicting theoretical assumptions from different perspectives. On this basis, a framework was proposed with which to understand the M&A performance better and address the problem of fragmentation by integrating the most important competing perspectives in respect of studies on M&A performance. The two contributing factors towards M&A success are cultural compatibility (acquisition experience, relative size, and cultural differences) and financial aspects (acquisition premium, bidding process, and due diligence). In contrast to the previous construct, cultural compatibility, the results regarding the hypothesis varied less in the statistical methods used for the testing. In sum, the variables indicated a very positive and, in some cases, even significant to highly significant effect on

M&A performance. Due diligence was by far the best indicator and proved highly significant in statistical methods. The main objective is to ascertain that M&A performance is influenced by two distinct prime causes cultural compatibility and financial aspects. As a result the cultural compatibility shows the 0.30 loading on M&A performance and the financial aspects are 0.47 loading on M&A performance. Hence the impact of the financial aspect is more prime cause compare to cultural compatibility for the failure of mergers and acquisition.

### **Managerial Implications**

M&A is on-going strategic process which is used worldwide in order to achieve growth and profitability to the organisation. When M&A happens manager has to be given more importance for the cultural aspects so that profitability can be enhanced by the organisation. The finance aspects suggests that finance has a significant effect (reflected by the manifest variables: acquisition premium, bidding process, and due diligence) on M&A performance (reflected by the manifest variables: synergy realization, relative performance, and absolute performance). Finally, all financial aspects regarding the price of an M&A do matter and have been crucial for post-M&A performance. In other words, according to the sample, the results lead to the assumption that the reasons for past M&A activities' failure are due to the fact that the acquiring firm could have selected the wrong target (strategic logic such as market similarity, market complementarily, production operation similarity, production operation complementarily, market power, and purchasing power), the target firm could have been poorly integrated cultural compatibility (acquisition experience, relative size, and cultural differences) and the acquiring firm could have paid too much acquisition premium, bidding process, and due diligence (Financial Aspects).

### **Limitations of the Study**

To limit the scope of the study, limitations were applied, such as limitations in relation to the countries included in the study, the size of the M&A, the extent of the database and the timeframe. Moreover, single key informants were utilized for the collection of data. Each of these limitations could influence the validity of the outcomes. Nevertheless, all effort was made to ensure that the outcomes' data quality was satisfactory. In respect of the model as it was used in this study, which revealed different constructs and underlying manifest variables that are important in explaining M&A performance, the comprehensive model fails to capture reality in its full complexity. In reality, there could be interactions among the various perspectives, for example, between strategic logic (market similarity, market complementarily, production operation similarity, production operation complementarily, market power, and purchasing power) proved their importance, indicating a significant impact on M&A performance) and financial aspects. Generalizing to other contexts should therefore be undertaken with care. Moreover, single key informants were utilized for the collection of data. Nevertheless, all effort was made to ensure that the outcomes' data quality was Satisfactory.

### **Suggestions for Future Research**

In terms of further research, it is tantalizing to note that strategic logic, organizational behaviour, and financial aspects seem to lead to improved performance. Future research could lead to additional variables being revealed or even new perspectives, and establish their importance regarding M&A performance. Furthermore, because the comprehensive framework separates variables and perspectives, it is possible to replace them and insert new ones. In addition, future research could lead to additional variables being revealed or even new

perspectives, and establish their importance regarding M&A performance. As the present model is quite flexible, these variables could easily be included or added. Furthermore, because the comprehensive framework separates variables and perspectives, it is possible to replace them and insert new ones. Curiosity could be aroused for further research by enlarging the model to include more qualitative aspects. These insights would lead to a better and deeper comprehension of M&A performance. Alternatively, the results could encourage further research into the following two directions: One would be towards a larger sample study, and, if possible, an even more detailed one. That would allow a more complex analysis, contributing to more confidence in the findings, thus avoiding some of the discussed limitations in this study's methodology. The other direction would be to add smaller M&A as, given their more local focus, they are likely to have different patterns.

## References

1. Agrawal A., Jaffe J. F., Mandelker G. N. 1992. The Post-Merger Performance of Acquiring Firms: A Re-examination of an Anomaly. *The Journal of Finance* XLVII(4): 1605-1621.
2. Anne Freedman "Assessments Key to Merger Success", *Human Resource Executive Magazine*, April 2002
3. Berger P. G., Ofek E. 1995. Diversification's effect on firm value. *Journal of Financial Economics* 37(1): 39-65.
4. Berger P. G., Ofek E. 1999. Causes and effects of corporate refocusing programs. *Review of Financial Studies* 12(2).
5. Cartwright J., Andrews T., Webley P. 1999. A methodology for cultural measurement and change: A case study. *Total Quality Management* 10(1): 121- 128.
6. Cartwright S., Cooper C. L. 1990. The Impact of Mergers and Acquisitions on People at Work: Existing Research and Issues. *British Journal of Management* 1(2): 65.
7. Cartwright S., Cooper C. L. 1992. *Mergers & Acquisitions: The Human Factor*. Linear House: Oxford.
8. Cartwright S., Cooper C. L. 1993. The role of culture compatibility in successful organizational marriage. *Academy of Management Executive* 7(2): 57.
9. Cartwright S., Cooper C. L. 1995. Organizational marriage: "hard" versus "soft" issues/ *Personnel Review*, Vol. 24: 32. Emerald.
10. Dr. K.A. Goyal and Vijay Joshi, *Merger and Acquisition in Banking Industry: A Case Study of ICICI Bank Ltd.*, *International Journal of Research in Management* ISSN 2249-5908 Issue2, Vol. 2 (March-2012).
11. <http://fortune.com/2016/06/13/12-biggest-mergers-and-acquisitions-of-2016/>
12. <https://prowess.cmie.com>
13. <https://www.google.co.in/forms>
14. <http://en.wikipedia.org>
15. <http://www.economywatch.com/merger-acquisitions/history.html>
16. <http://fortune.com/2016/06/13/12-biggest-mergers-and-acquisitions-of-2016/>
17. <https://www.bcgperspectives.com/content/articles/mergers-acquisitions-divestitures-why-deals-fail>
18. Irene Rodger, "Culture Bridging for International Performance", *Personnel ANDCP*, April 1999.
19. Maria Koul 2001 "Why Do Mergers and Acquisitions Fail to Create Synergy? Is the Situation Redeemable?", Interview with

- Maria Kouli, \*Deputy Director of the National Bank of Greece, The Executive Issue, Issue 12, 2001.
20. Marina Martynova, Sjoerd Oosting and Luc Renneboog<sup>1</sup>, The long-term operating performance of European Acquisitions, International Mergers and Acquisitions Activity since 1990: Quantitative Analysis and Recent Research , G. Gregoriou and L. Renneboog (eds.), ,Massachusetts: Elsevier, 2007, pp 1-40.
21. Meena Smita, A Study Of Impact Of Mergers And Acquisitions On Selected Sectors In India, Journal of Doctoral Studies. Accounting, Vol 1, No 1-2, 2011, 104-119.
22. Nihan yildirin and Seda Birinci. Impacts of organizational culture and leadership on business performance: A case study on acquisitions, 2nd International Conference on Leadership, Technology and Innovation Management, Procedia - Social and Behavioral Sciences 75 (2013) 71 – 82.
23. Neelam Rani, Surendra S. Yadav and P. K. Jain, Impact of Corporate Governance Score on Abnormal Returns of Mergers and Acquisitions, Procedia Economics and Finance 5 (2013) 637 – 646.
24. Ramachandran Azhagaiah and Thangavelu Sathishkumar, Impact of Merger and Acquisitions on Operating Performance: Evidence from Manufacturing Firms in India , Attribution- Non Commercial-No Derivatives 4.0 International (cc by-nc-nd 4.0) License (<http://creativecommons.org/licenses/by-nc-nd/4.0/>). Volume 12 • Number 2 • Summer 2014, Page: 121 to 139.
25. Raymond Mergers and Acquisitions” MHR 860, Ohio State University Fisher. College of Business, January 17, 2002.
26. Raymond Mergers and Acquisitions” MHR 860, Ohio State University Fisher. College of Business, January 17, 2002.
27. Radha Naga Sai and Dr. Syed Tabassum Sultana, Financial Performance Analysis In Banking Sector – A Pre & Post Merger Perspective, International Monthly Refereed Journal of Research In Management & Technology ISSN – 2320-0073 Volume II, April’ 13, P( 56-66).
28. Sohini Ghosh and Dr Sarboni Dutta , Mergers and Acquisitions: A Strategic Tool for Restructuring in the Indian Telecom Sector, Symbiosis Institute of Management Studies Annual Research Conference (SIMSARC13), Procedia Economics and Finance 11 (2014) 396 – 409.
29. Syazliana Astrah Mohd Idris, Rabiah Abdul Wahab and Aini Jaapar, Corporate Cultures Integration and Organizational Performance: A Conceptual Model on the Performance of Acquiring Companies, Procedia - Social and Behavioral Sciences 172 (2015) 591 – 595.
30. Thomas Straub: Reasons for Frequent Failure in Mergers and Acquisitions. Emerald.
31. Wayne R. Pinnel, “People and Purpose: Tips for a Successful Merger or Acquisition”, Advisor, November 29, 2001.
32. Wieke Otterspeer, The Impact of Cultural Differences on the Performance of Mergers and Acquisitions, s4208412 , Thesis in International Economics & Business Radboud University Nijmegen , Supervisor: Dhr. Prof. Dr. E. de Jong , July, 2016.
33. [www.thomsonreuters.com](http://www.thomsonreuters.com)
34. Yanki Hartijasti and Gottfried Hotma Toar , Assessing cultural transformation from local to global company: Evidence from Indonesian PR Company, Procedia - Social and Behavioral Sciences 172 (2015) 177 – 183.

## Service Quality of Digital Banking and its Impact on Customer Satisfaction: An Empirical Study

Garima Malik\*

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### Abstract

*The Indian government is focusing on digitalization and the banking sector is one of the important key pillars for implementation of the task by digitalizing the banking services. In this aspect, the quality of service given by the Indian banking sector is the most important criterion and asset for evaluating and satisfying customers. It is the quality of service that can increase customer loyalty and can average retention rate of customers. Among the determinants of service quality, reliability, assurance and empathy have always played a pivotal role. The paper attempts to establish concrete relationships between service quality, customer satisfaction and customer retention. Purposive sampling technique was used and the study looked at the impact of knowledge technology (IT) adoption on the chosen bank customers of India. The service quality variables of tangibility, responsiveness and empathy dimensions play an important role in predicting the behavioral intentions of customers as was revealed by the multiple regression analysis that was carried out in the study.*

### Introduction

Online Banking or i-banking (internet-banking) is the practice of making both informational and transactional bank transactions via internet. With just a click of a mouse, online banking allows its customers to make deposits, withdrawals and pay bills. Hence, in i-banking a client has one-to-one interaction with the bank's website, and in such a situation it is essential on the part of bank to provide high quality services over the internet. As compared to traditional banking, i-banking includes non-human interactions between online bank information system and its customers.

E-banking has as an end result turn out to be important channel to sell products and services; most important to a paradigm shift in advertising practices, ensuing in immoderate overall performance within the banking company. The banking enterprise has been undergoing modifications since the mid-990s, in the shape of innovative use of records technology and development in electronic change. This development made e-banking pose as a hazard

to the traditional branch operations, no matter the fact that digital trade continues to be growing and is unexpectedly converting. The significance of digital price system in any United States of America can never be over emphasized, due to the dramatic transformation in technological improvements that is being experienced with the aid of the worldwide monetary corporation.

### Service Quality

Nature of services is an essential component for the customization and expanded profitability and is impacted by clients' fulfillment and devotion. Various studies have been directed on the idea of services quality. Some of them, for example, Bolton and Drew, Parasurman(1988) trusted that the services quality idea is a dubious idea and disregarding numerous dialogs about it, accomplishing the exhaustive definition for services quality is troublesome. Nonetheless, they recognize that services quality is a dynamic and multidimensional idea and is a blend of over a wide span of time shopping encounters. In

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addition, Gronroos (1984) characterized it as a measure and difference between client impression of services and his/her desires. So it can be said that service quality is characterized as the result of viable measures of the service segment and happened when clients got services past their desires.

In e-managing an account research, new measurements were discovered, for example, services automobiles, connections between clients, data access, content, mass customization and usability. As the client endeavored to utilize and adjust to new innovations, their discernment about services quality was impacted by the given advances. Different perspectives for measuring service quality in e-keeping money are as per the following: site appearance, convenience, connections, outline and substance, unwavering quality, productivity, bolster, correspondence, security, inspiration, capacities, stockpiling abilities, services, certainty, modifying store arrangements, notoriety and compassion.

### **Literature Review**

BomilSuh, IngooHan(2007) found the convenience and usefulness of fundamental acceptance of Internet banking in the past decades till now. The concept of internet banking was considered with the belief that users' behavior in dynamic emerging environment changes when their perceivance and acceptance play important role in delivering better output. The study reveals that trust and belief are another two important components that creates impact on acceptance of online banking. The survey reports of 845 cases of web and online users' behavior defines a neutral approach when using online banking. The result analysis of statistical reports indicates that trust of users of online banking has a very significant impact on the acceptance when security of online privacy is considered. Rita Faullant (2008) depicts the role of trust and acceptance generated using specific from of technology trust in the context of internet banking. The

propensities of trust with the hierarchical structure of personality and its applicability to technological systems are considered. The empirical study conducted through survey in Austria defines that internet trust on risk perception and interpersonal behavior all defines there is trust in technology systems. The personality structure in trust and adoption research affects the users' psychology using web characteristics. The paper defines how adoption process in internet banking is generated using propensity of trust and confidence.

K. Ravichandran(2010) banking sector has revolutionized itself since 2005 with the development of internet technology and fast the user internet access. The level of intensive competition has led retail banks to work upon building strategies increasing the service quality level which is affecting customer satisfaction and trust. The buying power of customer has dominated in the online banking platform creating unique platform for each customer as the level of service quality increases this ultimately retains valued customers. Chris Manolis (2010) study based upon private and public banking empirical study of service quality using online banking. The service quality is based upon two aspects SERVAQUAL and Functional Quality. These two factors are defined to compare and contrast the consumers' satisfaction level on online platform. The study defines that there are some potential strengths and weakness of current service quality models which are modified with change of time and the quality satisfaction level has become vital in influencing customers to increase their level of online banking activities. The relationship between customer satisfactions is related to their personal characteristics, income level and personal problems which predefine of what kind of attitude there are showing when using online banking. Kent Eriksson (2009) identified the distribution channel for financial transactions have become changes since the emergence of latest technological advance. The study depicts

that how the technological advancement in Estonia has brought a boom in online banking. The Estonia being a developing country with the customers perceives it as a useful platform to ease their livelihood. The ease of use defines as the level of customer expectation is met and not the well-designed sites or abundant quality features. The consumers' belief that perceived usefulness is all embedded in the technology and that is what banks have to figure out how they will implement such changes. Making a user friendly customer base is very difficult concept for banks as it becomes very complicated when banks prioritize in explaining users online how online banking is much better to gain their trust and confidence.

### **Service Quality and Customer Satisfaction**

Customer satisfaction, quality and retention are major issues that affect all organizations, be it large or small, profit or non-profit, global or local. Quality and customer satisfaction have long been recognized as playing a crucial role for success and survival in today's competitive market. As developed economies are becoming service oriented, meaning that customer impressions play a critical role in this field. A company delivers services to customers, while overall customer attitude towards the company is defined in the relationship between service quality and customer satisfaction. Different research was done on the positive relationship between service quality and customer satisfaction. In the other words, if service quality decreases quickly, customer satisfaction declines dramatically and if service quality grows radically, customer satisfaction rises rapidly too. It can be concluded that there is a relationship between online banking and customer satisfaction which can be studied through SERVQUAL dimensions (Nupur, 2010). An assessment model suggested by Woodside et al. (1989) emphasizes on the relationship between perceived service quality, customer satisfaction and interest in purchasing. The research shows that customer satisfaction is

anmoderating variable between service quality and repurchases interest. In other words, service quality influences customer satisfaction, and customer satisfaction affects repurchase interest.

It can be rightly said that Customer oriented philosophy and the principles of constant up gradation in service levels have justified the fact that customer satisfaction is one of the primary concerns of all types of business organizations. (Arokiasamy, 2013)

Mittal and Frennea (2010) explained customer satisfaction in their study as a consumer's evaluation of a product or service after consuming it.

### **Dimensions for the Study**

Based on the literature review, the research work has been done on the basis the SERVQUAL model for evaluating the connection between on-line service quality and client satisfaction. Future research should seek to examine the use of SERVQUAL to close other service quality gaps for different types of organizations. Also, an important issue for future research is about the relationship between internal service quality and external customer satisfaction as well as other constructs, such as employee service orientation, and external service quality The model suggests four dimensions service quality including

**Table 1: Dimensions of the Service Quality**

<b>Service Quality Dimensions</b>	<b>Definition</b>
Reliability	Involves consistency of performance and Dependability
Responsiveness	Willingness or readiness of employees to provide service.
Competence	Possession of the required skills and knowledge to perform the service
Security	Freedom from danger, risk and doubt
Tangibles	Physical evidence of the service

### Research Methodology

After a comprehensive review of literature, following methodology adopted to achieve the objectives. The analysis work was predicated on quantitative approach and descriptive in nature. The first information was collected regarding the utilization of digital banking by customer’s applications and per the sort of bank. The most aim of this analysis was to understand the shopper’s data regarding digital banking and its uses.

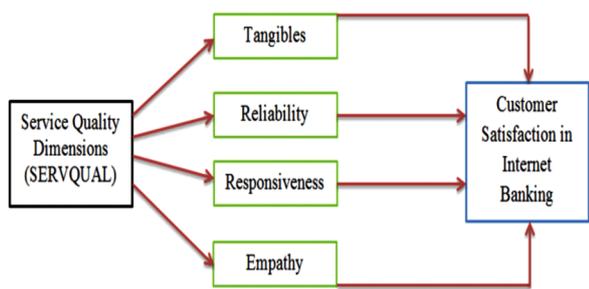


Figure1: Analysis Hypothesized model

### Objectives of the Study

- To understand the perceived and actual level of service quality and performance provided by banks through online channels.
- To understand the factors determining the level of customer satisfaction in online banking services using various service quality dimensions

For the aim of the study, survey was used as an information assortment methodology. The study has utilized the form developed by Han and Beak (2004) to live on-line banking service and client satisfaction. The form consists of nineteen queries on on-line banking service quality dimensions specifically, Tangibles, dependableness, Responsiveness, and fellow feeling. For understanding the importance and satisfaction of service quality dimensions, a 5-likert scale was used (1=strongly disagree, 5=strongly agree). Han and Beak introduced a changed version of the SERVQUAL instruments. Supported their study, the changed version is suitable instrument for measurement the standard of on-line banking services and

assessing the amount of client satisfaction.

### Validity and Reliability of Questionnaire

The questionnaire is designed using the standardised instrument as suggested by Parasuraman et al, 1988. So the questionnaire was modified to make it suitable to the purpose of study. The questionnaire thus ensures high degree of content and structural validity. In order to examine reliability of questionnaire, Cronbach's Alpha was used. Based on this method, the first 25 primary questionnaires were distributed among customer. Then, Cronbach's Alpha score was calculated for both the questionnaire. Calculated Cronbach's Alpha in the study for perception based questionnaire is 0.783 and for customer expectation questionnaire is 0.781. These values are within acceptable values and confirm reliability of questionnaire. The methods used to analysis data are correlation and regression

### Service Quality

Table2: Model Summary

Model	R	R-Square	Adjusted R Square	Std. Error of Estimated
1	.811 <sup>a</sup>	.657	.639	.56559

a. Predictor : Tangibly, Reliability, Responsiveness, Assurance, Empathy

Table3: Regression Results for Service Quality Dimensions on Perceived Responses

Dimensions	Coefficients	t values	Sig.(p-value)
Tangibility	0.884921903	2.324250585	0.024791798
Reliability	0.281076442	1.031308541	0.308031904
Responsiveness	-0.16129485	-0.680182768	0.499952203
Assurance	0.487707387	1.813148709	0.076633917
Empathy	-0.13678668	-0.54302843	0.589850711

### Dependent Variable: Customer Frequency

- Independent variables tangibility, reliability, responsiveness and empathy together can cause 65.7% change in (dependent variable) frequent use.
- In this it can see that p is less than 0.05 so this is a good fit.

- For the change in dependent variable will need the following changes as per the equation.

$$F=0.929-0.104t-0.074r+1.088r+0.055a-0.097e$$

The weighted average gap score was for the quality dimension (such as reliability, responsiveness, security, empathy) were as shown in the table above it was found that expected result of score of respondent were more than the perception score among all dimension namely

- Tangibility (-0.104)
- Reliability (-0.074)
- Responsibility (1.088)
- Security (-0.055)
- Empathy (-0.97)

As the expectation scores on all parameters were higher than the respective perceptive score, it can be seen that banking industry needs to improve their service quality factors.

### **Conclusions**

After the complete evaluation of the topic it can be conclude that Empathy was the only dimension of service quality which affects customer satisfaction (expectations) whereas, Tangibility and Assurance have an impact on customer satisfaction (perceptions). Also the banks can improve upon the Responsiveness aspects as many respondents have rated it on the lower side. The study concludes that increase in service quality of the online banking can satisfy and develop customer satisfaction that ultimately retains valued customers for long. Ravichandran et al. (2010) has examined influence of service quality on customer satisfaction in respect of banks. In a previous

study, Kumbhar (2011) proposed that responsiveness, assurance, security, easy to use are the factors affecting the customer satisfaction in E- banking. Apart from above mentioned suggestions, banks can also work on the following areas like:

- Greater sharing of information with all customers and connected links should be ensured.
- Greater emphasis on organizational and procedural flexibility should be placed.
- Necessity for the process coordination across many sites should be stressed.
- Competitive pressure generation due to the quick introduction of new service products must be ensured.
- Integrated customer driven processes should be initiated.
- Quick response to customer needs must be given.
- Worldwide relationships between various stake holders, trade partners, suppliers etc. should be established.
- Easily accessible information through internet has to be made available.
- Flexible and efficient online service customization and personalization must be introduced.

Having knowledge in these areas would definitely help managers meet the challenge of improving service quality of online banking system and there are many other steps which can lead to improvement in the quality of service of online websites of banks.

## References

1. Bennett, S. P., and Kailay, M. P (1992). An application of qualitative risk analysis to computer security for the commercial sector. In Proceedings of Eighth IEEE Annual Computer Security Applications Conference. Los Alamitos, CA: IEEE Computer Society Press, 64-73.
2. Bentler, P. M., and Bonett, D. G.(1980) Significance tests and goodness of fit in the analysis of covariance structures. *Psychological Bulletin*, 88 (3),588-606.
3. Gronroos, C. (1984). A service quality model and its marketing implications. *European Journal of Marketing*, 18(4), 36–44.
4. Han Sang, B. S. (2004). Antecedents and Consequences of Service Quality in Online Banking: An Application of the SERVQUAL Instrument. *Advance in Consumer Research*, 31, 208-214.
5. Kazanjian, Robert K, (1988), "Relation of Dominant Problems to Stages of Growth in Technology-Based New Ventures," *Academy of Management Journal*, 31 (2), 257-79.
6. Nupur, J. (2010). E-Banking and Customers' Satisfaction in Bangladesh: An Analysis". *International Review of Business Research Papers*. 6(2), 145-156.
7. Parasuraman A, Zeithaml V A, Berry L L (1988), "SERVQUAL: A multiple- item scale for measuring consumer perceptions of service Quality', *Journal of retailing*, 64(1), 12-40.
8. Parasuraman, A, Zeithaml, A. & Malhotra. A. 2005. E-S-QUAL A Multiple-Item Scale for Assessing. Electronic Service Quality *Journal of Service Research*, 7. 1-21.
9. Ravichandran, K., Prabhakaran, S. and Kumar, A. S. (2010). Application of Servqual Model on Measuring Service Quality: A Bayesian Approach. *Enterprise Risk Management*, 1 (1), 145-169.
10. S. Arunkumar (2011), "A study on attitude and intention towards Internet banking with reference to Malaysian consumers in Klang valley region" *The International Journal of Applied Management and Technology*, 6(1), 13-21.
11. VikasGautam (2014), *Measuring Attitudes of Consumers: An Empirical Exploration in Indian Context with Reference to Banking Services*, *ICBR* , 3(1), 67-72.
12. Welch, Catherine, Rebecca Piekkari, Emmanuella Plakoyiannaki, and Eriikka Paavilainen-Mantymaki (2011), "Theorising from Case Studies: Towards a Pluralistic Future for International Business Research," *Journal of International Business Studies*, 42(5), 740-62.
13. Zeithaml V A, Berry L L and Parasuraman A(1993), The nature and determinants of customer expectations of service, *Journal of the Academy of Marketing science*, 21(1), 112.
14. Zhou, T. (2012). Examining Mobile Banking User Adoption from the Perspectives of Trust and Flow Experience. *Information Technology Management*, 13 (1), pp. 27-37.

## Impact of In-store Category Management on Operational Efficiency of a Retail Store

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### Abstract

*The objective of this study was to find out if category management in retail stores had any impact on their operational efficiency. Primary data was collected through the composite method of a questionnaire survey and personal interviews. Interviews were conducted among 103 retailers, belonging to large and small formats of retailers selling beverages and snacks categories. By use of mean difference test, it was found that the stores which were rated higher on in-store category management activities were found to have relatively higher stock-turnover ratio and lower gross margin than the stores rated lower on in-store category management activities. The research proves that effective category management is the result of operational efficiency of a store as reflected through an effective management of inventory operation at the store vis-à-vis the consumer needs, thereby having impact on operational cost and retail margin. The stores with comparatively higher stock-turnover ratio and lower gross margin for a category are guaranteed of a long-term survival. Since the study was limited to food categories of snacks and beverages, caution need to be exercised in generalizing the findings to other categories.*

### Introduction

Category management has assumed tremendous importance in the current scenario, wherein one can see the way the number of categories proliferating either due to the differing formats of the stores – each format bringing in its specializations in certain categories; new fashions, trends, usages affecting the buying trends of consumers; new additional product features or new product launches or substitutes getting added to the product categories by vendors and manufacturers. Every new addition to the category bringing in new excitement and challenges for the category managers.

“Quite simply category management involves organizing and managing promotions, merchandising and distribution activity around the way consumers view and buy a product” (Pradhan 2007).

Another definition of Category Management is “the distributors’/suppliers’ process of managing categories as strategic business units, producing enhanced business results by focusing on delivering consumer value” (Partnering Group 1990).

Category management has emerged as a strategy to aid retailers in successfully competing in each retail category to enhance shoppers’ loyalty and profitability (Sinha and Uniyal 2007).

As a cornerstone of efficient consumer response (ECR) initiatives, category management is designed to help retailers with the right mix of products, at the right price, with the right promotions, at the right time, and at the right place (Gruenand Shah 2000)

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The most overpowering definition to treat every category as a strategic business unit (Partnering Group 1990) is the most sumptuous and precise in capturing the sum total of category management. Once, we start looking at category as an SBU (strategic business unit) it brings in its wake many issues and challenges to be countered by a category manager to make it successful.

The issues that we have tried to address are the most basic ones. These are the very concerns of every retailer. Each retailer desires that its consumers should be loyal to its store and should be visiting the store as often as possible for their purchases. Retailer is very much aware that the consumer would tend to come back only if he/she is happy with their purchasing experience of the concerned category. Thus, it makes imperative for the retailer to have correct understanding of the motives and perception of consumers that makes him/her loyal to the store, thereby encouraging the consumers to come back again and again to the store for the purchase of a particular category. If a higher percentage of consumers are loyal to a store it is a definite indication that these consumers find their purchase experience of the category satisfying, thus, leading to the assumption that the front end management of the store is very effective and efficient. Once we start reviewing the front end operation management at the store level, the aspects that comes to one's mind would be ambience of the store, lay-out planning and design, visual merchandising, store merchandise management including product range, assortment, price range, display, shelf management, ease of movement and locating right product desired, and so on, and finally customer service.

In our study we have particularly focused on in-store category management activities which are part of the store merchandising management process, and assume an important role in the overall category management process. It is the

in-store category management which represents the front face of the store's effective and efficient management of a particular category. It is this aspect of in-store category management which is in direct interface with consumers of a category, brings into focus the store management's effectiveness in handling the category in the desired manner.

The aspects of in-store category management that brings consumer into direct contact with the effective and efficient handling of a category are covered through following actions or attributes related with in-store category management:

- Location of the category
- Ease of finding the category
- Ease of moving around the category
- Category/product signage's
- Availability of the product desired
- Availability of Range/ variety in the category
- Shelf presentation appeal
- Arrangement of products/brands on the shelf
- Ease of locating right products/brands/ price range on the shelf

It is important for professional and practitioners to understand how important is the role of in-store category management actions including price management on influencing store loyalty as reflected through duration of relationship with the store and frequency of visit to the store for purchase of a category, and also in its direct relationship or impact on consumer's overall purchasing experience of a category.

Once we have premised or able to determine the effect of in-store category management on loyalty and shopping experience the next immediate concern is to know its effect on operational efficiency and profitability.

While looking at operational efficiency we have particularly looked at the efficient management of inventory, as it is reflected in maintaining number of days stock on the floor and the stock turnover ratio. Though there are other areas to consider for efficient operation management like day-to-day expenses, man-power, energy usage, logistics etc., our focus is on stock management on the shop floor, because the experience of well managed store has been its efficient handling of inventory. It is management of inventory both at the front end and the back end decides the profitability and long-term survival of the store.

The profitability is determined on two important aspects, first by maintaining right quantity of inventory at the store that meets the requirement of the customers; and secondly by charging right margins on products in a category or at the store. Margins are again dependent on the operational efficiency of the store and more particularly on the inventory management as explained in the earlier section. The gross margins earned by a store on per square feet of selling space gives the indication if a store will be profitable or not. The gross margin percentage on annual sales which is calculated by the formula shown below:

Gross Margin Percentage =  $\frac{\text{Gross Margin earned during a given period}}{\text{Net sales for a given period}}$

This parameter is the first indicator of store's profitability. But, every businessman knows, that just knowing if a store is profitable or not is not enough. For him it is the return on investment (ROI) is most crucial, because through this parameter he comes to know if his returns are higher than the opportunity costs. In this paper we have researched on the two important determinants of ROII, i.e. return on inventory investment which is closely related to ROI in a retailing scenario. As it will be noticed that operational efficiency as reflected through

stock turnover ratio has direct impact on ROI as shown here below:

Gross Margin Return on Inventory Investment (GMROI) =  $\frac{\text{Gross Margin}}{\text{Investment in Average Stock Value at Retail Price}}$ ;

GMROI =  $(\frac{\text{Gross Margin}}{\text{Sales}}) \times (\frac{\text{Sales}}{\text{Average Stock Value}})$ ;

GMROI = Gross Margin Percentage  $\times$  Stock Turnover Ratio.

Hence, from the above working we can clearly state that the return on investment or more specifically GMROI from a retail store perspective is dependent on gross margin charged by a store on its different products or categories and the stock turnovers achieved with respect to every category stocked in the store.

Hence, by establishing relationship or influence of in-store category management on this parameter we would be able to conclusively predict the performance of the store through the assessment of its in-store category management actions. More precisely from our study we would be able to determine the lead indicator role played by category management actions on improving the financial performance of the store. Finally our study would help in providing conclusive direction to front management / personnel at the store in taking the right strategic actions for improving loyalty and providing shopping satisfaction that leads to higher returns on investment.

### **Problem Focus of the Study**

Category Management has been in existence in the international scenario for more than 20 years now, and there has been great amount of interest in the topic among the Indian retailers too. When a retailer decides to look deeper into category management and its impact in general, some of the foremost questions that tend to bother him could be stated as herein below:

- What are the aspects of retailing affected by category management in general?
- Does category management have any impact on customer loyalty?
- Is there any impact of category management on customer satisfaction?
- How does category management impact the operation of a retail store?
- Does category management affect the profitability of a retail store?

When one wants to consider important aspects of retailing, one will obviously like to consider them with reference to their impact on the retail business. For a retailer who is concerned with the retail business growth, will obviously like to know impact of any new techniques or system or strategy with respect to their influence on his business operation or financial results or consumer satisfaction, as all the three aspects put together define a business success for him.

In the present study we have focused particularly on “How does category management impact the operation of a retail store? as the other questions presented above have been researched separately.

### **Literature Review-Operational Efficiency of the Stores**

Retail store efficiency is measured in many different ways starting with return on investment and profitability. But as every businessman knows that this is the very purpose for which any businessman is ready to put in his hard earned investment. For retail business too this is very much true. From a retail perspective while the ultimate efficiency is measured in terms of ROI and profitability of the business, there are many other parameters that leads to better profitability and ROI. The major parameters that determine the retail store profitability and ROI are Customer satisfaction

with the categories carried in the store and overall shopping experience, total sales revenue earned during a given period, efficient back-end and front-end operation - that includes buying and merchandising planning, gross margins, floor-space management, store design, selling staff, and inventory management (Vedamani, 2003).

In retail store operation the return on investment or return on inventory is worked out as per the following formula:

$$\text{Return on Inventory} = (\text{Sales} \div \text{Average Inventory Value at Retail Price}) \times (\text{Profit} \div \text{Sales})$$

$$= \text{Profit} \div \text{Average Inventory Value at Retail Price}$$

$$= \text{Inventory Turnover Ratio} \times \text{Net Margin}$$

$$= (365 \div \text{No. of days stock}) \times (\text{Gross Margin} - \text{Operational Expenses})$$

From the above formula it is clear that inventory management in terms of number of days stock held in the store and operational efficiency in terms of managing all operating expenses, including carrying cost of inventory, as percentage of sales within the benchmark limit, will ultimately lead to best return on investment (Easterling et al., 2003).

It is very important to understand that inventory is a retailer's largest asset, technically it should be a short term asset, but for many it turns into the fixed asset category, if not managed well (Goldratt et al., 2010). The main aim of the retailer is to ultimately reduce the days the inventory held up on the selves by increasing sales. This gives the retailer edge above others in the industry. This also reduces the risk of inventory becoming obsolete or customers changing their buying habits or tastes. Therefore, it is recommended to retailers to keep a tight watch on their inventory turnover and

device measures to get rid of it, if it is piling up and incurring high carrying cost to them (Sharma and Choudhary, 2011). The retailing of domestic foodstuffs and non-foodstuffs throughout the European Union has experienced a rapid transformation and expansion in recent decades. This has brought in its wake profound social and economic changes in the patterns of shopping, consumption, marketing and distribution, in addition to irrevocably altering the balance in the range of retailing options. The efficiency of individual retail stores is a key issue in the retailer's competitiveness, since the global profitability of any chain enterprise depends on the profitability of its constituent parts (Barros and Alves, 2003). In a study by Assaf, Barros and Sellers (2011) it is clear that cost efficiency is higher for stores that have longer years in business, stronger geographical presence, and lower price offerings. Vertical integration, on the other hand, is negatively related to efficiency. In retail stores, handling of products typically forms the largest share of the operational costs. The handling activities are mainly driven by the shelf stacking process, which has a substantial impact on the profitability of a store (Zelst et al, 2009). Further by reducing energy cost can also bring down operational cost Dr Garry Felgate, Carbon Trust delivery and external relations director, said that a 20% cut in energy costs represents the same bottom line benefit as a 5% increase in sales'.

Hernant, Andersson, and Hilmola (2007) observed that the "route" to profitability significantly differs between the clusters. In monopoly the route to high profitability goes through high-gross margin, while in fleet market the key figures are low cost, large number of shoppers per week, and high productivity. In effect this means that through appropriate category management process a retail store can achieve the desired profitability.

It is not always that retailers take adequate

measures to maintain the efficiency in operation. Most of the stores possess inefficient cost-based structures (Pande and Patel 2013) . The authors have identified footfalls, salary and operating expenses as cost efficiency drivers.

Pressure to drive operating costs down and raise profit margins has forced retailers to examine every aspect of their business for efficiency, including labor, a major expense that is variable and within a company's control (Howell 2002).

Mishra (2009) has stated that an only sale is not an indication of improved efficiency. Hence, there are other criteria of efficiency that needs to be taken into account. Through DEA technique Barth (2007) has tried to prove that improving customer engagement does help in improving overall efficiency of the stores.

Though generally it is felt that rebates have negative effect on profitability of a store, but in case of some categories they do play important role in pushing sales of a category (Baldwin 2003) . The no-haggle pricing at General Motor's Saturn division never really caught on; even Saturn has rebates now.

Training of front and back end teams on important aspects of retail store efficiency will also be helpful. Some retail chains like Cardinal Health (2006) has launched its Leader Total Pharmacy Manager initiative to show its commitment to both the front end and back end operations of independent drug store business.

RFID is also playing important role in the improvement of operational efficiency of stores. Use of the RFID tags to track the flow of prepared foods from the supplier through the retailer's own distribution centers to the refrigerated cases in its stores is already in vogue (CSA 1998) besides the use on the products displayed at the front end for better management of inventory on the floor.

Retailers have also started making use of other

modes for improving efficiency in the use of energy at store level. Leathers (2007) cites the increased demand by retailers for products that are inherently more energy efficient. It also mentions the growing popularity of lighting products with light-emitting diodes (LED). It also suggests some ways for improving the energy efficiency of display cases at various retail stores in the country. In this respect Walmart has taken certain steps to make its stores energy efficient (Walmart, 2008), "Wal-Mart is piloting new technologies, driving innovation and leveraging advances in building design to better align our stores with the communities we serve," said Charles Zimmerman, Wal-Mart vice president of Prototype and New Format Development.

Measures such as given here and those which are on the top of the minds of retailers will definitely help retailers in achieving better efficiency in their operation, thereby helping in improving profitability and returns on their investments.

Our focus of research in managing stock levels at the store, which constitutes major component of operational efficiency. As Brian (1995) has rightly stated - the effectiveness of a retailer's inventory management strategy can spell the difference between substantial earnings and major losses. A careful analysis of service levels and the associated carrying costs for inventory is central to the development of an effective inventory management system. To succeed in store-level inventory management, retailers must carefully oversee 4 key business processes: 1. demand forecasting, assortment planning and allocation, 2. item replenishment, 3. new product introduction, and 4. promotional build and management. Retailing is an industry characterized by wide variations in the financial performance of firms measured by their stock returns, and in the operating performance of firms measured by their gross margins, inventory turns, gross margin return on

inventory, and return on assets (Gaur, 2001). As rightly emphasized by Patricia Waldron, retail industry director at Cognos (Newswire 2007), "The need for integrated strategic merchandise planning is becoming increasingly important. ... retailers need to accurately and swiftly respond to inevitable fluctuations in merchandise supply and demand that can have a profound impact on cash flow and profitability as well as other operational areas like marketing and store operations". Retailers looking at long term survival, needs to be constantly on watch of their stock turnover ratio, number of days stock, gross margin, and return on inventory investment. This has been the focus of the present study while determining the operational relationship with the in-store activities of category management.

### **Hypotheses**

Based on the problem focus of the present study following null hypotheses have been framed for further research:

- H1 - Number of days stock for stores rated high on category management attributes will be not lower than that for stores rated low.
- H2 - Gross margins for the stores rated high on category management attributes will not be lower than that for the stores rated low.

### **Research Design & Methodology**

This is a 'Conclusive Research', since study has been done through a structured method for collection of data on important parameters of the study which has been analyzed thoroughly to draw important conclusions as per the objectives of the study. Further, the research is of a descriptive nature as it proposes to define the effect of in-store category management attributes on operational efficiency of the store.

Research Method: The study uses the primary source of data. The primary source of data was

collected through questionnaire survey - personal interviewing method, to test the null hypotheses, as we want to establish empirical evidence for the said research.

**Universe, Sample, and Field Work:** The universe for the study is the retail outlets, including large and small formats of retailers selling beverages and snacks categories. Convenience sampling was used for identifying stores of different formats and numbers, as well as those which were ready to co-operate with the sharing of information related to the store operation. 103 interviews were conducted among the retailers (interviewing retail store owners/managers) to study the operation and margin related factors for beverages and snacks categories. The ratings on category management attributes (for snacks and beverages categories) for the selected retail outlets were done by a panel of interviewers to avoid any bias in ratings. For survey of retailers 103 retailers belonging to different formats viz. Hyper-stores, Supermarkets, General stores, and Kirana were contacted across different parts of Mumbai during Oct-Nov 2014.

### **Data Analyses and Findings**

- **Reliability and Validity Test**

In order to ensure that the scale used to measure the category management attributes are reliable, we have used the Cronbach's alpha as the basis to do the same. From the results representing the reliability statistics for the Beverages and Snacks, we find that the alpha value for the scale is more than 0.7 in both the categories. Thus, we can consider the measurement scale used for the said constructs as good and reliable (Nargundkar, 2008).

Further, we have checked the construct validity

with the help of item to total score correlation in a scale. From the column item – total correlation we find that the correlation values are reasonably good for inclusion of all the concerned items in the present study.

We have also used Factor Analysis as part of the thesis study to prove that the sub-scale of the overall construct namely, in-store category management actions, are further reduced to different but few dimensions representing category management activities/attributes.

**Content Validity:** To ensure that we are using right contents to reach our judgments on category management and pricing policy related issues we validated the questionnaire with knowledgeable executives working at the senior level in the merchandising management field as well as used the data analysis done during the questionnaire testing phase.

- To check if the Number of Days stock for the Beverages category for the stores with higher mean rating on category management attributes is lower than that for stores with average or fair rating on category management attributes.

Null Hypothesis: Number of days stock for stores rated high on category management attributes will be not lower than that for stores rated low.

<b>Variance 1</b>	11.82417582
<b>Variance 2</b>	9.932539683
<b>Mean 1</b>	10.14285714
<b>Mean 2</b>	10.69444444
<b>Difference</b>	-0.551587302

<b>z-Test: Two Sample for Means</b>		
	<b>Rating Type 1</b>	<b>Rating Type 2</b>
<b>Mean</b>	10.14285714	10.69444444
<b>Known Variance</b>	11.82417582	9.932539683
<b>Observations</b>	14	36
<b>Hypothesized Mean Difference</b>	0.551587302	
<b>Z</b>	-1.04217506	
<b>P(Z&lt;=z) one-tail</b>	0.148665262	
<b>z Critical one-tail</b>	1.644853627	
<b>P(Z&lt;=z) two-tail</b>	0.297330523	
<b>z Critical two-tail</b>	1.959963985	

<b>t-Test: Two-Sample Assuming Unequal Variances</b>		
	<b>Rating Type 1</b>	<b>Rating Type 2</b>
<b>Mean</b>	10.14285714	10.69444444
<b>Variance</b>	11.82417582	9.932539683
<b>Observations</b>	14	36
<b>Hypothesized Mean Difference</b>	0.551587302	
<b>Df</b>	22	
<b>t Values</b>	-1.04217506	
<b>P(T&lt;=t) one-tail</b>	0.154324184	
<b>t Critical one-tail</b>	1.717144374	
<b>P(T&lt;=t) two-tail</b>	0.308648369	
<b>t Critical two-tail</b>	2.073873068	

From the above Z test it can be seen that, as the obtained significance value 0.14 is greater than 0.05 at 95 percent confidence level, i.e. at 5 percent significance level we can state that, there is no significant difference between the mean of no. of days stocks maintained at the stores rated good and very good vis-a-vis those rated fair and average on their category management attributes.

But from the above mean values we can see that the stores rated good or very good on category management attributes have lower number of days stock as compared to the other group of stores.

- To check if the Gross Margin for the Beverages category for the stores with higher mean rating (Good or Very Good) on category management attributes is lower than that for stores with average or fair rating on category management attributes.

Null Hypothesis: Gross margins for the stores rated high on category management attributes will not be lower than that for the stores rated low.

<b>Variance 1</b>	3.324175824
<b>Variance 2</b>	2.111111111
<b>Mean 1</b>	10.64285714
<b>Mean 2</b>	10.94444444
<b>Difference</b>	-0.301587302

<b>Z-Test: Two Sample for Means</b>		
	<b>Rating Type 1</b>	<b>Rating Type 2</b>
<b>Mean</b>	10.64285714	10.94444444
<b>Known Variance</b>	3.324175824	2.111111111
<b>Observations</b>	14	36
<b>Hypothesized Mean Difference</b>	0.301587302	
<b>Z</b>	-1.108501369	
<b>P(Z&lt;=z) one-tail</b>	0.133822674	
<b>z Critical one-tail</b>	1.644853627	
<b>P(Z&lt;=z) two-tail</b>	0.267645348	
<b>z Critical two-tail</b>	1.959963985	

<b>t-Test: Two-Sample Assuming Unequal Variances</b>		
	<b>Rating Type 1</b>	<b>Rating Type 2</b>
<b>Mean</b>	10.64285714	10.94444444
<b>Variance</b>	3.324175824	2.111111111
<b>Observations</b>	14	36
<b>Hypothesized Mean Difference</b>	0.301587302	
<b>Df</b>	20	
<b>t Values</b>	-1.108501369	
<b>P(T&lt;=t) one-tail</b>	0.140399042	
<b>t Critical one-tail</b>	1.724718243	
<b>P(T&lt;=t) two-tail</b>	0.280798083	
<b>t Critical two-tail</b>	2.085963447	

From the above Z test it can be seen that, they obtained significance value 0.13 is greater than 0.05. Therefore, at 95 percent confidence level, i.e. at 5 percent significance level we can state that, there is no significant difference between the mean of the Gross margins of the stores rated good and Very good for their category management versus those rated fair and average. Thus the hypothesis is not rejected.

But from the above table it can be seen that, the stores rated good and very good in their category management have lower gross margins.

- To check if the Number of Days stock for the Snacks category for the stores with higher mean rating on category management attributes is lower than that for stores with average or fair rating on category management attributes.

Null Hypothesis: Number of days stock for stores rated high on category management attributes will be not lower than that for stores rated low.

<b>Variance 1</b>	51.69231
<b>Variance2</b>	74.96761
<b>Mean 1</b>	15
<b>Mean 2</b>	16.92308
<b>Difference</b>	-1.92308

<b>Z-Test: Two Sample for Means</b>		
	<i>Good-Stock</i>	<i>Fair_stock</i>
Mean	15	16.92307692
Known Variance	51.69231	74.96761
Observations	14	39
Hypothesized Mean Difference	1.92308	
Z	-	1.623189997
P(Z<=z) one-tail	<b>0.052274398</b>	
z Critical one-tail	1.644853627	
P(Z<=z) two-tail	0.104548796	
z Critical two-tail	1.959963985	

From the above Z test it can be seen that, as they obtained significance value 0.052 is lesser than 0.1, at 90 percent confidence level, i.e. at 10 percent significance level we can state that, there is a significant difference between the mean of no. of days stocks maintained at the stores rated good and very good vis-a-vis those rated fair and average for their category management attributes.

From the above table it can be seen that, the stores rated good and very good in their category management have maintained stocks for two weeks as compared to the stores rated fair or average which maintain stocks for more than 2 weeks. Thus the hypothesis H1 stands rejected.

- To check if the Gross Margin for the Snacks category for the stores with higher mean rating (Good or Very Good) on category management attributes is lower than that for stores with average or fair rating on category management attributes.

Null Hypothesis: Gross margins for the stores rated high on category management attributes will not be lower than that for the stores rated low.

<b>Variance 1</b>	69.88923077
<b>Variance2</b>	58.40234818
<b>Mean 1</b>	15
<b>Mean 2</b>	18
<b>Difference</b>	-3.376923077

<b>Z-Test: Two Sample for Means</b>		
	<i>Good-Margin</i>	<i>Fair_Margin</i>
Mean	14.7	18.07692308
Known Variance	54.0234818	69.88923077
Observations	14	39
Hypothesized Mean Difference	3.376923077	
Z	-	2.841150301
P(Z<=z) one-tail	<b>0.002247556</b>	
z Critical one-tail	1.644853627	
P(Z<=z) two-tail	0.004495112	
z Critical two-tail	1.959963985	

From the above z test it can be seen that, as the obtained significance value 0.002 is lesser than 0.05 at 95 percent confidence level, i.e at 5 percent significance level we can state that, there is a significant difference between the means of the Gross margins of the stores rated good and Very good for their category management vis-a-vis those rated fair and average.

From the above table it can be seen that, the stores rated good and very good on their category management have lower gross margins as compared to the stores rated average/fair. Thus the hypothesis H2 stands rejected.

- Result on Hypotheses: Based on the analyses of data for beverages and snacks categories, and taking a holistic view of the above findings, we conclude the following results:

Hypotheses	Decision	Tools and Techniques
H <sub>1</sub> - Number of days stock for stores rated high on category management attributes will be not lower than that for stores rated low.	The data do not support the given hypothesis and hence we reject it.	Use of z-test and t-test for difference of means
H <sub>2</sub> - Gross margins for the stores rated high on category management attributes will not be higher than that for the stores rated low.	The data do not support the given hypothesis and hence we reject it.	Use of z-test and t-test for difference of means

### Discussions and Conclusions

From the above tables we have tried to assess the performance of the stores on their efficiency in operation. The efficiency in operation of the store is mainly assessed from the number of days stock holding for the concerned category. Because it is the number of days stock holding that determines the efficiency in terms of inventory management. As lower the stock holding in terms of number of days stock on the shop floor - it indicates better efficiency in managing the inventory, which in turn depends

on better management of supplies. Further, lower stocks means faster turnover of stocks, thereby resulting in better use of working capital. Also lower inventory means lower working capital investment in stocks. Lower inventory also result in lower shrinkage (loss of stocks/pilferage) and loss due to deterioration in freshness of stocks or obsolescence of fashion.

The second important parameter of efficiency in operation is the gross margin decided for the category. Generally, it is observed that better managed stores at the operation level have comparatively lower margins as compared to the stores with lower operational efficiency. The better managed stores are able to keep their operational expenses on category lower including managing their inventory well, and thus, lower investments and carrying costs, as well as lower shrinkage and discounts.

From the above data we find that the stores which have been rated good or very good on their category management attributes have lower stocks in terms of number of days and lower gross margins as compared to the stores that have been rated fair or average on their category management attributes. Hence, we can draw a clear conclusion that generally stores with better performance on their category management attributes have higher level of efficiency in their operation as is seen from their comparatively lower holding of stocks in terms of number of days which, results into lower gross margins on the concerned category.

### Managerial Implications

Based on the conclusion derived above, the implications for the retailers and the managerial staffs of the retail stores are very much clear. The conclusion implies that if the categories of a retail store are managed well in terms of the nine different actions required at the store front level then the operational aspects like number of days stock maintained on the floor of the retail store

and the gross margins charged for each of the categories will reflect greater efficiency and better management.

This is important as it is observed (from a different study which is part of the research thesis) that stores with higher rating on category management attributes have better retaining capacity of their customers as seen from longer duration of relationship or loyalty with the store. Further, more importantly, such stores also have highly satisfied customers (as was observed through the analyses of consumer data on different aspects of the same study). With these benefits from higher performance on in-store category management attributes, such stores are guaranteed on longer survival in their respective trade. In the Balance Score Card parlance Operational Efficiency is treated as a lead indicator of good performance that ensures not only the long-term survival but also profitability of these stores.

### **Limitation of the Study**

The study limits itself to food category only, due to problem of readiness and openness in sharing of information by Indian retailers. In order to generalize the findings of the study it is necessary to include more number of categories in such a study. Another option is to do a tracking study over a period of time to check on the performance of a retail chain, which is ready to share vital statistics, vis-à-vis its performance on category management.

### **References**

1. Anand, T. and Kahn, G.(1992), 'SPOTLIGHT: A data explanation system'. Proceedings of the Eighth Conference on Artificial Intelligence for Applications, 2-6 March, Monterey, CA, pp. 2-8.
2. Anderson Eugene, ClaesFornell, and Donald R. Lehmann (1994), "Customer Satisfaction, Market Share and Profitability: Findings from Sweden," *Journal of Marketing*, 58 (July), 53–66.
3. Anderson Eugene, ClaesFornell, and Sanal Mazvancheryl (2004), "Customer Satisfaction and Shareholder Value," *Journal of Marketing*, 68 (October), 172–85.
4. Armitage, Vince (2011); Category management :maximising opportunities for growth within the forecourt battery category, *Forecourt Trader*, August, p4.
5. Assaf, A. George; Barros, Carlos; Sellers-Rubio, Ricardo; Efficiency determinants in retail stores: a Bayesian framework, *Omega*. Jun2011, Vol. 39 Issue 3, p283-292.
6. B Ramasheshan et al (2009), "A Retail Category Management Model Integrating Shelf Space and Inventory Levels", *Asia-Pacific Journal of Operational Research* Vol. 26, No. 4 (2009) 457-478.
7. Baldwin William, (2003), *A Nation of Hagglers*, *Forbes*. 2/17/2003, Vol. 171 Issue 4, p18-18.
8. Barros, GarlosPestana; Alves, Carlos Alberto; Hypermarket retail store efficiency in Portugal, *International Journal of Retail & Distribution Management*. 2003, Vol. 31 Issue 11, p549-560.
9. Barth J.E. (Joe) , Customer engagement and the operational efficiency of wine retail stores, *International Journal of Wine Business Research* 19.3 (2007): 207-215.
10. Basuroy, S., M. Mantrala, and R. Walters. (2001), "The Impact of Category Management on Retailer Prices and Performance: Theory and Evidence." *Journals of Marketing* 65(4):16–32.
11. Boatwright, Peter, Joseph C. Nunes, (2001), "Reducing assortment: An attribute-based approach", *J. Marketing* 65(July) 50–63.
12. Borin, N. and P. Farris.(1995), "A Sensitivity Analysis of Retailer Shelf Management Models." *Journal of Retailing* 71(2): 153–171.
13. Borle, Sharad et al, (2005), 'The Effect of Product Assortment Changes on Customer Retention', *Marketing Science* Vol. 24, No. 4, Fall, pp. 616–622.
14. Brian Lee, Wilson; Kingdon, Mark; Reeve, Thomas(1995); Best practices in retailing: Quick hits' in store-level merchandise and inventory management.

15. Cardinal's program for front and back end, (2006), Drug Store News. 8/28/2006, Vol. 28 Issue 10, p23-23.
16. Convenience Store News Online.(2004), "Study Shows Continued Support for Category Management." March 17. www.csnews.com.
17. Cosgrove, J. (2003), "The Evolution of Category Management." Beverage Industry 94(2):50.
18. Dussart, C. (1998), "Category Management: Strengths, Limits and Developments." European Management Journal 16(1):50–62.
19. Easterling, C. R., Flottman E., Jernigan M., Marshall S. (2003); Merchandising Mathematics for Retailing, prentice Hall, New Jersey, USA.
20. Forecourt Trader, August 2011, the article 'Category management: Maximizing opportunities for growth within the forecourt battery category'.
21. Gaur, Vishal, (2001), Essays in retail operations management, University of Pennsylvania, ProQuest, UMI Dissertations Publishing.
22. Goldratt M. Eliyahu, Eshkoli I, Brown Joe, (2010); Isn't It Obvious, Productivity & Quality Publishing Pvt. Ltd., Madras, India.
23. Gruca, Thomas S. and Lopo L. Rego (2005), "Customer Satisfaction, Cash Flow, and Shareholder Value," Journal of Marketing, 69 (July), 115–30.
24. Haderspeck, Jeniffer (2014), 'Going big with data', Beverage Industry. Feb2014, Vol. 105 Issue 2, p32-32
25. Harris, B. and M. McPartland. (1993), "Category Management Defined: What it is and Why it Works." Progressive Grocer 72(9):5–8.
26. Hernant, Mikael; Andersson, Thomas; Hilmola, Olli-Pekka; Managing retail chain profitability based on local competitive conditions: preliminary analysis, International Journal of Retail & Distribution Management. 2007, Vol. 35 Issue 11, p912-935.
27. Hillmer, S. C. and Tiao, G. C , (1982), 'An ARI MA-model-based approach to seasonal adjustment'. Journal of the American Statistical Association, 77, March, 63-70.
28. Howell, Debbie; 12 hot issues facing mass retailing--4: Store operations--margins put squeeze on in-store efficiency, DSN Retailing Today 41.10 (May 20, 2002): 26.
29. J. Tomás Gómez-Arias, and José Méndez-Naya, (2007), 'External Effects Of The Adoption Of Category Management Strategies', American Marketing Association / Winter.
30. Jubilee, Vincent, (1994), Strategy for profit and efficiency, Caribbean Business. 5/5/1994, Vol. 22 Issue 18, p30.
31. Kahler, Bjoern and Lingenfelder, Michael, (2006), 'Category Management: when 1 + 1 = 3', ECR Journal, vol. 6, no. 1, spring.
32. Larson, Ron, (2005), 'Making Category Management More Practical', Journal of Food Distribution Research 36(1), March.
33. Leathers, Denise, Casing the New Cases, Refrigerated & Frozen Foods Retailer. Jun2007, Vol. 5 Issue 5, p45-46.
34. Lee, J. and M. Brown.(2001), "The Effect of Shelf Space on Sales of Fruit Beverages." Journal of Food Products Marketing 7(1/2):3–13.
35. Lim, A., B. Rodrigues, and X. Zhang.(2004), "Metaheuristics with Local Search Techniques for Retail Shelf-Space Optimization." Management Science 50(1):117–131.
36. Litterman, R. B., (1986), 'Forecasting with Bayesian vector autoregressions—five years of experience'. Journal of Business and Economic Statistics, 4, January, 25-38.
37. Mägi, Anne W.(2003), 'Share of wallet in retailing: the effects of customer satisfaction, loyalty cards and shopper characteristics', Journal of Retailing, Summer2003, Vol. 79 Issue 2, p97-106.
38. Mass Market Retailers. 2004. "Category Management in Vogue." 21(10):135.
39. Miranda M J, Konya L and Havrila I (2005), "Shoppers Satisfaction Levels are not the Only Key to Store Loyalty", Marketing Intelligence and Planning, Vol. 23, No. 2, pp. 220-232.
40. Mishra, Rohita Kumar (2009), Benchmarking Scheme for Retail Stores Efficiency.

41. Mittal, Vikas, Eugene W. Anderson, Akin Sayrak, and Pandu Tadikamalla (2005), "Dual Emphasis and the Long-Term Financial Impact of Customer Satisfaction," *Marketing Science*, 24(4), 544–58.
42. Montgomery, D. C. and Weatherby, G. (1980), 'Modeling and forecasting time series using transfer function and intervention methods', *AIIE Transactions*, 12, 289-307.
43. Neslin, S. A. and Schneider, L. G., (1993), 'Consumer inventory sensibility and the post-promotion dip'. Working Paper (October), The Amos Tuck School of Business Administration, Dartmouth College.
44. Newswire (2007), *Cognos Extends Retail Industry Leadership, Launches New Performance Solution to Help Improve Merchandise Planning*, [New York] 15 Jan 2007.
45. Pande, Smriti; Patel, G.N., Assessing cost efficiency of pharmacy retail stores and identification of efficiency drivers, *International Journal of Business Performance Management*. 2013, Vol. 14 Issue 4, p368-385.
46. Peter Freedman et al, (1997), *The Mckinsey study of 'European Category Management: Look before you leap'*, *The Mckinsey Quarterly* No.1.
47. Pradhan Swapna, (2007), "The Methods of Merchandise Procurement", 'Retailing Management – Text and Cases', Tata Mcgraw Hill Publishing Co. Ltd., New Delhi.
48. *Progressive Grocer*. (1995), "Will Category Management Kill the Supermarket?" 74(August Supplement):5–9.
49. Prothero, D. L. and Wallis, K. R, (1976), 'Modelling macroeconomic time series'. *Journal of the Royal Statistical Society (Series A: General)*, 139, Part 4, 468-86.
50. Rhonda, Thomas, R.; Barr, Richard S.; Cron, William L ; Slocum Jr., John W., (1998), A process for evaluating retail store efficiency: a restricted DEA approach, *International Journal of Research in Marketing*. Dec, Vol. 15 Issue 5, p487-503.
51. SCA, (1986), *The SCA Statistical System: Reference manual for Forecasting &. Time Series Analysis*, Version UI.
52. Sharma, Vandana; Choudhary, Himanshu; (2011), *Measuring Operational Efficiency Of Retail Stores In Chandigarh Tri-City Using Dea*, *Journal of Services Research*. Apr, Vol. 11 Issue 1, p99-115. 17p.
53. Sims, C. A., (1980), *Macroeconomics and reality*, *Econometrica*, 48, January, 1-48.
54. Sinha P K & Uniyal D, (2007), 'Category Management', *Managing Retailing*, Oxford University Press, N.Delhi.
55. Terbeek, G. (1993), "Why Category Management will Fail." *Progressive Grocer* 72(9):11–15.
56. Theil, H., (1966), *Applied Economic Forecasts*, Amsterdam: North-Holland.
57. *The Joint Industry Project on ECR, Partnering Group*. 1990.
58. Urban, T. (1998), "An Inventory-Theoretic Approach to Product Assortment and Shelf-Space Allocation", *Journal of Retailing* 74(1):15–35.
59. Vedamani, Gibson (2003), *Retail Management*, Jaico Publishing House, Mumbai.
60. Veiders, C. (2004), "Beyond Zero-Sum Relationships." *Supermarket News* 52(24):18–26.
61. Wal-Mart stores Inc.; (2008), *Wal-Mart Introduces Its Most Energy Efficient U.S. Retail Store*, Anonymous. *The Business of Global Warming* (Mar 31, 2008): 133.
62. Wellman, D. (1997), "A Categorical Rejection" *Supermarket Business* 52(9):69–73.
63. Willard Bishop Consulting, Ltd. and Information Resources, Inc. (1993), *Variety or Duplication: A Process to Know Where You Stand*. Food Marketing Institute: Washington, D.C.
64. Zelst, Susan; Donselaar, Karel; Woensel, Tom; Broekmeulen, Rob; Fransoo, Jan; Logistics drivers for shelf stacking in grocery retail stores: Potential for efficiency improvement, *International Journal of Production Economics*. Oct 2009, Vol. 121 Issue 2, p620-632.
65. Zenor, M. J., (1994), 'The profit benefits of category management'. *Journal of Marketing research*, vol. 31, May, pp 202-13.

## Integrating MOOC in Traditional Classrooms for Business Management Graduate Students: A Case Study

M.A. Malathi Sriram\*

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### Abstract

*The Case presented by the author is a first-time experiment of having introduced a Massive Open Online Course (MOOC) at a B-school. Many institutions of repute world over have experimented with the blended learning in their mainstream courses. These institutions have shared the outcome of their experiments in terms of the student learning, which had remained the same as before or had marginally improved due to the course. While this study takes us through the various phases, such as the identification choice and implementation of a MOOC in a traditional course offering as part of a Diploma Programme, it is just a case in point to introduce the different learning platforms for a B-school student to understand and use. The aftermath of the introduction of the MOOC provided the material for another research study separately.*

### Introduction

Shri Dharmasthala Manjunatheshwara Institute for Management Development (SDMIMD), Mysuru needs no introduction. SDMIMD was established in the year 1993 in Mysuru by the visionary philanthropist and Dharmadhikari of Dharmasthala, Padma Vibhushana Dr. D. Veerendra Heggade.

The academic freedom of experimenting with various technologies towards the enhancement of pedagogy and learning has been the hallmark at SDMIMD. The working environment at SDMIMD encourages exploration of newer method toward the same. SDMIMD has always been a frontrunner in introducing technology as part of its pedagogy. Early in 2008 the author with two of her colleagues evaluated various Open Source platforms for putting together the intranet portal that went on to become a sort of Knowledge Management System, if not a full-fledged one. Post this in 2009; SDMIMD progressed to Moodle – the virtual learning and course management system. The choice of Moodle as the learning and course management

platform was also an informed one, after a thorough surveys of the available course management system available the landscape.

Thus for SDMIMD the progressive use of the latest technology is nothing new. MOOC is the virtual platform for Education Dissemination. Many of the reputed universities and their faculty are offering a plethora of courses from arts, to science to technology. Prominent among the universities are Stanford, Massachusetts Institute of Technology and University of Southern California. MOOCs are thought to be the current disruptive innovation – although many disagree.

Blended learning is a term that describes a formal higher education that has part teaching pedagogy in the digital medium. The student learns in part of the delivery of the course content and instruction via the online medium internet or otherwise. From May 2014, IIT – Bombay, in India is using MOOCs in a successful synergy with their traditional course,

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embracing blended learning or the flipped classroom concept. Much of the course content delivery is done in the usual face-to-face traditional classroom sessions as in a “brick-and-mortar”. The idea of a blended / flipped classroom is to encourage students to learn the concept from a virtual platform then the school and in the face-to-face meetings they pose questions and solve homework and practical activities.

In one version of “flipped” or “blended” classroom, according to Lage, Platt, & Treglia in 2000, students preliminarily are exposed to the course content via online video lectures created by their instructor, later they explore the same content a little more deeply during class by way of actively participating in learning exercises also designed by their instructor. Although some versions of the “flipped” classroom involve materials created by others, such as the textbooks for the pre-class first exposure to content, the blend of online and face-to-face learning activities in such courses is primarily designed by the faculty facilitator of the students. Nearer home, IIM Bangalore has started a similar blended/flipped course which is offered on a distance mode and also for students on campus for the value added learning.

### **Choosing the Appropriate MOOC**

While it is generally understood that MOOCs are appropriate for self-paced learners and working people, in this case, the author was particularly interested in how to engage existing full-time students that are currently enrolled in traditional full time graduate courses. The focus was on graduate technical education - specifically Post graduate Diploma in Management (PGDM). SDMIMD currently offers 2 Programs, the first one is autonomous and the second one in partnership with a recognized Management Association of repute in India. Both courses are affiliated to and

recognized by the All India Council of Technical Education (AICTE). The MOOC for blended learning was for the full time PGDM Course(s).

In 2012 Caufield, Koller et al suggested another mechanism of offering the blended course. Instead of “flipping” a course by creating online videos lecture or leveraging textbooks, faculty could “wrap” their courses around existing MOOCs Using this method, students in an elective course on-campus are asked to take in part or in whole in a MOOC offered at another institution hosted by a MOOC platform. This would be supplementing by the classroom sessions conducted by the faculty on campus as part of the regular elective course. Since MOOCs are designed outside of the campus by a university the faculty on campus faces the difficulty if certain course design decisions such as the evaluation components to have, and if yes how much weightage should be given to it. Second since the MOOC already has a pre-fixed evaluation component, how much of the elective course designed by the on campus faculty can be varied, if at all. In certain other MOOCs, the online component is only relatively fixed thus allowing the faculty on campus the freedom of the choosing to use only parts of the MOOC, a possibility that the author return to later in discussing customization around more than one MOOC and other online content. The challenges of a wrapper MOOC are similar to those while incorporating a textbook, authored by another, into a course.

However, given the variety and interactivity of learning experiences available on most MOOCs--lecture videos, automatically graded quizzes, discussion forums--the use of externally.The Course chosen for the blended learning was naturally a technology related elective course. MOOC chosen for the students who opted for a specialization in the Systems Stream of their PGDM. The elective course identified was (title) Business Database Management.

The author considered the following factors while choosing the MOOC for blended learning:

- MOOC suitability with the elective course offered with respect to coverage.
- Coverage in MOOC with respect to course outline of the elective course
- Elective Course mapping with the discreteness of the course.
- Choosing a elective course with more of problem solving than a theoretical one – reason being the need to dissemination the blended learning and also the coverage fitness
- Videos more in number
- Evaluation should be part of the MOOC

Rhymes and Reasons, Methodology adopted – evaluation videos, quizzes, lectures, timelines, time bound (not self-paced), aligning and synchronizing with the class sessions, Course Content Mapping.

Integrating the MOOC for the Sessions – when to introduce MOOC, should it be given weightage as an Evaluation component, or should it be for just used as a support system for the learning that happened in the classroom, or should it be a stimuli for the students to encourage classroom discussion, whatever the choices of blending learning it was a challenge - when to introduce MOOC for the blended learning pedagogy.

While the idea of introducing the MOOC and the identification of the elective course for the blended learning by itself was an eye opener for the author in many ways, the juncture of the MOOC to be introduced in the course also had to be, thought well beforehand.

## **Analysis**

When the first full-fledged MOOC was announced in 2012, many educational institutions and educators voiced their concerns about MOOCs disrupting the higher education. (MOOC was formally offered in 2007/2008). Now four years having passed and any changes in education due to MOOC are yet in the research pipeline. The collection of primary data, and the parameters/factors to collect data on, is some of the hurdles. On the other hand it is has put a lot of educational policy makers and educators to rethink the way courses are being delivered to the students.

It goes without saying that the faculty offering the blended learning as part of their course need to have taken the MOOC and its evaluation components to check how it synchronizes with the course the faculty has offered. The author took the MOOC Introduction to Database, and went through the sessions scheduled in the duration that it was offered. Author also participated in the evaluation components and forum discussions to assess the learning environment suitability for her students in the traditional course. An early and important discovery made by the author was academic freedom that was given for such an initiative. Openness of Educational Institutions of Higher Learning is another requirement. Thirdly, a faculty group committed to innovatively use technology to enhance learning effectiveness, continuous learn and unlearn, and sharing their learning's with their peer group and trained & Qualified Faculty,

## **Post the Blended learning Course**

The outcome of implementing the MOOC as far as learning of the students is concerned has to be compared with the previous academic year course delivery devoid of the MOOC component. As of now no formal study is made by the author to assess the MOOC integration

effectiveness. Very informal feedback from students was taken, which are entirely qualitative were classified into two categories for the ease of discernibility

• **Pros**

- a. Students professed that they had a better understanding of the topics as included in the course coverage because of the MOOC.
- b. The topics in the MOOC by itself fit very well into the Elective Course selected for the use of MOOC as an evaluation component.
- c. Learning virtually from world-renowned universities & faculty gave them the sense contemporariness of the learning.
- d. According to students, the major advantage of wrapping a MOOC over a traditional lecture-based Elective Course was its flexibility, customization, and accessibility, which students saw as encouraging pointer.
- e. Instead of participating in the online discussion boards, the students felt that asking questions about and discussing the course content during the face-to-face class sessions a far better way of clarifying their doubts.

• **Cons**

- a. Since the course chosen was being offered on the MOOC platform with a pre-scheduled sessions, adhering to timelines (not self-paced) was found to a bit difficult by the students adhered to;
- b. The student has to be much disciplined to make sure that one is keeping up on the study material. If not, the students found themselves to catching-up a lot of times.
- c. The students did not provide MOOC completion on time to faculty due to a wrong assumption of the course completion certificate.

- d. Another quick feedback from students was the MOOC chosen for the blended learning could have been more advanced than the one adopted for this course.
- e. MOOC certification and evaluation was offered only on payment in dollars hence some students were hesitated to take the MOOC evaluation online.
- f. Students said that they could not actively participate in either the discussion forums or the study groups formed online on the MOOC platform. The main reason for the same was attributed to time constraints. Instead, they used the discussion boards to check for course errata or to swiftly troubleshoot questions or problems, asking questions to their local peers.

**Learning - Opportunities for Improvement**

With the above qualitative informal feedback from the students, the author implementing the MOOC as an evaluation component for the Elective course also felt that a self-paced MOOC would have been more convenient to administer. Another factor, according to the author that could be effected would be to choose a MOOC that is well mapped to the coverage of offered Elective course plan / outline, vice versa the Elective Course coverage too could slightly altered without deviating too much to map to the MOOC coverage. This can make the MOOC more synchronized with the sessions in the traditional classroom contact.

**Looking Back**

The author feels that a pre and post scenario feedback would give a better picture of the effective use of MOOC in the course. A picture of the before implementation scenario of the blended learning course could have been already gathered. Now a survey questionnaire is designed to gather the primary data from the students of the course to get their feedback post

the implementation of the blended learning will give the author the correct picture of the effectiveness of the students' learning. A focused group of students need to be chosen for the feedback to be effective in implementing the MOOC as part of the Elective Course.

As members of teaching / learning community, the author expects that as adopters of wrapper courses, she is obliged to create and add content to the world's learning repository as well, which may in turn be picked up by students outside the wrapper. While author did not create and contribute any video herself she hopes to do in future.

It will not be far away in future when the pre-qualification for teachers would be that they are adept in blended learning environments. Thus knowing and getting familiar MOOCs will become imperative for the educators.

### **The Future**

It would be very ambitious at this point in time suggests that multiple MOOCs may be chosen to wrap a course where only part of a MOOC, or more is used for evaluation. It would be interesting design a wrapper around two or more

MOOCs, with the instructor selecting and mixing lectures and assignments from each MOOC, as well as using other online content, some perhaps even produced by the faculty of the wrapper. This throws up a lot of stimulating possibilities which does not require that a MOOC be adopted in its entirety. But this process of selection and mixing is technically easy, and such use cases may further motivate MOOC providers to design for piecemeal use, fast-tracking the customizing process and a co-evolving the online and blended course designs.

### **References**

1. <https://www.edx.org/school/iimbx>
2. <http://www.iimb.ernet.in/iimbx>
3. Mirror dated 22 September 2016 – A management classroom on your phone. By Deepthi Sanjeev.
4. Microsoft Research PES University, Bangalore Blended Learning in Indian Colleges with Massively Empowered Classroom by Edward Cutrell, Jacki O'Neill, SrinathBala, B. Nitish et al; March 2015.

## Disruptive Invention of Growth Hacking : A Case Study

Ritesh Dwivedi\*

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### Abstract

A marketer is not necessarily required, early in the life of a startup, to attend to things that may have to be done later on. For example, in the inception phase of a startup no person is required to “build and manage a marketing team” or “manage outside vendors” or even “establish a strategic marketing plan to achieve corporate objectives” or do many of the other things that marketers are tasked with doing. Early in a startup, the only thing one needs is growth. Growth, in the context of business, is a positive change in the company's size over a period of time. Businesses are now shifting from traditional marketing to focusing only on growth hacks. The concept of growth hacking includes use of technology and interactive innovative ways to attract the customers and keep them engaged. Like any other startup, Growth Hacker has also been following certain techniques of growth hacking. Growth hacking is a marketing technique, first employed in technology startups, that uses creativeness, social metrics and logical thinking as tools to sell its products and gain exposure. This case study details the techniques used by Growth Hacker and shows how this disruptive invention has turned out to be a great success for the company.

### Introduction

The term “Growthhacker” was invented by Sean Ellis, founder of Start-ups-Marketing. He explained the idea using this start up growth pyramid.

#### Exhibit 1: Start-up Growth Pyramid



Source: Startup-Marketing.com

In order to achieve a growth rate above the industry average, a growth-hacking business chains effective marketing with engineering. Many a times, people confuse growth hacking with inbound marketing. However, there's a

notable difference. Inbound marketing grosses an internet marketing strategy and brings it into line with the target customers. On the other hand, growth hacking may not involve any of the online marketing strategies that you are already aware of. A growthhacker may well invent a new idea or strategy, or just take a prevalent idea and build something more powerful out of it.

Growth hacking was first used by start-ups to achieve noteworthy growth for their respective businesses. In 1996, co-workers Sabeer Bhatia and Jack Smith engineered a web-based email system known as Hotmail. Within 6 months, they had their first one million users. By the time they sold it to Microsoft seventeen months later, they had already engaged twelve million users on their website. That's growth hacking at work.

Growth hacking works in a manner of viral marketing technique through which user

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become more connected and what they feel they share with others in their working or private space. It spreads faster and connects to a larger volume in short span of time which results in faster growth company (Casanova, 2013).

According to Holiday (2013) major brands like Facebook, Drop-box and Twitter haven't followed traditional way of marketing and did not go for advertising on television or print media but they adopted this new age technique of growth hacking to reach many people while spending less than other rivals on marketing activities. It pays them very well and now they are even supporting others in generating awareness about their products through online medium.

Srikanth AN (2015) has written comprehensively about how companies have applied growth hacking techniques to stand apart. Hotmail was one of the first few Indian companies used growth hacking techniques as a promotion of their service. Their investor suggested putting 'PS I love you. Get your free E-mail at Hotmail' sign at the end of every Email sent through them. This caused a stir and Hotmail started averaging 3000 new sign-ups a day in the beginning. It went on to amass a staggering Million users in 6 months and five weeks after that were at the 2 Million mark.

Another notable example by Srikanth AN (2015) is of Pinterest. The trick used by the company was making the most of simple-yet-effective growth hacking techniques and as a result it came as a surprise to many of the people over how its instant success was achieved. Some of these techniques were – Automatic Follow of top-notch profiles which can be edited later; Follow Facebook friends; Eliminating unnecessary navigation for commenting, re-pinning and liking pins including infinite scroll.

Growth hacking also means stop thinking marketing is something that happens after

(Schawbel, 2013). In other words companies have to come up with very robust feedback system as well as response mechanism which will push the constant and instant product improvements / add-ons as per the customer's wishes and requirements. It enhances the whole marketing efforts through which retaining customers become easier. The person doing the job of growth hacking has to be very alert towards emerging trends and market developments so that he can frame right marketing mix and growth hacks using his skills and experiences (Griffel and Wadowski, 2014).

Growth hacking generates a lot of interest in users through its innovative online platforms and activities which culminates in great traffic of online users which in gradual manner can be converted into a large clientele and revenues of company starts soaring new heights (Fishbein, 2014).

In today's competitive world, successful business owners must continuously adopt and adapt to strategic methods for getting the expected results. When the goal is to have business growth, proprietors can look to extremely creative and analytical approaches, all in the facility of growing the business. That's what the term "growth hacking" suggests, at its most elementary level.

### **Background**

Growthhacker is a young company started by IIT - Delhi alumnus. It is an online skill demonstration and employment platform for the students where a student works on the real world problems faced by businesses, while achieving their objective, and demonstrate his/her skills. They also receive rewards and get hired. With the rise company has seen over years, it is now proudly claiming to be India's first interest based Social Network.

There is a huge gap between companies and college students and that's what Growthhacker

is working for - bridging this gap. After joining a company, many students realize that they have landed at a wrong place, in a job which does not interest them. The increasing attrition rate in India at the entry level jobs is indicative of this. Through Growthhacker a student can discern his interest, get to know about the work culture of companies, validate his skills and standout. Companies are looking for resourceful ways to hire original, authentic and talented individuals only to realize that employees turn out to be different than what they claim in their CVs. Its need of the hour for companies to hire tried and tested talent.

• **Value Proposition to Students (Users)**

- a. **Open Challenges:** They solve open challenges (Technical, Operation, Marketing, Social, Finance, HR & Design) helping corporate extract top talent based on their genuine work samples (decreasing attrition rate) and get novel solutions helpful for their business.
- b. **Company Profiles:** Growthhacker offers an inside look at the establishment of the organization, its work culture and employee reviews, helping applicants make an informed career decision.
- c. **Interactive Resume:** They assist university students to build resumes around solving real world corporate challenges making it more dynamic.

• **Value Proposition to Companies (Clients)**

- Engage & Attract the best college students: build your brand with college students as an intellectually interesting place to work, by getting them involved in challenges that are relevant to your company.
- Assess and Hire efficiently: Custom design a practical problem in the form of a challenge or access Growth hacker’s library of challenges to select the best for the next stage of assessment and interviews.

- Companies can also outsource their projects to be attempted by millions of students from all across India and receive diverse perspective and innovative solutions.
- Hire star performers (process flow is explained with help of an example)

**Exhibit 2: Benefits to Companies**

**Top Talent Pool**  
IIMs, IITs, ISIs, BITS, IISc, NITs

- ✓ No geographical restriction
- ✓ On demand capacity
- ✓ Access excess brain power

**Advertising Space**  
Build company profile

- ✓ Attract & hire top talent
- ✓ Get noticed via digital media
- ✓ Spread culture, share success

**More Savings**  
We value your time & money

- ✓ We get accurate results
- ✓ Friendly solution review
- ✓ Reduce overheads

**Source: Company Report**

**Methodology**

Study tries to understand the concept of growth hacking and its benefits in doing business. Different activities and inventions used by

Growthhacker under Growth hacking operation have been studied and discussions have taken place with concerned employees of Growthhacker to understand the details and benefits of these activities. At the same time certain online reports/ articles/ studies have been referred while conducting the study. Objectives of the study are listed below:

- a) To study the growth hacking techniques used at Growthhacker.
- b) To understand the entire process of growth hacking.

• **Carrying out Growth Hacking**

Growth Hacking is widely used by the marketing department of Growth hacker. The marketing department is divided into two sections:

- a) User Acquisition consists of two major activities on-boarding of the users (students) and engagement of the users (students). Increasing the Monthly Active Users.
- b) Client Acquisition includes all the activities in getting the lead for the company and converting them to client. The different channels to get the leads of the companies includes the cold calling, cold emailing, attending corporate seminars and referrals.

On boarding users means the number of new users brought on the company's platform. The target audience for Growth hacker is 'students', who sign in on the portal for different activities, including but not limited to, solving challenges, which help them realize their interests, develop diverse skill set, network with like-minded people and help them in careers. Users also come on-board for applying for job, internships and corporate micro-internship. By engagement, it means the activities in which these students perform and get rewards. These activities include solving the challenges floated by Growth hacker and different campaigns that

Growthhacker frequently organizes for the engagement of the students. The rewards include the Goodies, cash-rewards for winners as well as Grey coins for everyone who attempts the challenge, which students can later redeem to get products of their choice.

Growthhacker has launched several campaigns in past to achieve growth in the company. These campaigns also helped in building networks with various companies. For example, campaigns like Online Summer Internship Program and Hackathon 361 Degree engage students and companies in a fun and productive way. This section talks about the various projects launched by the company as a part of its Growth Hacking Strategy and its significance in company's growth. The various projects are:

- Online Summer Internship Program
- Content marketing/Blogging/SEO
- Organizing Branding Events
- Advertising
- Corporate Micro-internships
- Hackathon: 361 Degree
- E-Job Fest

Growth hacker, being a start-up, needs to focus on its organic growth. College and university students are the users for Growth hacker. The work revolves around identifying, understanding and analyzing this market.

• **Online Summer Internship Program**

The program was given the name 'Internity' which means the journey of the student from the period of completing his/her studies up to getting a fulltime job. It's a unique online internship program for the students where they can work-from-home and get a great learning experience by working on the current challenges faced by start-ups and companies. The program was aimed to solve one major pain point of the

students i.e. lack of internship and relocating for the internship. The program helped in building up the profile of the user so that he/she gets a good chance to get hired by the companies. It helped in fostering innovative solutions and in branding of companies as well as of Growthhacker.

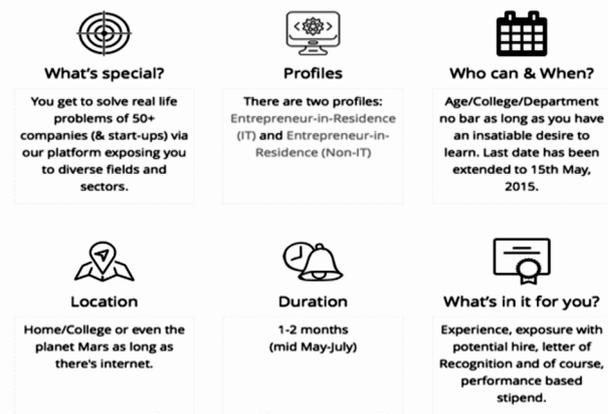
- **Significance**

The purpose of Online Summer Internship program was to provide internship to large number of students who do not get the opportunity as well as who are studying far from the metro cities and find it difficult to relocate to work in a good company. On the companies end, they find it difficult to tap the good talent pool available in India.

- **Structure of the Internity**

- a) Two profiles were floated for the internship
  - i. Entrepreneur-in-Residence (IT): To cater all the students who want to do internship in web/app development.
  - ii. Entrepreneur-in-Residence (Non-IT): To cater all the students who want to do internship in marketing, operations, strategy, analytics, design, content and ideation.
- b) Upto 50 companies were on boarded for this program and projects for above two profiles were floated by them
- c) A challenge was floated for the short listing of the candidates for internship
- d) Students from first year to final year can apply for the internship.
- e) Internship was either for 4 weeks or for 6 weeks duration and date of joining were given accordingly.

### Exhibit 3: Structure of Internity



Source : Company Report

- **Marketing**

Through Facebook, emails and newsletters publicity was done in two phases. Phase I was pilot program from January to mid- February and then Phase II from March to April, 2015.

- Through Facebook: Penetrating into the groups of the students of different colleges, post about the opportunity.
- Through emails: Talking to the training and placement officers on the phone, telling them about the opportunity and sending the newsletter to them.
- Visiting Colleges: Fixing meeting with the training and placement officers of different colleges and conducting seminars as well. Visiting colleges and interacting with students helps in getting to know about the culture of study and internship among the students.
- By calling the applicants and making them spread the word across their college.
- Offline publicity by placing posters in the colleges.

- **Marketing to Onboard Companies**

Repository of recently funded start-up and the companies who want to brand themselves among students was made. The companies were approached with the following value proposition

- Branding among lakhs of students on Growth hacker platform

- Get good talent to work upon the problems of the companies
- Get tried and tested talent to work as a fulltime intern/job.

**Results**

It was a successful campaign. Growth hacker was able to reach up to 750 colleges with this program; up to 500 interns were provided to 50 start-ups. Up to 80 challenges were posted by various companies. In pilot phase I, interesting facts were revealed.

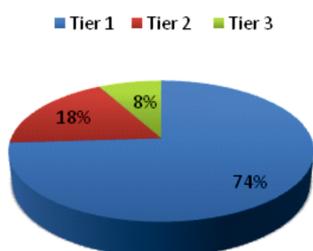
- Growth hacker’s main channel of reaching out to students was collaborating with Training & Placement cells. Growth hacker received good registration from tier 1 colleges but registration from tier 2 and tier 3 colleges were low.

Note: There is no standardised method to divide colleges into Tiers. Different people have different pedagogy. However, in general, these colleges are divided on the basis of Placements, Alumni Network and Course Curriculum. Mostly, the top 20 colleges are considered to be as Tier 1, next 20 as Tier 2 and next 50 as Tier 3. According to Business Today (2013), there are 5 parameters on which the Universities and Colleges are ranked. These are:

- Learning Experience
- Living Experience
- Placement Performance
- Selection Process and Establishment
- Future Orientation

Exhibit 4: Tier-wise College Students’ Registrations

**Tierwise % Breakup of Application**



Source: Company Report

- Companies were more interested in hiring tried and tested talent. They were more inclined to hire interns for longer duration.

After the results of Phase I, channel of publicity was changed for Tier 2 and Tier 3 colleges which showed better results. Registration from Tier 2 colleges increased by 60% and Tier 3 colleges by 35%.

**Content Marketing/Blogging/ SEO**

- This focused on developing SEO specific content (below mentioned) for the platform.
- Determining what kind of content is to be created and analyzing its effect on the ranking of the website.
- Creating the landing page, managing the back-linking, developing viral content for social media which can bring a large visibility for the Growth hacker among its audiences.
- Identifying trending events on the internet and leveraging the opportunity for content creation.

**Methods**

- Blogs: The topics for the blogs are brainstormed by the team members. It covers all possible topics a student is likely to search on internet. The aim is to create such quality blogs that maximum students, once, at least, read our blogs while searching about the related topics.
- E-Book: E-Book is a book in the form of slides which contains the topic, what actually an internship is, where a student can find the best internship for himself, it has covered the internship scenario of maximum big companies in the form of a list. Also, this E-Book will help the students in understanding the main objective of doing an internship.

- **Result**

Blogging by Growthhacker attracts many users. Since, all the relevant topics are covered by the blogging team; it was found that the count of the number of users on the portal increased considerably. This helped in targeting users, brand establishment, SEO and site ranking.

- **Organizing the Branding Events**

Going colleges for seminars: Visits to various colleges to conduct seminars. It gave an idea of the culture of academics, internship opportunities, interest of the students, which helped in planning and generalizing the way to penetrate the colleges. Interviews of the students were taken for the Internship Program which hauled out the information about their interests, their knowledge in the respective field.

Interaction with students: Visiting colleges not only for seminars but also to know the culture among the students of the colleges. This helped in structuring the program in a way which was both interesting and informative.

Helping companies in hiring students for jobs and internships: Growth hacker constantly float challenges on different subjects including Marketing, Analytics-operations, business, communication. The students register on the portal to solve the challenges floated by Growth hacker and give innovative solutions to it. The problems mentioned in various challenges are provided by different companies to Growth hacker which are further designed in the form of challenges and are floated on the platform. The students solve these challenges and as reward they get Greycoins which can be redeemed to buy any product. Not only the Grey coins, students who give innovative and outstanding solutions are noticed by the respective companies and get hired for internship and jobs. Therefore, these challenges not only help the students to enhance their skills, but also give

them the opportunity to get hired by the companies. This also provides innovative solutions to the companies' problems and many companies implement these solutions in their processes. So, it remains a win-win for both students and the companies.

- **Advertising**

- Facebook Publicity: This involves posting about the events on the various relevant Facebook groups to make them viral among the students. Publicizing on the Facebook pages is an easier way to inform students about the upcoming events. There are many groups on which students are not at all active. So finding the relevant groups was somewhat challenging.

- Quora publicity: Brainstorming questions that a student might have and then posting them on to the relevant popular topics amongst students. For example, Posting questions that have high hits in Google trends, and answering them making a slight mention of Growthhacker, thereby boosting the SEO Ranking of Growthhacker and online visibility. Indeed a growth hack!

- Visiting colleges to interact with the students and telling them about Growthhacker's campaigns. This included distributing flyers to students in college campus, collaborating with college's T&P cells, and giving presentations to the faculties and final year students.

- Offline advertising.

- **Corporate Micro-Internships**

Growth hacker is also a consistent service provider of the new concept of MICRO-INTERNSHIP. Micro-internship, which forms a part of newly evolved concept, is a package of online work experience with companies while the student is still in college. It aims at

promoting practical exposure to corporate sector and handling real life situations without hindering one's mainstream studies. Micro-internships have gained high popularity and are drawing attention of many undergraduate students all over the country, in quest of pursuance of their dreams.

This will enhance students' skills, plus the company certificate will tell the employer that the applicant has solved a real life company problem. Adding to that, students will know their field of interest and will be in a better position to decide the job of their interest. One doesn't need to wait summers or winters to get corporate exposure; this can be gained all year long now. The concept of Micro-internship is working wonderfully well and has been a major part of the company's growth.

- **Hackathon: 361 Degree**

The word hackathon is an amalgamation of the words hack and marathon, where hack is used in the sense of exploratory programming and not in its alternative meaning as a reference to computer crime. In Hackathon, people with technical backgrounds come together, form teams and code a unique solution to a problem from scratch, which generally takes shape in the form of robots, mobile apps and websites. Such events go on till 24-48 hours and are packed with prizes, caffeine and food. After the time runs out, teams demonstrate what they've built and contest for rewards. To sum it up, a hackathon is where techies come together and use technology to transform ideas into reality.

Growthhacker conducted '361 Degree', a hackathon powered by Uni-commerce, which is a part of Snapdeal, to boost innovation in E-Commerce space and also create a strong branding amongst developers. This was the first hackathon in the e-Commerce space. The philosophy behind the name '361 Degree' is all about pushing the limits of our intellect, "Twisting grey cells of our brain more than 360 Degrees", as it is put.

There were more than 400 registrations from developers (Students) located at different parts of India. This event was held in Delhi and Bangalore. The locations were decided keeping in mind the convenience of the students. Delhi was chosen as capital which attracts most of the students and Bangalore was chosen as IT hub, which defines the best place for a hackathon to take place. Top participating colleges, including but not limited to, were all IITs, BITs, NITs and other big Universities. Prizes given were worth Rs.2,20,000. In this event students were not only able to make contacts with the experts but also learn new things at the work stations.

- **E-Job Fest**

Growth hacker organizes an e-Job fest in the month of September. It is India's largest online job fest where students can grab numerous job opportunities at a single platform PAN India. It plans to bring students and corporate together at a platform where there will be various filters before the candidate gets selected for the final interview with the company. It has benefits for both students and the corporate. There is no geographical restriction and it saves time and cost as it is an e-job fest.

- **Benefits for College/Students**

This fest helps colleges reach target placements. There are multiple job opportunities available at one platform. Students first go through certain real corporate challenges relevant to their field which helps them know whether it interests them or not and they can select their job area accordingly. There is skill based evaluation, therefore, the one who has

#### **4.7.2 Benefits for Companies**

There are many advantages for the companies as well. Corporates look for dedicated and skilled employees who can stay in the organization for long and turn out to be an asset. Growthhacker's E-Job Fest is an effort to provide right job to the right person. Therefore, it has filters before the

student actually meets the company for final interview. This helps the companies get the best talent and the ones who are fit for the job. Growthhacker has used this as a growth hack, getting a lot of students registered on their website.

**• Conclusion**

This study ascertains that the growth hacking techniques used by the company have been pretty successful in getting more students on-board. As Growthhacker is a start-up into education space, they have managed to engage students on their platform with the help of various growth hacks. Such types of events and activities are gaining attention from their prospective target market and bridging the gap between corporates and students, which was actually need of the hour. These campaigns also resulted in connection with the good companies. Companies received an impressive result because of intensive filtering of the students. Companies also received innovative solutions from the students through Growth hacker's platform. Ms. Neha Bajaj, People Ambassador of Bharti Soft Bank appreciated Growth hacker a lot on its work towards customers' satisfaction and quick and constant updates. Mr. Rajdeep Jain, Managing Director of Deeps Tools Pvt. Ltd. finds engineering solutions helpful for his business. Therefore, it can be concluded that companies need to shift to growth hacking techniques for user acquisition rather than only implementing traditional marketing practices.

**Exhibit 5: Recap of Growth Hacking Techniques used by Growth hacker**

Online Summer Internship Program	Content marketing/Blogging/SEO	Organizing Branding Events	E-Job Fest
Advertising	Corporate Micro - internships	Hackathon: 361 Degree	

**References**

1. AN, Srikanth (2015). How 11 Popular Companies Have Applied Growth Hacking Techniques, <http://www.shoutmeloud.com/popular-companies-growth-hacking-techniques.html>
2. Business Today (2013): India's Best B-schools retrieved from <http://www.businesstoday.in/bschools /parameter-wise-ranking.jsp>
3. Casanova, J. (2013). Growth Hacking - A How To Guide On Becoming A Growth Hacker, CSNV Books.
4. Fishbein, M. (2014). Growth Hacking with Content Marketing: How to Increase Website Traffic, Kindle Edition, Amazon Digital Services, Inc.
5. Griffel, M. and Wadowski, C. (2014). Growth Hacking: Lean Marketing for Start-ups, <https://www.udemy.com/growth-hackinglean-marketing-for-startups/>
6. Growthhacker (2015): Corporate Micro-internship Program retrieved from <http://Growthhacker.com/events/corporate-micro-internship-program>
7. Growthhacker (2015): India's Largest E-Job Fest retrieved from <http://Growthhacker.com/events/indias-largest-e-job-fest>
8. Holiday, R. (2013). Growth Hacker Marketing: A Primer on the Future of PR, Marketing, and Advertising, Penguin.
9. Schawbel, D. (2013). Why All Marketers Should Be Growth Hackers, <http://www.forbes.com/sites/danschawbel/2013/09/16/ryan-holiday-why-all-marketers-should-be-growth-hackers/>

## Local Community Perception of Tourism's Socio-economic and Environmental Impact in Varkala Beach Region

Bhaskar Sailesh\*

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### Abstract

Community based tourism is a form of tourism in which the tourism activities directly or indirectly benefit the local communities. The community members are involved as daily workers, entrepreneurs, hotel employees, freelance sales agents, and in other travel related businesses. In order for any destination to effectively develop, it is important for both the tourists as well as the local community to be involved in tourism. This study aims to explore the general perceptions of the local communities towards social, environmental and economic impacts of tourism. The setting for this study is in the coastal town of Varkala in Kerala, India. This beach destination was chosen due to active involvement of community members in tourism. An interview schedule and observation schedule were used for data collection. The interview schedule was used to determine the perceptions of the community members involved in tourism whereas, the observation schedule was for observing the daily life of the community. The data was analyzed and cross checked for accuracy. The interpretations were presented to cover three prime areas- Environment, Economic and Socio-cultural areas. The results indicate that community members are benefitting from tourism and are working for the growth of it. The fear of increase in competition exists, but the community believes that with the help of organizational support, their net share will be substantial in the long run. Tourism is growing in Varkala and the growth, if managed efficiently, will go a long way in the sustainable development of Varkala.

### Introduction

Community Based Tourism (CBT) is a form of tourism which includes the local community members participating in tourism and travel related activities. National and International tourists are becoming more and more interested in experiencing tourism with the local communities and living cultures (Goodwin, 2009). The inclusion of sustainable practices as a part of community based tourism has become highly challenging (CIT Report of Myanmar, 2014). Sustainable CBT includes those communities who wish to involve themselves in tourism to share the natural and cultural beauty of various destinations and attractions in such a way that they are able to maintain and enhance

cultural, environmental and societal integrity at the same time providing the economic benefits for those involved. In several destinations, CBT is considered a perfect example of sustainable development of tourism (Breugel, 2013). This will also ensure community development and improve the way of life of the locals (Goodwin, 2011). CBT is regarded as less harmful to the socio-cultural and natural environment as the community members are directly involved in tourism. One of the core elements of sustainable tourism is that the tourism industry takes into account the views and aspirations of the host community. This is because the behavior of the local community members is directly influences the experiences of the tourists at the destination

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(Asker et al, 2010). While there is little discussion if the local community should participate in tourism planning and development, the question is how community members should participate. Sustainable CBT makes the local communities feel that they own the destination and have to care for it (Tosun, 2000). This feeling determines the attitude portrayed by the community members towards tourists and tourism activities.

This study sets out to explore the general beliefs and attitudes of the local communities towards social, environmental and economic impacts of tourism. The setting for this study is in the state of Kerala, India. CBT projects have developed throughout the country, but mostly in the state of Kerala and Karnataka. The CBT destination chosen for this study is Varkala, Kerala, India. Varkala is a small beach cliff destination frequented by both foreigners and local tourists. The local communities are involved in several tourism related activities from managing a resort to selling traditional arts and artifacts. The interactions between the tourist and community members are visibly seen. Even during the off-season, tourists visit this place and few of them prefer to stay for long periods. Throughout the year, the local community is involved in tourism one way or the other. Tourism affects their lives, their surroundings and their culture. Some of the community members may be under the impression that tourism is enhancing their cultural and social integrity and creating environmental benefits while others may think the opposite. Therefore it is essential to study the attitudes and perception of community members involved in tourism in Varkala. Besides, the growths of tourism in Varkala will have a significant impact on the local communities.

### **Tourism, Sustainability and Community Development**

One of the definitions of UNWTO indicate tourism as collection of activities, services and

industries which deliver a travel experience comprising transportation, accommodation, eating and drinking establishments, retail shops, entertainment businesses and the hospitality services provided for individuals or groups traveling away from home.

Tourism Industry is among the fastest growing industries with an annual average growth rate of 5.9%. It produces more than 74 million jobs and contributes a global GDP of 3.8% (World Travel & Tourism Council, 2004). With such an enormous growth rate, the tourism industry has become the primary revenue generator for many economies (Bailey, 2005). The growth demanded a more active stance by all stakeholders to protect the environment and culture and at the same time ensure a steady sustainable revenue stream. An increased focus on sustainability became essential for the continued short term and long term profitability of the industry while protecting the needs of the local economies.

According to the World Tourism Organization sustainable tourism is defined as “meeting the needs of the present tourists and host region while protecting and enhancing the opportunity for the future. It is envisaged as leading to management of all resources in such a way that the economic, social and aesthetic needs can be fulfilled, while maintaining cultural integrity, essential ecological processes, and biological diversity and life support systems” (Agenda 21, 1996). Just like any other sector, tourism also uses resources and generates wastes which lead to environmental, social and cultural costs and benefits in the process (Breugel, 2013). It is therefore essential to educate all the concerned stake holders the impacts which can result from tourism. Considering this, the tourism authorities have developed strong public policies which focus on physical resource planning, conservation of natural environment, and the inclusion of the local communities in the tourism planning process.

There are several ways to encourage community involvement in the tourism arena. As per the international discussions on sustainability, community participation is a crucial determinant to ensure that local community members will benefit from tourism.

Community participation provides invaluable information and a better understanding of intrinsic values and community needs (Michael, 2009). Understanding these will increase the potential for the long-term prosperity of any community. Public meetings will inform residents about the developers' goals and how their community will be impacted, and while ecological and socio-economic information can be found independent of community meetings, residents will likely provide a clearer perspective on real issues (CIT report of Myanmar, 2014). Information on historic and culturally significant spaces, including the level of importance of archeological sites to community identity, may also be more useful if gained through dialogue with the community. Community meetings are an invaluable part of this process, allowing residents to participate, have a hands-on role in the development of their community, and feel empowered. These should be the heart of any new project and the taking-off point for decision-making.

Tourism, along with the multitude of changes it brings to host communities, is a key factor to consider when designing a sustainable community (Tosun, 2000). Without proper planning, communities are often forced to become completely financially dependent on tourism. While tourism can alleviate poverty, people must always have a dependable source of income funded within their community or region. Sole dependence on a tourism economy is damaging to communities and can intensify social and environmental problems, making conditions worse than before the advent of tourism. With improving their local economies as a top priority, governments and local

municipalities sometimes allow excessive physical development without first protecting their environment and people. Economic growth is often an important first step before social advances can be made, but it can also be detrimental without a framework for the protection of ecology and culture. While tourism provides income for local communities, enables positive tourist experiences, and promotes cultural exchange, it may also create environmental, economic and cultural hardships for local communities.

### **Coastal Tourism**

Coastal zone is defined as those areas of land which border the marine environment. According to Coastlearn.org, Coastal tourism is a unique combination of resources at the border of land and sea environments which includes sun, sand water, beach, scenic views, rich biological diversity, sea food, good transportation and suitable infrastructure. Various profitable services have been developed which are based on these resources such as beaches, diving, snorkeling, bird and fish watching tours, restaurants and other travel services (coastlearn.org). The origin of coastal tourism goes back to the Roman times, when the first villas were constructed in the Southern part of the Apennine peninsula (UNEP, 2009). In the years that followed, coastal tourism was considered as a part of medical tourism. The wealthy Romans used to go the coasts and indulge in activities for therapeutic purposes.

Coastal recreation activities have been increasing both in volume and in number during the last decade. It is strongly dependent upon natural and cultural resources. The natural resources are climate, landscape, eco-systems, etc. whereas the cultural resources include historic and cultural heritage, arts and crafts, traditions, etc. The development of tourism in coastal regions is also related to socio-economic features of the receiving environment such as

local community interests, health and security conditions exchange rate fluctuation, etc. (UNEP- Sustainable coastal tourism report, 2009).

### **Tourism Impacts**

Tourism can bring about economic and social benefits, both in rural and urban areas (Carole Simm, USA Today correspondent). According to United Nations Environment Programme, tourism yields tremendous positive outcomes as it is considered the most significant source of economic outcomes and employment. When managed well, tourism plays a positive role in the social, cultural and economic, political and environmental development of the destination (Kreag, 1988). On the contrary, unchecked tourism development can lead to a chain of damaging impacts.

### **Introduction to Varkala**

Varkala is a small coastal town situated in the Thiruvananthapuram district of Kerala. It is known for its Cenozoic sedimentary formations cliffs. Even the geologists consider this formation as a geo heritage site. The town is also known for Janardhanaswamy temple. The reason for the construction of this temple is a legend. One of the legends indicates that a Pandyan king was instructed by Lord Brahma to build a temple at this very place to redeem himself of his sins (Kerala Tourism.org, n.d.). Another legend goes like this - when a group of pilgrims approached Sage Narada and told him that they had sinned, Narada threw his valkalam - a loin cloth made from the bark of a tree, and it landed at this scenic village and hence, the place came to be known as Varkala. Narada told the pilgrims to pray for their redemption at Papanasam, which literally means redemption from sins (Wikipedia.org).

### **Tourist Attractions in Varkala**

Varkala in the Trivandrum region of Kerala is a lesser known but a complete and ideal tourist

destination. It has a scent of freshness in its air, given the untouched beaches, surrounding hills, springs and fisheries. One must visit the Papanasam Beach, Varkala Beach which offers a number of activities including paragliding and parasailing, Kappil Lake and lighthouses in the area. Varkala has a lot of architecture too, to attract tourists such as the JanardhanaSwamy Temple, Anjengo Fort, Vishnu temple and Sivagiri Mutt.

**Janardhanaswamy Temple:** Two thousand years old temple dedicated to Lord Hanuman and Lord Vishnu, it is still a well-known pilgrimage site for tourists. Non-Hindus are restricted to enter the inner sanctum but can hang around the temple.

**Varkala Tunnel:** A pictorial destination of Varkala, Varkala Tunnel was built by the British in 1867 to establish an internal waterway for carrying out the trade activities. It is also known Varkala Turuthu. The tunnel took approx. 14 years to complete.

**Papanasam Beach & Cliff:** A popular beach with white sand, pristine waters and towering cliffs, the breathtaking papanasam beach is a popular haunt with the tourists. The cliff has a number of beach shacks and resorts. The resorts also offer Ayurveda massage to tourists.

**Anjengo Fort & Light House:** At the distance of 15km to the south of Varkala, this place has its own history with the British colonization. A place of historic importance as well as beautiful natural setting, Anjengo is an ideal destination for those who don't mind walking around and explore what is in store.

### **Tourist Profile in Varkala**

Varkala attracts both foreign and domestic tourism. The number of tourist arrivals has been increasing over the past five years in Thiruvananthapuram district of which Varkala is a part (Kerala Tourism statistics, 2014).

Statistics indicate a rise in the number of foreign tourists in 2014 by over 7% compared to 2013. The majority of foreign tourist arrivals are European in origin, coming from countries like Bulgaria, Belgium, Croatia, Denmark, United Kingdom and Spain. Some of the tourists also originated from Chile, Israel, Russia, United States, Turkey and Middle Eastern countries. Few of them are solo travelers and stay for several days before moving to their next destination.

Domestic tourists mostly originate from Kerala itself and from the neighboring states of Tamilnadu and Karnataka. Domestic tourist arrivals have also risen by over 9% in 2014 compared to 2013 arrivals (Kerala Tourism statistics, 2014). Most of the domestic tourists are families on vacation or Honeymooners. Their stay period lasts from one day to about a week.

### **Community Profile of Varkala**

According to the demographic study conducted to prepare a master plan for Varkala by Kerala Tourism board, the population of Varkala consisted of approximately 40,000 people (Varkala population Census, 2011). The census indicated majority of the population to be Hindus (70%), Muslims (29%), Christians (0.36%) and Sikhs (0.01%). Buddhists and Jain population were non-existent. The Schedule Caste (SC) constituted 14.69 % while Schedule Tribe (ST) was 0.33 % of total population in Varkala. Approximately 13,000 were engaged in business activity of which 2500 to 3000 were engaged in tourism business. Community members involved directly or indirectly in tourism was unclear as it kept changing due seasonal fluctuations. During the field study, it was observed that the community members diversified roles in tourism business. There has also been an increase in the immigration of workers from other states especially Jammu and Kashmir and the North eastern states of

Meghalaya, Manipur, Sikkim and Assam. The prime areas in which the locals were involved in tourism are-

### **Impacts on Tourism- Environmental, Social & Economic**

Tourism impacts were clearly visible in Varkala. The interview with the business owners revealed social impacts and environmental impacts to be affecting their lives both in positive and negative ways. The economic impacts were positive and it benefitted them in several ways. The long term sustainability of tourism rests on the ability of the community leaders and tourism professionals to maximize its benefits and minimize its costs. Tourism growth has been a major contributor to increased economic activity for both developing and under developed countries (Ashley et al, 2007). Yet the impacts of tourism to a community are not widely understood. Most people think tourism in terms of economic impacts, employment, livelihood and taxes. However a range of impacts from tourism is broad and often influences areas beyond those commonly associated with tourism. Leaders as well as residents who understand the potential impacts of tourism can integrate this industry into their community in the most positive way.

### **Social Impacts**

Tourism has attracted both domestic and international tourists. Some of these tourists stay for long periods. Most of the local shop vendors claim the tourism has increased their revenue and is always good for the community. However, tourism is seasonal here. The months of December and January attract most tourists. The quality of life of the locals has improved as most tourists tend to spend locally thereby benefitting them. Tourism increases the community strength and brings about cultural unity (Goodwin, 2004). In Varkala, the community has diversified as people from other

parts have migrated here for establishing tourism related business. For example, people from Northeastern states have started working in hotels and restaurants while people from Kashmir valley have established textile specializing in Pashmina silk products. They are developing their knowledge through learning. Their regular interactions with tourists help them learn English. Besides, they are able to understand the needs and wants of tourists thereby being able to serve them better. Although, the community is comprised of diverse cultures, they pride themselves as a single community. At the same time, people have also opted to migrate to big cities for better job opportunities. The government has also provided its support to the community for skills training. The community members learn to make wooden arts and crafts, play musical instruments, perform local dances, etc. The tourists appreciate the culture and tradition of the local communities. They enjoy the local food and drink in the company of the locals. The locals also say that many tourists come here for a month or so but usually extend their stay up to six months.

### **Environmental Impact**

Tourism like any other industry produces wastes (Mc Dowell, 2016). These wastes need to be discarded in a way that it does not degrade the environment in any way. Waste disposal has been an issue in Varkala. Fortunately, the wastes are disposed of further inland thereby preserving the beach environment. In some places, it has been noted that wastes have been disposed of in the beach away from the tourists. Primary waste generators are Hotels and Restaurants. Often they dump their wastes inappropriately during the night. They claim staff shortage and lack of time as their reason. Fortunately, this has not affected the beach environment much. During the nineties, the natural environment had degraded due to overuse of resources and

improper waste disposal practices. Soon the stakeholders realized this and took steps to conserve the natural environment. Kerala Tourism Development Co-operation (KTDC) has been monitoring the area and ensuring that sustainable practices are followed by all involved in tourism. They have also employed beach cleaners and life guards who keep the beach clean. With the help of KTDC, local communities are learning the importance of natural environmental preservation. They have taken steps to ensure sustainable resource use and management of nature environment. With these new initiatives, the pollution levels have also reduced. Sea pollution is still an issue. One of the reasons is the religious practices followed elsewhere wherein plantain leaves and flowers are let into the sea. These become wastes and are washed away on the beach in Varkala. It also causes habitat loss and feeding cycles of marine flora and fauna.

### **Economic**

The economic impacts of tourism help the local communities (Goodwin, 2004). The impacts of sustainable tourism relates to foreign exchange earnings, contributions to government revenues, generation of employment and business opportunities (UNWTO, 2011). Long stay periods of tourists have ensured a consistent source of revenue. Short or medium stay guests tend to spend lavishly during their stay. Tourists carry light baggage and purchase most of their daily use products from local shop owners for the duration of their stay. This causes the multiplier effect and the economy is further increases. Besides, tourism also benefits other industries in the region. The transport industry is well utilized by the tourists. They hire two wheelers, travel to other cities in trains and local buses or hire cab services for day tours to nearby destinations. The multiplier effect has led to establishments of businesses which are not

directly linked to tourism. Since the development of this beach as a tourist destination, banks, retail stores, shopping malls, specialty restaurants, fishing industry, etc. have successfully developed (Zaei, 2013). This in turn has created employment and new markets for sale of local products. The standard of life has also increased largely. One of the respondents said that he could send his son to school and college because of tourism in Varkala. The families are able to buy superior quality products for daily sustenance. The development of tourism is creating more jobs for the local community. Economically, the beach town is doing fairly well.

### **The Future for the Community**

Tourism in Varkala has been growing over the years. Simultaneously, the involvements of local community members are also increasing. At the same time, immigration of workers and businessmen are also on the rise. This coastal town has potential to develop into a popular destination. The community members have debated views about the benefits of tourism in the future. Some suggest that rise in tourism will increase their daily income and improve their standard of life. There are others who believe that it will attract more people into tourism business and this will stabilize the income share or even reduce it. Few of the community members are also moving to other regions for business or employment. Either way, they will have to adapt and diversify wherever possible in order to sustain themselves in the industry.

The Government of Kerala has identified Varkala as a tourism hotspot in the Thiruvananthapuram district next to Kovalam beach. Currently, Varkala received about 22% (45,545 tourists) of total tourist arrivals in this district in 2010 (Kerala Tourism Stats, 2012). Based on those figures, it was estimated that the total tourists

visiting Varkala by the year 2021 would be around 4.5 lakhs (2.5%); by year 2031, would be around 8.4 lakhs (3%) and by 2041, would be around 14.8 lakhs (3.5%). With the rise in tourist numbers, the accommodation units will have to increase. Apart from these, there will be day time tourists and pilgrims that shall be visiting the place during festivals or religious occasions. This will also create a demand for jobs thereby benefiting the local communities.

With the rise in tourism and its related activities, Varkala is also vulnerable to uncontrolled tourism. Violation of Coastal Regulation Zone, pollution of water bodies and beaches, cliff erosion, destruction of the natural environment (fauna and flora), and reduction in tree cover due to uncontrolled development, overexploitation of coastal natural resources and unchecked construction activities is always a major concern (UNWTO Sustainable Coastal Tourism, 2009). Decreased local participation in tourism and related activities in terms of employment, entrepreneurship and informal activities, marginal jobs and low wages from tourism sector for local people and lower economic benefits to local people in spite of increasing tourist inflow to the region also need to be controlled. The overall development has to be sustainable in nature. Socio-cultural impacts also need to be addressed along with contingency plans. The region should not be a victim of cultural commodization, westernization, and create marginal men and women. Infrastructure development is also an important aspect of tourism development (Panasuik, 2007). Tourism planners at state level and regional level need to keep an eye on limited road network with narrower roads, inadequate parking facilities, absence of footpath and proper signage's along the roads and a number of railway level crossings. The planning at all the levels have to be controlled and evaluated

regularly in order to ensure sustainable tourism development. This will benefit all the stakeholders involved in the tourism activities in Varkala.

### **Conclusion**

Tourism industry is one of the largest sources of revenue and employment for the local communities. In Varkala, this is evident as most of the stakeholders of tourism on the supplier side are local people from regions surrounding Varkala beach. At this moment, this coastal beach town has not reached its carrying capacity. Immigration of people from other states for tourism business is not affecting the destination in any way. The community members are aware of the environmental, economic and socio cultural impacts of tourism. They have taken measures on their own to reduce the production of wastes and dispose the existing wastes in a controlled process. External assistance from the regional and state tourism organizations are involved with the community members for their sustainable development. The destination has potential to develop into a popular beach destination and attract more tourists. The estimates for tourism growth may lead to uncontrolled tourism which is a concern for all the stake holders. The state tourism organizations have launched a project for the development of Varkala. With the current tourism plans in place, Varkala will grow as one of the best tourism destination known for community involvement and sustainable practices thereby becoming an example for other destinations.

### **References**

1. Aleksander Panasiuk (2007), Tourism Infrastructure as a determinant of regional development, PP 213-214 Retrieved from

[http://su.lt/bylos/mokslo\\_leidiniai/ekonomika/7\\_8/panasiuk.pdf](http://su.lt/bylos/mokslo_leidiniai/ekonomika/7_8/panasiuk.pdf)

2. Ashley Et al (2007), The role of Tourism sector in Expanding Economic Opportunity, PP 11-13 Retrieved from [http://www.ksg.harvard.edu/m-rcbg/CSRI\\_publications/report\\_23\\_EO%20Tourism%20Final.pdf](http://www.ksg.harvard.edu/m-rcbg/CSRI_publications/report_23_EO%20Tourism%20Final.pdf)
3. BengiErtuna, Local community involvement in rural tourism development- The case of Kastamonu, Turkey, PP 19-21 Retrieved from [http://www.pasosonline.org/Publicados/10212special/PS0212\\_03.pdf](http://www.pasosonline.org/Publicados/10212special/PS0212_03.pdf)
4. Coast Learn.org- Introducing to Coastal Tourism [www.coastlearn.org/tourism/introduction.html](http://www.coastlearn.org/tourism/introduction.html).
5. European Commission, A European Strategy for more Growth and Jobs in Coastal and Maritime Tourism, PP 3-5 Retrieved from [https://ec.europa.eu/maritimeaffairs/sites/maritimeaffairs/files/docs/body/coastal-and-maritime-tourism\\_en.pdf](https://ec.europa.eu/maritimeaffairs/sites/maritimeaffairs/files/docs/body/coastal-and-maritime-tourism_en.pdf)
6. Goodwin & Santilli (2009), Community-Based Tourism: a success? PP 27-30 Retrieved from [www.haroldgoodwin.info/uploads/CBTaSuccessPub.pdf](http://www.haroldgoodwin.info/uploads/CBTaSuccessPub.pdf)
7. Glenn Kreag, The Impacts of Tourism, PP 6-10 Retrieved from <http://www.seagrant.umn.edu/tourism/pdfs/ImpactsTourism.pdf>
8. Kerala Tourism Development Co-operation (2014), Master Plan for Varkala, PP 8-10 Retrieved from [http://vividcorporation.org/images/pdf/final-varkala-draft-report-on\\_25%20July%202014.pdf](http://vividcorporation.org/images/pdf/final-varkala-draft-report-on_25%20July%202014.pdf)
9. Kyungmi Kim (2002), The effects of tourism impacts upon quality of life of Residents in the community, PP 25- 30, 33-36 Retrieved from [http://theses.lib.vt.edu/theses/available/etd-12062002\\_123337/unrestricted/Title\\_and\\_Text.pdf](http://theses.lib.vt.edu/theses/available/etd-12062002_123337/unrestricted/Title_and_Text.pdf)

10. Jeniffer Mc Dowall (2016), Managing waste in Tourist cities <http://resource.co/article/managing-waste-tourist-cities-11319> Environments and agriculture in the Mediterranean region. PP 263-270 Retrieved from
11. Liedewij van Breugel (2013), Community-based tourism: Local participation and perceived impacts, PP 15-18 Retrieved from <http://om.ciheam.org/om/pdf/a57/0400197.pdf>
12. Ministry of Tourism, Myanmar Policy on Community Involvement in Tourism, PP. 10-12 Retrieved from <http://www.harrisoninstitute.org/Community%20Involvement%20Tourism%20in%20Myanmar.pdf>
13. Muganda Michael (2009), Community involvement and participation in Tourism development in Tanzania, PP. 47-52, 103-104 Retrieved from <http://researcharchive.vuw.ac.nz/xmlui/bitstream/handle/10063/968/thesis.pdf?sequence>
14. Mansour Esmaeil Zaei (2013), The Impacts of Tourism Industry on host community, PP 15-20 Retrieved from <http://www.eajournals.org/wp-content/uploads/THE-IMPACTS-OF-TOURISM-INDUSTRY-ON-HOST-COMMUNITY.pdf>
15. Sunlu U (2003), Environmental impacts of tourism- Local resources and global trades: 16. UNEP Sustainable Coastal Tourism (2009), An Integrated approach to management and planning, PP 17-23 Retrieved from [http://www.unep.org/pdf/DTIE\\_PDFS/DTIx1091xPA-SustainableCoastalTourism-Planning.pdf](http://www.unep.org/pdf/DTIE_PDFS/DTIx1091xPA-SustainableCoastalTourism-Planning.pdf)
17. UNEP Report on Environmental impacts of tourism (2001) <http://www.gdrc.org/uem/eco-tour/envi/one.html>
18. UNWTO Press Release; PR No.: PR11053 (1st June 2011) - Local communities to secure bigger benefits from tourism. <http://www2.unwto.org/press-release/2011-06-16/local-communities-secure-bigger-benefits-tourism>
19. Sustainability in Tourism (2014), Working with Local Communities <http://www.tourismexcellence.com.au/sustainability-in-tourism/working-with-local-communities.html>
20. World Tourism Organization(1996)'' Agenda 21: Travel & Tourism Industry: Towards Environmentally Sustainable Development'' Retrieved from <http://www1.agora21.org/johannesburg/rapports/omt-a21.html>

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