

DHAROHAR

Volume | 6

Issue | 2

2018

ISSN: 2455-4448

Risk and Return Analysis of the Stock Market in India: Special Reference to IT and Banking Sector

- *Dr. Sachita Yadav & Vijay Bhargav*

BRICS Economies: Implications for the Global Financial Order

- *Dr Neha Lakhotia, Dr Yamini Karmarkar & Dr Varun Sarda*

A Comparative Regression Analysis of Onsite And Offsite ATM & POS Deploy Ability in Indian Banking Sector During the Period Of 2014 to 2016

- *Sandeep Bhattacharjee*

Mall Management and Shopping Behaviour With Reference to Shopping Mall

- *Dr. Suman Yadav, Mr. Ashu & Mr. Manish Jha*

An Analytical Study on Marketing Strategy of Patanjali With Special Reference to Biscuits Products- Navi Mumbai Area

- *Shaikh Umar Ali Zakir Hussain, Anuj Harikant Tiwari, Anmol Ravi Das & Dr. Geeta Kohade*

Impact of bank choice behavior on brand loyalty- An Empirical study

- *Dr Neha*

Impact of ban on using plastic carry bags on retail stores with special reference to Navi Mumbai City

- *Dr Geeta Kohade, Prof. Rahul Gadewar*

Editor in Chief**Dr. Shiney Chib****Director**, Datta Meghe Institute of Management Studies, Nagpur**Technical Editors****Dr. Vinod Waiker**

Assistant Professor

Datta Meghe Institute of Management Studies
Nagpur**Mr. Shantanu Bose**

Assistant Professor

Datta Meghe Institute of Management Studies
Nagpur**Editorial Advisory Board**

- **Dr. Anubha Dadhich**, Assistant Professor, Indian Institute of Management, Raipur
- **Dr. Anupam Narula**, Associate Professor, FORE School of Management, New Delhi.
- **Dr. Archana Shrivastav**, Assistant Professor, Amity School of Business, Amity University, Uttarpradesh.
- **Dr. Chitrallekha Potnis**, President , PEEL College of Professional Studies, Mississauga ON L5T 2N5
- **D N Panigrahi**, Associate Professor, IMT Nagpur.
- **Dr. Emmanuel Attah Kumah**
- **Dr. Jasbir Singh Matharu**, Associate Professor, IMT, Nagpur.
- **Dr. Kirti Gupta**, Professor, Bharti Vidyapeeth Institute of Management & Entrepreneurship Development, Pune.
- **Dr. Manisha Gupta**, Assistant Professor, Jaipuria Institute of Management, Indore
- **Dr. Manoj Das**, Assistant Professor, IMT Hyderabad
- **Dr. Manoj Verghese**, Professor (Management Studies) & Dean (Students Development), Rungta /college of Engineering & Technology, Bhilai.
- **Dr. Pawan K. Chugan**, Professor Institute of Management, Nirma University, Ahmedabad.

- **Dr. P Mary Jayanti**, Assistant Professor, IMT Nagpur.
- **Dr. Pedrito Jose V. Bermudo**, Director Graduate School, Dean, College of Arts & Sciences, University of Perpetual Help System Laguna, City of Bihan, Laguna.
- **Dr. Prema Basargekar**, Healthcare Management Program Coordinator, K.J. Somaiya Institute of Management Studies & Research Mumbai
- **Dr Rachana Patil**, Assistant Professor , Weschool(Wellingkar), Mumbai
- **Dr. Rudra Pradhan**, Associate Professor, Vinod Gupta School of Management, Indian Institute of Technology, Kharagpur
- **Dr.Saing-Tai Liu**, Dean College of Management, Vanung University, Taiwan.
- **Dr. Sanjeev Prashar**, Professor, Indian Institute of Management, Raipur.
- **Dr. Satish Chander Aliawadi** , Professor Emeritus, IMT-Ghaziabad
- **Dr. Satyendra Patnaik**, Director-Corporate Resource Centre- Amity University Chattisgarh.
- **Dr. Seema Singh**, Professor of Economics Department of Humanities, Delhi Technological University.
- **Dr. Sivakumar Velayutham**, Professor, Nilai, University, Malaysia.
- **Dr. Somayajjula Garimella**, Ph.D. Advisor, GNDP Singapore
- **Dr. Sushil Kumar**, Professor, Indian Institute of Management ,Lucknow
- **Dr.T K Chatterjee**, Associate Professor, IMT Nagpur
- **Dr. Vinay K Nangia**, Former Government of India Chair Professor in Knowledge Economy and Head & Professor, Department of Management Studies, IIT Roorkee.

CONTENTS

Editorial	5
Risk and Return Analysis of the Stock Market in India: Special Reference to IT and Banking Sector	7
BRICS Economies: Implications for the Global Financial Order	15
A Comparative Regression Analysis of Onsite And Offsite ATM & POS Deploy ability In Indian Banking Sector During The Period Of 2014 To 2016	20
Mall Management and Shopping Behaviour With Reference to Shopping Mall	30
An Analytical Study on Marketing Strategy of Patanjali With Special Reference to Biscuits Products- Navi Mumbai Area	43
Impact of bank choice behavior on brand loyalty- An Empirical study	51
Impact of Ban On using plastic carry bags on retail stores with special reference to Navi Mumbai city	61



Available at
Datta Meghe Institute of Management Studies
www.dmims.edu.in/research-journal



EDITORIAL

Greetings from the Editor's Desk!! I am very glad, to present the 6th Volume of our Research Journal, 'Dharohar'. The main aim of this journal is to provide, Academicians a platform, where they can share their research thoughts with the co-researchers/readers. This issue we have given the journal a new look and included totally new Editorial Advisory Board. I am thankful to all the experts for accepting our invitation and being the part of this research compendium. I am sure under the leadership of you all, the journal will grow, and will achieve new milestones, and will be part of renowned databases.

*This issues consist of articles/papers from the Marketing and Finance Domain. **Dr. Sachita Yadav** and **Vijay Bhargav** in their paper titled '**Risk and Return Analysis of the Stock Market in India: Special Reference to IT and Banking Sector**' told about the Risk and Return Analysis of the Stock Market in India: with Special Reference to IT and Banking Sector. Authors have taken five IT Stocks (Infosys, Wipro, HCL, TCS, Tech Mahindra), five banking stocks (ICICI, HDFC, Bank of Baroda, Kotak Mahindra, SBI) and NSE Nifty to examine the risk & return trade off of the Indian stock market. The empirical result showed that the banking sector is performing well in comparison to IT sector in the past five years in respect to risk and return. **Paper titled 'BRICS Economies: Implications for the Global Financial Order'** by **Dr Neha Lakhotia, Dr Yamini Karmarkar and Dr Varun Sarda** dealt with the challenges and problems faced by the New Development Bank .The study addressed the potent issue of shaping the global financial order for the BRIC and the emerging economies. **Sandeep Bhattacharjee** through his paper, '**A Comparative Regression Analysis of Onsite ATM & POS Deploy Ability In Indian Banking Sector During the Period of 2014 to 2016**', have explained how deployability of i.e. ATM's and POS's have purposefully led to rapid growth of availability of money for prospective consumers. They presented regression models to correctly predict future requirements of such ATM's and POS's. Article, '**Mall Management and Shopping Behaviour With Reference to Shopping Mall**' authored by **Dr. Suman Yadav, Mr. Ashu & Mr. Manish Jha***

tried to established relationship among mall management promotional strategies in Indian shopping mall environment with shopping behaviour and customer patronage behaviour. Further, the findings also revealed that, price based management strategies influence spending behaviour, while promotional strategies influence frequency of visit to mall. **Shaikh Umar Ali Zakir Hussain, Anuj Harikant Tiwari, Anmol Ravi Das** in their paper titled, '**An Analytical Study on Marketing Strategy of Patanjali With Special Reference to Biscuits Products- Navi Mumbai Area**', focused on, analytical study on marketing strategy of Patanjali products with special reference to biscuits in Kalamboli area. The study showcased the marketing strategy adopted by Patanjali to improve the sales of Biscuits product and the satisfaction level of consumers. Article titled , '**Impact Of Bank Choice Behavior On Brand Loyalty- An Empirical Study**' authored by **Dr Neha**, identified the various factors that influnced the customer choice of banks in Punjab and the impact of those factors on brand loyalty. '**Impact of Ban on using Plastic Carry Bags on Retail Stores with Special Reference to Navi Mumbai City**', written by **Dr. Geeta Kohade**, listed the problems due to decision taken by government. The study concluded that Customers' buying behaviour and facilities provided by retailer are associated with each other. In total we have included seven papers in this Issue.

We will be coming up with our Next Volume in June 2018. Wishing You All, A Very Happy & Prosperous New Year!!!

Happy Researching!!

Dr.Shiney Chib, Editor-In-Chief.



Available at
Datta Meghe Institute of Management Studies
www.dmims.edu.in/research-journal



RISK AND RETURN ANALYSIS OF THE STOCK MARKET IN INDIA: SPECIAL REFERENCE TO IT AND BANKING SECTOR

Dr. Sachita Yadav & Vijay Bhargav

Abstract : *The stock markets in India are contributing an enormous extent in progress of the economy. The IT Sector and banking sector engages major share among other sectors in Indian stock trading scenario. The study is all about Risk and Return Analysis of the Stock Market in India: Special Reference to IT and Banking Sector. In this study we have taken five IT Stocks (Infosys, Wipro, HCL, TCS, Tech Mahindra), five banking stocks (ICICI, HDFC, Bank of Baroda, Kotak Mahindra, SBI) and NSE Nifty to examine the risk & return trade off of the Indian stock market. The study is based on secondary data. The data (daily closing returns) for the analysis has been taken from the www.nseindia.com over a period of 5 years, from 1st April, 2013 to 31st March, 2018, with the help of various statistical techniques like mean, variance, standard deviation etc. The empirical result showed that the banking sector is performing well in comparison to IT sector in the past five years in respect to risk and return*

Key Words: Stock Market, Risk and Return Analysis, IT sector, Banking Sector

Statement of Problem : The meaning of risk in dictionary is “a situation involving to danger”. In terms of finance (or) management it is “investment associated with uncertainty”. There is a possibility that expected return on investment is totally different from normal return. The future is uncertain and the stock market returns are also uncertain, as they are related to future. There is a need to check the common concept related to stock market i.e. “higher the risk higher the return”. The check over the problem of uncertainty

and volatility there is a need to conduct the research on return and risk.

Literature Review

P. Naveen & Mrs. K. Neeraja, (2018). *Study on Risk and Return Analysis of Equity Shares in Banking Sector.* They have used the Statistical Tools like Mean, Variance, Beta, Standard Deviation and Correlation, in order to find out the results. The banks that they have taken for the analysis are ICICI, SBI, CBI, Syndicate, HDFC.

Dr. S. Poornima & Swathiga p. (2017). *A study on relationship between risk and return*

analysis of selected stocks on NSE using capital asset pricing model. The study has been conducted for two sectors i.e. automobile and IT sectors. NSE listed companies. From his study automobile companies are performed better and improved growth in the market.

Patjoshi P. (2016). *Comparative Risk Return Analysis of Bombay Stock Market with Selected Banking Stocks in India.* This study has been conducted from Jan. 2001 to Dec. 2015. The main objective of the study was to find out the correlation between Risk and Return of the Sensex and Banking Stocks (HDFC Bank, ICICI Bank, Axis Bank and SBI) of BSE 30 (Sensex). There are various statistical tools have been used for the study like correlation, regression, descriptive statistics and t test. The empirical analysis revealed that there is a positive correlation with AXIS Bank returns and negative correlation with ICICI Bank returns. Regression analysis study indicates that the association among Sensex returns and banking stock returns are statistically insignificant associations among Sensex returns and on the banking stock returns except that of AXIS Bank.

Dr. R. Narayanasamy, (2016). *Risk and Return Analysis of Equity Shares with Special Reference IT Companies (NSE) Stock Index.* This study explained the parity between risk and return in the Indian Equity Market. The presence of randomness of the return series of both monthly market return and monthly security returns in India has proved that the Indian stock market is weakly efficient. It is noteworthy to express that the Indian capital market exhibits a positive risk-return relationship.

Dr. Kushalappa S. (2015). *Risk and Return analysis of NSE Listed Stocks.* The study is undertaken with the main objective of determining the risk return profile of 30 stocks listed on NSE. It is clear from the study that HCL Tech has the highest actual returns and abnormal returns. It is found in the study that Asian Paint has the least actual returns and BPCL has the least

abnormal returns. The study reveals the fact that the CAPM return of HCL Tech is the least. It is evidence from the study that Axis bank has the highest systematic risk and Hero Motocorp has the least systematic risk and ICICI Bank has the least unsystematic risk.

Research Methodology

Scope of the Study : The study covers market risk analysis of Nifty with five selected Nationalized Banks and five selected IT Companies in the Indian contexts. Study has been conducted for the period of 1st April 2013 to 31st March 2018. By doing risk and return analysis, investor will be able to make choice to invest.

Need of the Study: Every investor faces a trade-off between investing in risky and risk-free assets. A risk-free asset ensures a monetary flow that is known with certainty. A risky asset, on the other hand, provides a monetary flow that is at least in part random. This uncertainty about the monetary flow from a risky asset necessitates an estimation of the risk associated with every asset as a safeguard against large losses from investing in them. Of all the investments, investment in stock market is considered to be the riskiest. On any given day, the price of an individual stock can go up or down by a large amount causing large gains or losses. So, by doing risk and return analysis of stocks we can minimize the risk and maximize the return.

Objectives of the Study:

1. To find out the risk and return of Nifty, IT Sector and Banking Sector selected companies for the year 2013 to 2018.
2. To compare the risk and return of Nifty and selected companies.
3. To compare the risk and return of IT and Banking Sector companies.

Data Collection : The Researcher has been used Secondary Data for the study. The required Data for the purpose of the study has been collected from books, journals,

magazines, newspapers, company information's and websites.

Analysis Tools

Statistical Tools: For the evaluation of risk and return of Equity Shares in IT sector and Banking sector, the following have been used:

- Mean
- Variance
- Standard Deviation

Calculation of Mean:

Where, $X_1, X_2, X_3, \dots, X_n$ = values of observations

$$\bar{x} = \frac{\sum x}{N}$$

$\sum x$ = the sum of x
 N = number of data

Calculation of Variance:

$$\sigma^2 = \sum \frac{(X - \mu)^2}{N}$$

Calculation of Standard Deviation:

$$\text{Standard Deviation} = \sqrt{v}$$

4. Data Analysis

Risk and Return Analysis of IT Sector

Infosys			
Year	Mean Return	Variance	Std Deviation
2013-14	0.096090383	4.350745888	2.085844167
2014-15	0.171920413	2.424264735	1.557005053
2015-16	0.075103842	3.008149932	1.734401895
2016-17	-0.05240974	1.908558126	1.381505746
2017-18	0.063468563	2.027676378	1.42396502

Table 4.1:

Interpretation: Table 4.1 showed the empirical results of Infosys during the period 1st April 2013 to 31st March 2018. The Average Daily Returns of Infosys is high during the year 2014-15. The Average Daily

Returns are low, but Standard Deviation and Variance of Infosys is high during the year 2013-2014, which showed that the risk involved in Infosys is high during this year.

Wipro			
Year	Mean	Variance	Std Deviation
2013-14	0.001283989	0.000365922	0.019129087
2014-15	0.000955731	0.000256727	0.016022694
2015-16	-0.000171403	0.000185488	0.013619393
2016-17	-0.000242367	0.000142447	0.011935124
2017-18	0.000446082	0.000163091	0.01277072

Table 4.2

Interpretation: Table 4.2 showed the empirical results of Wipro during the period 1st April 2013 to 31st March 2018. The average daily returns, standard deviation and variance of Wipro is high during the year 2013-2014, which showed that there

was high returns, but at the same time risk and volatility involved in Wipro is also high during this year. We have negative Average Daily Returns during the period 2015-2017, Variance and Standard Deviation is also low during this period.

HCL			
Year	Mean	Variance	Std Deviation
2013-14	0.002577885	0.00035291	0.018785908
2014-15	0.001686129	0.00036059	0.018989196
2015-16	-0.00045393	0.000364069	0.019080584
2016-17	0.00052011	0.00020979	0.014484125
2017-18	0.000552049	0.000165171	0.012851881

Table 4.3:

Interpretation: Table 4.3 showed the empirical results of Infosys during the period 1st April 2013 to 31st March 2018. The Average Daily Returns are Negative, but the standard deviation and variance of HCL is high during the year 2015-2016,

which showed that the risk and volatility involved in HCL is high during this year. By the year 2017-18 Standard Deviation is gradually decreased and mean is also low, this shows that risk involved during this year is low and returns are also low

TCS			
Year	Mean	Variance	Std Deviation
2013-14	0.001490789	0.000309906	0.017604152
2014-15	0.000924373	0.000236843	0.015389711
2015-16	0.000100911	0.000161628	0.012713303
2016-17	3.74012E-05	0.000214341	0.014640392
2017-18	0.000809611	0.00017682	0.013297371

Table 4.4:

Interpretation: Table 4.4 showed the empirical results of TCS during the period 1st April 2013 to 31st March 2018. The Average Daily returns, Variance, Standard Deviation of TCS is high during the year 2013-2014, which showed that there are high returns, at the same time volatility

and risk involved in TCS is also high during this year. The Average Daily Returns, Variance, Standard Deviation of TCS is low during the year 2015-16, which showed that the returns, volatility and risk involved in TCS is low during this year.

Tech Mahindra			
Year	Mean	Variance	Std Deviation
2013-14	0.002435175	0.000354985	0.018841034
2014-15	0.001658026	0.000218852	0.014793632
2015-16	-0.00089753	0.000390505	0.019761198
2016-17	5.22508E-05	0.000284471	0.016866257
2017-18	0.001597143	0.000314964	0.017747233

Table 4.5:

Interpretation: Table 4.5 showed the empirical results of Tech Mahindra during the period 1st April 2013 to 31st March 2018. The Average Daily Returns are negative,

but the Standard Deviation and Variance of Tech Mahindra is high during the year 2015-2016, which showed that the risk and volatility involved in Tech Mahindra is

high during this year. The Average Daily Returns, variance, Standard Deviation of Tech Mahindra is low during the year

2014-15, which showed the risk and volatility involved in TCS is low during this year.

Risk and Return Analysis of Banking Sectors

ICICI			
Year	Mean	Variance	Std Deviation
2013-14	0.001342	0.00055	0.023460807
2014-15	0.001911	0.000389	0.019719615
2015-16	-0.00086	0.000472	0.021735618
2016-17	0.000926	0.000402	0.020056185
2017-18	0.000634	0.000326	0.018060634

Table 4.6:

Interpretation: Table 4.6 showed the empirical results of ICICI during the period 1st April 2013 to 31st March 2018. The Average Daily Returns, Variance, Standard Deviation of ICICI is high during the year 2013-2014, which showed that the risk and volatility involved in ICICI is high during this year. The standard deviation of ICICI is low during the year 2017-18, which showed the risk involved in ICICI is low during this year. The Average Daily Returns are negative, Variance and Standard Deviation is also high to some extent.

HDFC			
Year	Mean	Variance	Std Deviation
2013-14	0.000951	0.000357	0.018884443
2014-15	0.001397	0.000159	0.01259117
2015-16	0.000279	0.000121	0.010979623
2016-17	0.001283	8.74E-05	0.009349228
2017-18	0.001154	7.38E-05	0.00858875

Table 4.7:

Interpretation: Table 4.7 showed the empirical results of HDFC during the period 1st April 2013 to 31st March 2018. The Standard Deviation and Variance of HDFC is high during the year 2013-2014, which showed that the risk involved in HDFC is

high during this year. The Standard deviation and Variance of ICICI is low during the year 2017-18, which showed the risk and volatility involved in HDFC is low during this year.

Bank of Baroda			
Year	Mean	Variance	Std Deviation
2013-14	0.00176	0.00091	0.030165979
2014-15	0.001021	0.000505	0.022461312
2015-16	0.000148	0.001022	0.031975463
2016-17	0.000959	0.000596	0.024409344
2017-18	-0.00037	0.000857	0.0292798

Table 4.8:

Interpretation: Table 4.8 showed the empirical results of BOB during the period 1st April 2013 to 31st March 2018. The Standard Deviation of BOB is high during the year 2013-2014, which showed that the risk involved in BOB is high during this year. The Average Daily Returns is

low and Standard Deviation of BOB is high during the year 2017-18, which showed the returns are low and risk involved in BOB is high during this year.

Kotak Mahindra			
Year	Mean	Variance	Std Deviation
2013-14	0.000954	0.000432	0.020774971
2014-15	0.002284	0.000275	0.016579978
2015-16	0.000302	0.000299	0.017298527
2016-17	0.001083	0.000152	0.012103539
2017-18	0.000811	0.000125	0.011161786

Table 4.9:

Interpretation: Table 4.9 showed the empirical results of Kotak Mahindra during the period 1st April 2013 to 31st March 2018. The Standard Deviation and Variance of ICICI is high during the year 2013-2014, which showed that the risk involved in Kotak Mahindra is high during

this year. The Standard Deviation of Kotak Mahindra is low during the year 2017-18, which showed the risk involved in Kotak Mahindra is low during this year. The Average Daily Returns are high during the year 2014-15.

SBI			
Year	Mean	Variance	Std Deviation
2013-14	0.001193	0.000634	0.025171761
2014-15	0.001838	0.000425	0.020627176
2015-16	-0.00098	0.000534	0.023116283
2016-17	0.001907	0.000368	0.019187452
2017-18	-0.00034	0.000602	0.02454447

Table 4.10:

Interpretation: Table 4.10 showed the empirical results of SBI during the period 1st April 2013 to 31st March 2018. The Standard Deviation of SBI is high during the year 2013-2014, which showed that the risk involved in SBI is high during this year.

The Average Daily Returns is high, Standard Deviation and Variance is low during the year 2016-17, which showed the risk and volatility involved in SBI is low during this year.

Risk and Return Analysis of Nifty

Nifty			
Year	Mean	Variance	Std Deviation
2013-14	0.000718669	0.000130018	0.011402549
2014-15	0.001045732	7.47037E-05	0.008643129
2015-16	-0.00037540	0.000116757	0.010805429
2016-17	0.000758377	6.14113E-05	0.007836533
2017-18	-0.00367712	0.004090892	0.063960078

Table 4.11:

Interpretation: Table 4.11 showed the empirical results of Nifty during the period 1st April 2013 to 31st March 2018. The

Average Daily Returns is high during the year 2014-15 The standard deviation of Nifty is high during the year 2017-2018,

which showed that the risk involved in Nifty is high during this year. The standard deviation of Nifty is low during the year 2016-17, which showed the risk involved in

Nifty is low during this year. The Average Daily Returns of Nifty is in Negative during the year 2015-16 and 2017-18

Comparison of Risk and Return Analysis of Nifty, IT Sector and Banking Sector

Particulars	Mean	Variance	Std Deviation	Rank (based on returns)
Nifty	-0.00030594	0.000894756	0.020529544	11
Infosys	0.07083469	2.743879012	1.636544376	1
Wipro	0.000454406	0.000222735	0.014695404	10
HCL	0.000976448	0.000290506	0.016838339	4
TCS	0.000672617	0.000219908	0.014728986	9
Tech Mahindra	0.000969013	0.000312755	0.017601871	5
ICICI	0.000791239	0.000428029	0.020606572	6
HDFC	0.001012765	0.000159377	0.012078643	3
Bank of Baroda	0.000703765	0.00077801	0.02765838	8
Kotak Mahindra	0.001086734	0.000256503	0.01558376	2
SBI	0.000724589	0.00051281	0.022529428	7

Table 4.12:

Table 4.12 showed the empirical results of Nifty during the period 1st April 2013 to 31st March 2018, all indices showed positive average daily returns except Nifty. The Average Daily Returns recorded highest of 0.07083469 in case of Infosys, whereas it found lowest of -0.00030595 in the case of Nifty. Therefore, from the above clearly explained that Average Daily Return of Nifty is lower than that of all stock returns over the study period. On the contrary, the Standard Deviation, Variance of Infosys (1.636544376) is highest when compared to all other stocks. The Standard Deviation of TCS (0.014728986) stock return is lower most for the mention period. Therefore, it indicates that Infosys stock encompasses maximum risk and volatility than that of all other stock returns, while TCS return comprises minimum risk. Kotak Mahindra and HDFC are performing well with good returns with less risk.

Suggestions & Conclusion : The study risk return analysis helps the investor to pick up the securities based on his choice. The study of this kind provides information about the performance of various stocks in

the market in terms of risk and return. Infosys has high returns but risk is also high, the investors who are willing to take risk can invest in Infosys. HCL has low returns at the same time risk is also low. In this study, we can conclude that some of the banks have higher returns and also some banks with high risk. Whatever it may be always the investor needs a combination with higher returns and low risk Kotak Mahindra has good returns with low risk and volatility, so this is the best suggestion for the investors to invest. The next best stock to invest is HDFC where we get good returns with low risk and volatility. Compared to IT Sector, Banking Sector is performing well.

References & Bibliography

- P. Naveen & Mrs. K. Neeraja (2018). Study on Risk and Return Analysis of Equity Shares in Banking Sector ISSN 2394 - 3386 Volume 5, Issue 3 March 2018
- Dr. M. Muthu Gopalakrishnan & Amal Vijay A.K. (2017). A Study on Risk Return Analysis of

- Pharmaceutical Industries in Indian Stock Market. ISSN: 2454-1362, Vol-3, Issue-5, 2017
- **Dr. Pramod Kumar Patjoshi (2016).** Comparative Risk Return Analysis of Bombay Stock Market with Selected Banking Stocks in India. ISSN 2455-2267; Vol.04, Issue 01 (2016) pgno.192-200.
 - **Dr. Prema Chandran (2016):** A Study on the Volatility and Returns of the Indian Banking Sector Index with Reference to NSE Nifty. ISSN: 2321-7782, Volume 4, Issue 4, April 2016.
 - **Dr. R. Narayanasamy (2016).** Risk and Return Analysis of Equity Shares with Special Reference to Companies (NSE) Stock Index. - volume3 issue2 March to April 2016
 - **Banhi Guha, Avijan Dutta, and Gautam Bandyopadhyay (2016).** Measurement of Risk Vs Return of Indian Sectoral Indices Vol. 4, No. 2, March 2016
 - **T. Mohamed Nishad, K.T. Thomachan (2015):** how Volatile is Indian Stock Market? a study based on selected sectoral indices. ISSN-2350-0530(O) ISSN- 2394-3629(P), Vol.3 Issue on 12th December, 2015
 - **Narayan Gaonkar, Dr. Kushalappa S. (2015):** Risk and Return Analysis of NSE Listed Stocks. Volume 4, Number 1, January - March' 2015 ISSN (Print):2279-0896
 - **Swarna Lakshmi P. (2013).** Volatility Patterns in Various Sectoral Indices in Indian Stock Market. ISSN 2248-9878 Volume 3, Number 8 (2013), pp. 879-886
 - **P. Karthika, Dr. P. Karthikeyan (2011).** A Study on Comparative Analysis of Risk and Return with reference to selected stocks of BSE Sensex, India. Volume: 01, Number: 04, August-2011
 - Retrieved data from www.moneycontrol.com
 - Retrieved data from www.nseindia.com
 - Retrieved data from www.finance.yahoo.com



Available at
Datta Meghe Institute of Management Studies
www.dmims.edu.in/research-journal



BRICS ECONOMIES: IMPLICATIONS FOR THE GLOBAL FINANCIAL ORDER

- *Dr Neha Lakhotia, Faculty, Pioneer Institute of Professional Studies, Indore*
- *Dr Yamini Karmarkar, Reader, IMS, DAVV, Indore*
- *Dr Varun Sarda, Faculty, Prestige Institute of Management and Research, Indore*

Abstract : The lack of reforms in the Brettonwoods system led to the establishment of the New Development Bank (NDB). There are many challenges and problems faced by the New Development Bank like the ability of the bank to raise monetary funds from sovereign markets and the selection criteria for prioritization of projects and hence its creation has been broadly welcomed. The 6th Brics Summit held at Fortaleza reflected the grouping of these economies as an investment portfolio. With this emerged the need to shape a new world order. In the areas where the norms and institutions still do not exist there are higher chances of a consensus. Issues like global governance of cyberspace, climate change and energy security need to be addressed properly. Though there exists an agreement on the need for a global governance in all Brics countries, there is a disagreement on how this should be shaped. The present study addresses this potent issue of shaping the global financial order for the BRIC and the emerging economies.

Key Words: *Global financial order, BRICS, New world order*

Introduction to BRICS

BRICS is referred to as the title of the association of emerging economies. The five members namely Brazil, Russia, India, China and South Africa are all categorized as developing and newly industrialized countries distinguished by large and fast growing economies having a significant influence in matters related to global affairs. Hosting a combined population of 3 billion people the BRICS combined nominal GDP

stands at US\$13.7 trillion whereas the foreign reserves account to an estimated US\$4 trillion in 2012.

The term BRIC was coined by Jim O'Neil of Goldman Sachs in a paper in 2001 titled "The World Needs better Economic BRICs". After this the BRIC countries went on to seek opportunities for cooperation in trade, investment, infrastructure development and other arenas. South Africa was invited by China to join the group of BRIC in 2010. The

demographic and Economic potential of the BRIC economies distinguish it from the other emerging economies as the most influential set of economies in the 21st century. Other factors which have contributed to the popularity of the BRICS are the size of the economy, capacity to function as an engine of

global economic growth and development. Goldman Sachs had predicted in 2003 about the popularity of China and India with a forecast that these economies would become the first and the third largest economies by 2050. Brazil and Russia would be the followers at fifth and sixth positions

BRICs Development Indicators				
Indicator	Brazil	Russia	India	China
Population (2009)	194 mil.	142 mil.	1.15 bil.	1.33 bil.
GDP (US\$, 2009)	1,573 bil.	1,232 bil.	1,310 bil.	4,985 bil.
GDP per Capita (PPP, Current Intl. \$, 2009)	\$10,499	\$14,913	\$3,015	\$6,778
GDP Avg. Growth Rate (1990 - 2009)	2.5%	0.3%	6.3%	10.1%
GDP Projected Avg. Growth Rate (2011-14, as of April, 2011)	4.2%	4.5%	8.1%	9.5%
Merchandise Exports (US\$, 2009)	153 bil.	303 bil.	162 bil.	1,201 bil.
HDI % Change (1990 - 2010; for Brazil only 2000 - 2010)	7.6%	3.8%	33.3%	44.2%
Global Sherpa, 2011 (www.globalsherpa.org); Data sources: World dataBank, International Monetary Fund (IMF), UNDP Human Development Report.				

Table 1: Major Development Indicators of BRIC Countries

Many analysts have suggested the expansion of the original group of BRIC nations to include other emerging markets also. However, Goldman Sachs resisted the inclusion of other economies into BRICS on grounds like demographics and economic characteristics. These economies were hence given place in the set of economically dynamic and promising developing countries labeled as "Next 11" in the Economics Paper No. 134 in 2005 titled "How Solid are the BRICs". These economies include Bangladesh, Egypt, Indonesia, Iran, Korea, Mexico, Nigeria, Pakistan, Philippines, Turkey and Vietnam.

An independent international organization by the name the BRICS Forum has been established to encourage commercial, political and cultural cooperation between the BRICS nations in the year 2011. The BRIC summits are aimed at focusing on means to improve the global economic situation, reforming financial institutions and discussing how the countries could cooperate mutually in the future.

Economic Growth and Development of the BRICS

The BRIC countries together have accounted for nearly 30 per cent increase in global output from a period of 2000 to 2008. The contribution of China has been remarkable since it has alone contributed more than half of the share of the BRIC countries and more than 15% of the growth in World Economic output from a period of 2000 to 2008. It is evident from **Table 1 above** that there is a sharp contrast in the performance and development taking place between China and the other BRIC countries.

Growing Importance and Emergence of BRIC Middle Class

The rapid growth and development which took place in India and China gave rise to the emergence of a large middle class. The consumption style and patterns of this middle class drove way towards the development and expansion of the global economy. The growth in the middle class population is expected to more than double that of the developed G7 countries.

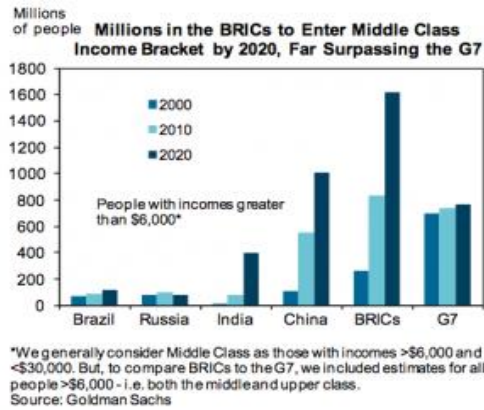


Table 2

The data on the consumer spending patterns reveals interesting insights about the behavior of BRIC consumers. The consumer attitudes and behavior in the official BRIC countries was analyzed by the **Credit Suisse Research's Emerging Consumer Survey 2011**. The pattern of consumer behavior in BRIC countries also vary for China, Brazil and other emerging markets. Chinese have an inclination to delay current consumption to save for the future whereas Brazilians report a modest saving percent of about 10 only, which is the lowest among all the BRIC countries. China is the only country wherein the monthly savings amount increased with higher monthly household income levels rather than leveling off like in the case of Brazil, India and Russia. This is also the reason behind the high inflation rates which plagued the economic growth and development in Latin American countries. The inflationary economic situation of the country led many Latin American consumers to spend their money quickly to avoid inflation reduce the valuation to nothing. The Consumption Map was categorized by the Credit Suisse into three categories of purchases namely the Essential Goods and Services, Useful Goods and Services and Discretionary Goods and Services. Essential goods include food, household and communication items, useful goods include property, healthcare, education and discretionary goods include brand name, clothing, vacations and others.

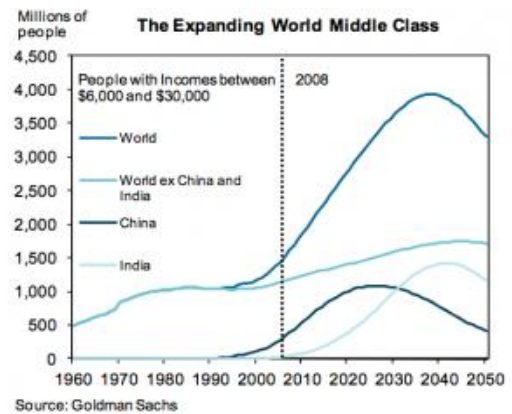


Table 3

With an increase in income the spending on discretionary and useful goods and services tends to increase thereby leading to higher levels of development. People are more brand name conscious in Brazil in comparison to consumers in India and China. In Brazil 62 % of the respondents plan to buy brand name shoes or wear in the next 12 months per month whereas in China and India the figure is only 47 and 49 per cent. The high degree of consumer confidence along with rapid economic development have emerged as the major reasons behind the popularity of the BRIC countries and thus contribute to the growing standards of the living.

Developments related to Science and Technology in BRICS

The BRIC countries have made noticeable contributions in terms of science, research and scientific publications. Since the year 2002, the global spending on Research and Development of BRIC countries has increased by 45 per cent, which is to a level of more than \$1000 billion. China has explored areas like clean energy, green transportation and rare earths in scientific industries and fields and plans to invest 2.5 % of the GDP in scientific research by 2020.

Current News: - BRICS represents a shift in the global economic power from the developed G7 economies towards the developing countries. It is estimated that these economies collectively will overtake the

G7 by 2027. BRICS economies have huge population and contributed to nearly 28% of the global economic growth. In the BRICS summit recently held in Delhi, India the leaders of BRICS have jointly agreed to work with the international community so as to ensure policy coordination and maintain macro-economic stability which would be useful for the global economy.

The BRICS want to contribute to the global economy in a significant manner but the Western nations have not exhibited enough trust in them since they are still to establish themselves as economic houses. The BRICS are making contributions to the global economy in the form of recapitalizing the International Monetary Fund and creating a pool of reserves for the mutual help of each other during times of sudden capital outflows. The summit of the leaders of the BRICS saw the signing of the agreement of the five BRICS Nations to extend credit facilities in their respective local currencies so that the role of the dollar can be minimized.

The recent ranking by the Standards and Poors' has highlighted certain myths like the collapse in growth. Though the rate of growth of GDP has seen a decline, the GDP continues to grow in every single quarter. The "I" in BRICS is only one of the vowels and the role and performance of other countries need to be considered equally. The growth rate of Brazil has been more than 6.5% only once in a span of 20 years whereas the average rate of growth has been less than 1%. Speaking about Russia it is the only country among the BRICS Nations which is poised to maintain its growth rate in 2012, after a long period of sluggish and negative rate of growth like -7.8% in 2009, 4% in 2010 and 4.2% in 2011. India has been having minimum annual growth rate of 6.5% since 2003-04 and, therefore it is not intelligent to replace India in BRIC with any other country. Investors however have not exhibited faith in the BRICS and are bearish due to the fall in commodity prices, corruption and lack of vision to solve their own domestic problems.

For India, Brics and the summits are a crucial plurilateral forum and process. They offer main benefits like firstly when there is a convergence of views among members on the need to create new institutions, the Brics have proved that they have the ability to do so. This is best illustrated by the setting up of NDB. Secondly, to prepare and present a common position, which would carry the weight of the entire group.

Conclusion

It is of utmost interest that the members of the BRICS be strong enough and develop mutual trust and confidence so that the West cannot damage the interests. The BRICS through this will jointly emerge as a powerful bloc in the global arena. With this collective functioning and working the Brics countries will be in a better position to address differences amongst themselves on bilateral, regional and global issues, ranging from military intervention, sanctions, terrorism to trade and investment and UNSC reforms. Clearly, despite internal differences and the sanctions imposed on the host of the 7th summit by G-7 countries, the emergence of Brics has been a powerful financial and political voice in the emerging multipolar world that is unlikely to be ignored.

References

- <http://en.wikipedia.org/wiki/BRICS>
- <http://www.globalsherpa.org/bric-countries-brics>
- <http://www.globalsherpa.org/bric-emerging-market-research-china-brazil-india>
- <http://bx.businessweek.com/future-of-bric-nations/view?url=http%3A%2F%2Findr oyc.com%2F2012%2F03%2F29%2Fbrics-coming-closer-as-an-economic-political-bloc%2F>
- <http://bx.businessweek.com/future-of-bric->

- nations/view?url=http%3A%2F%2Fwww.squamble.com%2F2009%2F01%2F14%2Fwhat-is-the-meaning-of-bric-nations%2F
- http://articles.economictimes.indiatimes.com/2012-06-21/news/32352408_1_external-debt-growth-rate-rating-agencies
 - http://articles.economictimes.indiatimes.com/2012-06-27/news/32441326_1_growth-rate-india-growth-story-gdp
 - http://articles.economictimes.indiatimes.com/2012-06-21/news/32352408_1_external-debt-growth-rate-rating-agencies
 - http://rbth.ru/articles/2012/06/27/the_west_hesitates_about_relying_on_brics_15997.html
 - <http://www.livemint.com/2012/06/19004912/BRICS-countries-seeking-more-s.html>
 - <https://www.brookings.edu/opinions/brics-shaping-a-new-world-order-finally/>



Available at
Datta Meghe Institute of Management Studies
 www.dmims.edu.in/research-journal



A COMPARATIVE REGRESSION ANALYSIS OF ONSITE AND OFFSITE ATM & POS DEPLOY ABILITY IN INDIAN BANKING SECTOR DURING THE PERIOD OF 2014 TO 2016

Sandeep Bhattacharjee, Assistant Professor, Amity University, Kolkata

Abstract : *Today's globalised world economy is dependent on customer's demand which fluctuates with technological growth and development. Such demand 's are fueled by modern payment systems which eases the process of transactions thereby reducing time and cost involved. With the advent of the plastic money, in form debit cards and credit cards, along with electronic form of payments, the number of transactions have for individual consumers s well as organizational consumers. In our current research, we have tried to understand how deployability of such hardware's i.e. ATM's and POS's have purposefully led to rapid growth of availability of money for prospective consumers. We have also tried to build regression models to correctly predict future requirements of such ATM's and POS's*

Key Words: *ATM, POS, online, offline, onsite, offsite*

INTRODUCTION

History of Plastic money

(1900-1950): Company-issued charge cards could be found as far as the early 1900's. These cards were mainly kept by customers loyal to the company. "Charg-it" was the first actual bank card and was issued in 1946. The card was invented by a banker in Brooklyn, by the name of John Biggins. But, it was used only for local purchases. The concept of the credit card was first initially worked upon by Frank Mcnamara. It was the effect of unavailability of cash or wallet after a dinner with business associates his wallet. This resulted in seeding of the idea known as charge card. This card later was known as the "Diners Club Card", which could be used at different locations. Later, this fresh idea became the first true model of the multipurpose charge card.

(1950 -1960): World renowned American Express issued their first credit card in 1958. Due to their gloabl presence, the Green Charge Card was accepted globally. This came to be known as the first internationally available credit card. (Source: <https://cashcofinancial.com/2016/01/the-history-of-plastic-money/>).

Further, Credit and debit cards would not be what they are today without the Mag Stripe or magnetic stripe. This momentous leap in card technology arrived when the CIA hired IBM to attach a magnetic stripe to their identity cards.

The technology was made possible only by using an innovating idea of ironing the magnetic stripe on the identity cards. This further was enhanced to be used in credit and debit cards. Forest Perry and his wife were the main contributors to this technology attached to identity cards. (Source:

<https://cashcofinancial.com/2016/01/the-history-of-plastic-money/>).

(1960 onwards) :Also, the most convenient aspects of plastic money is the all-serving ATM. The ATM (Automated Teller Machine) came into existence in the 1960's by John Shepperd-Barron. Due to an unfortunate and unsuccessful trip to the bank, John had to stay until the next day when it opened again for getting cash money from the bank. This gave him the idea of a self dispensing cash machine. Along with this invention of which came to be known as ATM, he also invented the 4-digit international standard pin code. John initially thought about a six-digit army serial; until her wife influenced him for four digits that shall be easier to remember. (Source: www.atminventor.com/)

LITERATURE REVIEW

(Bindu, 2016) appraised the impact of educational background on the usage of plastic money. The data has been collected from 50 respondents and mathematical techniques like percentage and weighted average techniques were applied to analyze the data. The findings of the study confirm the positive relationship between the education and usage of plastic money. As per the study the debit cards are the most popular plastic money used for transacting. Mounting acceptance of plastic money has become a source of income for the banks and also facilitates the smooth progress of the public transactions. The management of the currency has become easier and the associated cost is also lowered. It economizes the use of currency which in turn provides a boost to the bank credit and public money. The banks and the public are mutually gaining with the adoption of plastic money.

(Bhatt, 2015) examined the social and economic factors of the cardholders in order to observe the relationship of these factors with the use of debit and credit cards. The study further analyzed the tribulations faced by the card holders and the merchants in the business deal. The details have been collected

from 384 respondents in the state of Gujarat and the data has been analyzed with the help of one way ANOVA technique. The study reveals that the demographic and economic factors have a significant impact on the use of debit and credit cards. The use of smart card is very low as compared to the debit and credit card whose usage is as high as 24%. The top three areas where there is a maximum usage of plastic money are dining, travelling and jewelers. Enhanced security measures, insurance and rigorous advertisements are suggested in order to attract more number of people to use the plastic money. (Hajela et al, 2015) conducted the study "Analysis of the use of plastic money: A Boon or Bane" to analyze the consciousness and use of plastic money among the consumers. The data from 200 respondents was collected using stratified random sampling which included students, working professionals, government officials, house makers and senior citizens. The findings of the study reveals that the respondents are well aware of the concept of the plastic money and majority of the consumers prefer plastic money over cash and are satisfied with their debit or credit card services. The study also attempts to analyze the advantages and disadvantages of using the plastic money. On the positive side, consumers consider plastic money as a safe mode of transaction but the foremost problem according to them is the augmented transactional costs and superfluous official procedure to obtain the cards from the financial institutions. (Sonu et al, 2015) attempts to understand the attitude and preferences of the consumers towards the use of plastic money. The data has been collected from 200 respondents to analyze the acceptability of plastic money among the Indian consumers. The study shows that the preference of debit cards is more as compared to the credit cards as the debit cards are considered more beneficial in terms of control over spending, security and availability of lucrative facilities like cash back offer. The study also highlights the major issues of concern with regard to usage of plastic money. Some of the factors are worn out

magnetic strips, unnecessary formalities in procuring the card, chances of fraud and high rate of interest on outstanding balance.

(Kaur, 2014) analyzed the perception of the card holders towards the plastic money and also discusses the problems confronted by the card holders. The details were collected from 100 respondents in the Sirsa District. The study reveals that concept of plastic money is very popular in the Indian context and 67% of the respondents are using the facility of plastic money. The study also highlights the major problems confronted while transacting through debit and credit cards. Some of the problems examined in the study are blocking of card, machine being out of cash at times, unavailability of the printed statement etc.

(Patil, 2014) provides an overview of the increased usage of plastic money and its impact on the banking sector. The study also throws light upon the strategies planned for plummeting the frauds occurring because of Debit and Credit cards. The details from 100 respondents were collected using the non probabilistic convenience sampling method from a city of Mumbai. Some of the factors that contribute to the increased adoption of plastic money are arrivals of online shopping stores, multiplexes etc, the lucrative deals offered on shopping through cards, hassle free EMI's, ease of carrying the card and availability of personal loans on cards. Despite of the rapid expansion of the Indian Economy and budding middle class, the usage credit card usage among Indians is actually falling. The decline in the usage of cashless transactions can be attributed to the high interest rates on the outstanding amount that takes the customers into a debt trap and complex nature of cards. Effort is being made to lessen these hurdles contributing to the constructive growth of the cashless transaction market.

(Zhang et al, 2013) investigates the choice of payment instruments in a simple model consisting of two factors costly record keeping and limited commitment. According to the study, the understanding of the

relation between cash and plastic money is of a vital concern as this mechanism is essential for the policymakers when they develop set of laws on surcharges and interchange fees. The study further reveals that the inflation triggers the substitution of money to credit as the increased inflation rate lowers the rate of return on money.

(Amin et al, 2012) observed the evolution of plastic money in the Indian Banking system and its significance in controlling the issues like money laundering. The paper emphasizes that the use of plastic money will contribute to the effective functioning of the financial system. The use of plastic money makes the entire financial system swift and convenient.

(Kaur, 2008) concentrates on the growth of Indian Banking Industry in view of usage of debit cards and credit cards. The study also depicts the prospects and future growth of plastic money in India. The increase in consumerism spawned by economic reforms commenced in 1990's has also ignited the demand for plastic cards. Up gradation of the technology is posing a challenge to the Indian Banking Industry to keep abreast with the technology, as an essential requirement for their survival. The study reveals that "the estimated credit card base in India till 2020 will be 127 million as compared to 23.1 million in 2007."(CLSA Report) which indicates a huge potential for the Indian Bankers to generate business.

RESEARCH OBJECTIVES

Our research objectives are:

1. To identify pattern of deployability of ATM's during a period of 2 years i.e 2014 & 2015 (8 quarters).
2. To identify pattern of deployability of POS's during a period of 2 years i.e 2014 & 2015 (8 quarters).

3. To observe the differences in deployability of Onsite ATM's and of Offsite- ATM's.
4. To observe the differences in deployability of Online POS's and of Offline- POS's.
5. To predict the behavior of past deployability on future requirements of Onsite ATM's, Offsite- ATM's, Online POS's & Offline- POS's.

HYPOTHESIS/ASSUMPTION

Our hypothesis for the current research includes:

In case of ATM's :

Null Hypothesis (H0a):, Off- site ATM deploy ability is predictable and dependent on past deployed ATM.

Alternate Hypothesis (H1a): Off- site ATM deploy ability is unpredictable and not dependent on past deployed ATM's.

In case of POS's:

Null Hypothesis (H0b): Off- line POS deploy ability is predictable and dependent on past deployed POS's.

Alternate Hypothesis (H1b): Off- line POS deploy ability is unpredictable and not dependent on past deployed POS's.

RESEARCH METHODOLOGY

The numerical research was conducted through collection of relevant samples from secondary source available in internet (www.rbi.org.in) for ATM'S and POS's. We have also used some literature based surveys by visiting relevant websites available freely over the internet for collecting materials in support of research conducted.

DATA COLLECTION

The data used for analysis was collected from free source RBI website (Source: <https://www.rbi.org.in/>). We have also used Microsoft Excel and SPSS 16 in which functions of correlation and regression as statistical tools were used to analyze data for 57 banking companies within the common period [*march 2014, June 2014, September 2014, December 2014, March 2015, June 2015, September 2015, December 2015, march 2016*] i.e 228 cells(row x columns). Some secondary sources were also used for understanding the basics related to plastic money, ATM, POS, ONSITE, OFFSITE.

DATA ANALYSIS

Descriptive Statistics

Variables	N	Minimum	Maximum	Mean	Std. Deviation
P1	57	0	23042	1463	3144
P2	57	0	20473	1345	3193
P3	57	0	283162	18400	58144
P4	57	0	10004	275	1480
Q1	57	0	23614	1543	3233
Q2	57	0	21315	1385	3288
Q3	57	0	296605	18800	59040
Q4	57	0	10534	282	1542
R1	57	0	23629	1600	3255
R2	57	0	21762	1426	3354
R3	57	0	301621	19100	59564
R4	57	0	7201	133	954
S1	57	0	23629	1634	3263
S2	57	0	21925	1461	3379
S3	57	0	243334	18600	55066
S4	57	0	348	6	46
M1	57	0	16384	1562	2463
M2	57	0	29118	1620	4184
M3	57	0	248786	19800	58550
M4	57	0	346	6	46
O1	57	0	18760	1672	2771
O2	57	0	28866	1659	4171
O3	57	0	265535	21300	61394
O4	57	0	337	6	45
PA1	57	0	19413	1716	2853
PA2	57	0	29196	1684	4227

PA3	57	0	280262	21800	61621
PA4	57	0	337	6	45
T1	56	0	20403	1821	2999
T2	57	0	29321	1704	4253
T3	57	0	302119	23000	67579
T4	57	0	326	6	43
MAX	57	0	302119	23000	67579
MIN	57	0	326	6	43

Table 1. Descriptive Statistics of available data

In the above table1, we can see the descriptive statistics related to on-site ATM, Off-site ATM, to on-line POS, Off-line POS as (1, 2, 3& 4) respectively. Whereas the month of march 2014, June 2014 ,September 2014, December 2014, March 2015, June 2015,

September 2015, December 2015, March 2016 are represented using P, Q, R,S,M, N, O, PA & T respectively. Also, it has been observed that “ T3” has **MAX(max), MAX(mean), MAX(std. deviation)** and “ T4” has **MIN(Max),MIN(min), MIN(std. deviation)**.

a. TIME SERIES ANALYSIS RESULTS

SI NO.	BANKING TRANSACTION TYPE	SERIES (IN TABLE) *	R-SQ VALUE	POS ITIVE	NE GATIVE	INFERENCE
1	On-site ATM	I-(P1, Q1, R1, S1, M1, N1,O1, PA1) , P- T1	0.99	Y	N	STRONG
2	Off-site ATM	I-(P2, Q2, R2, S2, M2, N2,O2, PA2) , P- T2	1.00	Y	N	STRONG
3	On-line POS	I-(P3, Q3, R3, S3, M3, N3,O3, PA3) , P- T3	0.995	Y	N	STRONG
4	Off-line POS	I-(P4, Q4, R4, S4, M4, N4,O4, PA4) , P- T4	1.00	Y	N	STRONG

Table 2. Time Series Analysis yields (Source: Author Analysis)

From the above table 2, we can see the ability of the independent variables in predicting the future value of (March 2016 values). In case of On-site ATM's , data values from P1, Q1, R1, S1, M1, N1,O1, PA1(march 2014, June 2014,September 2014, December 2014, March 2015, June 2015, September 2015, December 2015)

respectively were independent values which were used to predict values of T1.i.e march 2016 on-site ATM values. **R-square value of 0.99 shows that independent values could explain 99 % of the results in the form of positive correlation. This shows that these values could be further used for future**

prediction which could give accuracy of 99% approx.

Similarly, **Off-site ATM** (r-square value of 1.00) had 100 % explained positive correlation. **On-line POS**(r-square value of

0.995) had 99.5 % explained positive correlation and **Off-line POS**(r-square value of 1.00) had 100 % explained positive correlation.

b. On-site ATM Regression analysis

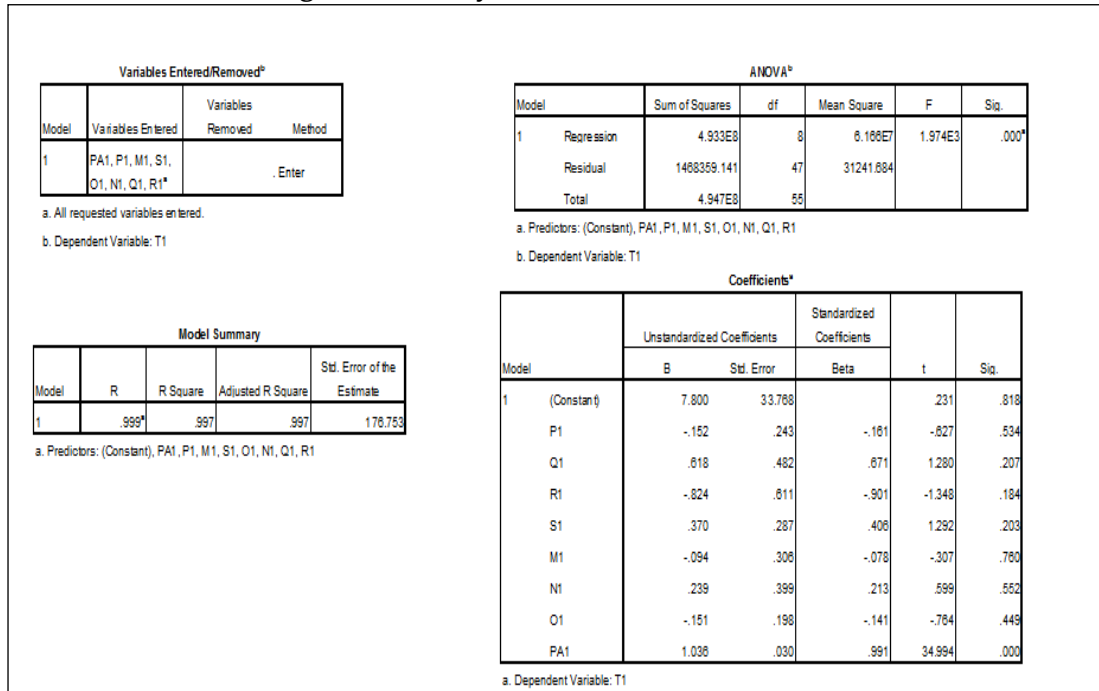


Figure 1 On-site ATM predictions (Source: Author Analysis)

As seen in the figure 1, The **On-site ATM** for march 2016 was correctly predicted with an accuracy of 99.7% (R-sq value=0.997%).The beta coefficient for independent variables kept on fluctuating from negative to positive and so on (-0.161, 0.671,-0.901,0.406,-0.078,0.213,-0.141,0.991) For P1,Q1, R1, S1,M1,N1,O1,PA1.The negative indicates that onsite ATM is less volatile in the market(

std. Beta coeff <1), although we can see that negative beta is also present in alternate quarters (P1,R1,M1,O1) which indicates reverse trends than that of the market).

c. Off-site ATM Regression analysis

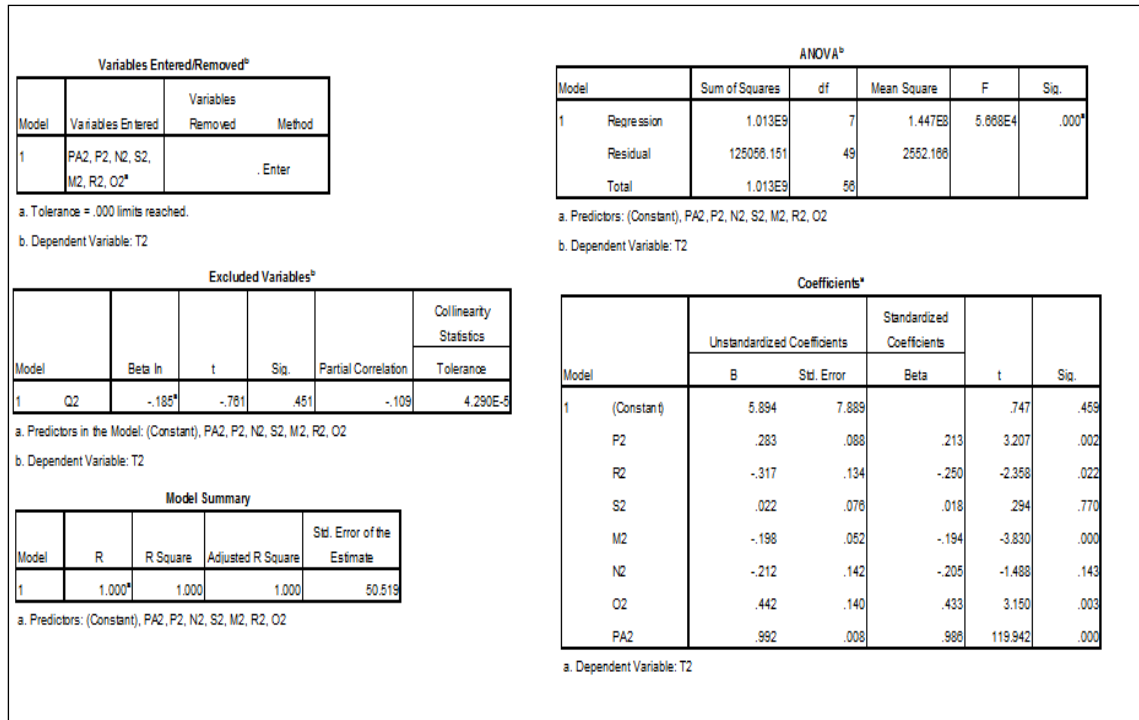


Figure 2. Off-site ATM predictions (Source: Author Analysis)

As seen in the figure 2, The **Off-site ATM** for march 2016 was correctly predicted with an accuracy of 100% (R-sq value=1.00).The beta coefficient for independent variables kept on fluctuating from negative to positive and so on (0.213, -0.250,-0.018,-0.194,-0.205,0.433,0.986).The negative indicates that

onsite ATM is less volatile in the market(std. Beta coeff <1), although we can see that negative beta is also present which indicates reverse trends than that of the market).

d. On-line POS Regression analysis

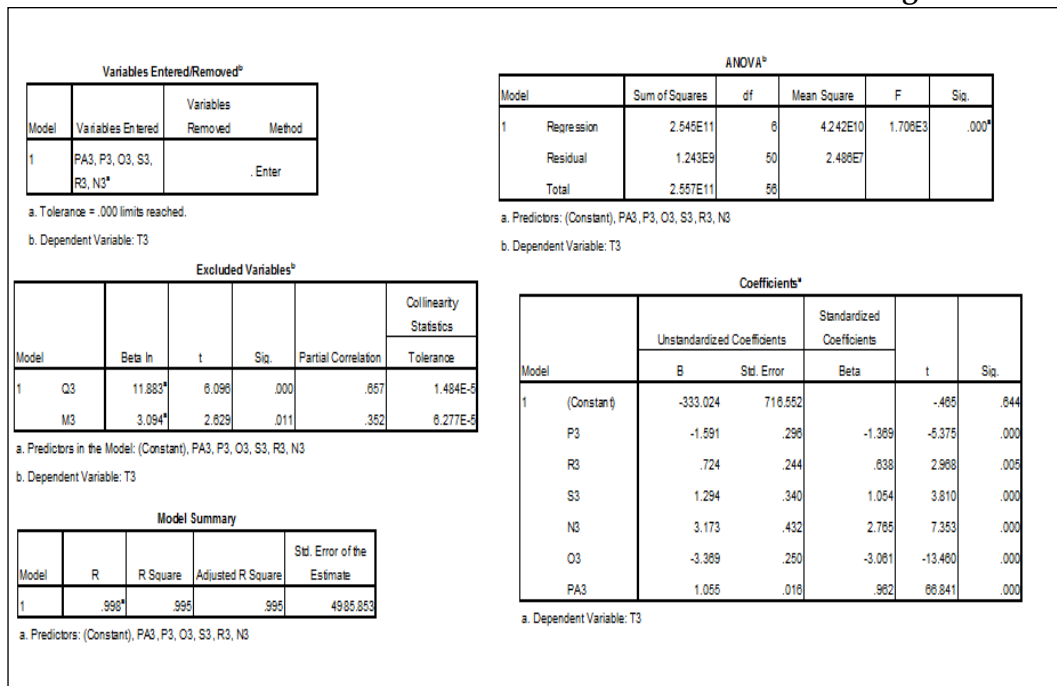


Figure 3. On-line POS predictions

(Source: Author Analysis)

As seen in the figure 3, The **On-line POS** for march 2016 was correctly predicted with an accuracy of 99.8% (R-sq value=0.995).The beta coefficient for independent variables kept on fluctuating from negative to positive and so on (-1.369, 0.638,1.054,2.765,-3.061,0.962)but with more periodic intervals(**5 quarters**).The negative beta indicates that

On-line POS is more volatile in certain periods (p3,o3) in the market(std. Beta coeff. >1), although we can see that negative beta is also present which indicates reverse trends (P3,S3,N3,O3)than that of the market).

e. Off-line POS Regression analysis

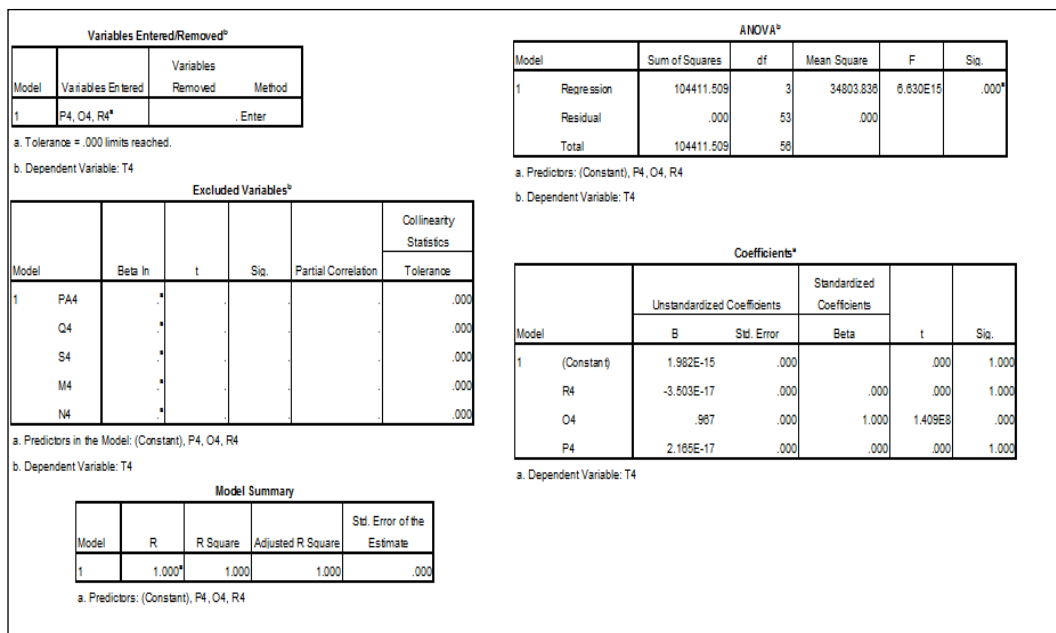


Figure 4.. Off-line POS predictions (Source: Author Analysis)

As seen in figure 4, As seen in the figure 3, The **On-line POS** for march 2016 was correctly

predicted with an accuracy of 100% (R-sq value=1.00).The beta coefficient for independent variables kept on fluctuating from negative to positive and so on (0.00,1.00,0.00) (R4, O4,P4 quarters).

RESEARCH FINDINGS

From the current research, the following findings can be listed as:

1. The On-site ATM data considered for our regression is stable(r-sq. value= 0.99). So, future on-site ATM values can be predicted using the same model.
2. Also, **Off-site ATM** (r-square value of 1.00) had 100 % explained positive correlation. So, future on-site ATM values can be predicted using the same model.
3. **On-line POS** (r-square value of 0.995) had 99.5 % explained positive correlation. So, future on-line POS values can be predicted using the same model.
4. **Off-line POS** (r-square value of 1.00) had 100 % explained negative correlation. So, future off-line POS values can be predicted using the same model.

5. Both **Off-site ATM & Off-line POS** has (R-sq values of 1.00) which indicates that they can be better predicted than **On-site ATM & On-line POS**.

CONCLUSION

Therefore, from the above findings, it is clear that i) Null Hypothesis (H_{0a}): **In case of ATM's**, Off- site ATM deployability is predictable and dependent on past deployed ATM , is true and its alternate hypothesis (H_{1a}) stands as false.

Also another hypothesis, **In case of POS (Point of sales)**, Off- line POS deployability is predictable and dependent on past deployed POS , is true and its alternate hypothesis (H_{1a}) stands as false. Both deployability of ATM's and POS can be correctly predicted based deployability in past 8 quarters as proven by our model of regression.

FUTURE WORK:

Our work is primarily dependent on secondary data available over internet. In our future research we shall try to assimilate more data on ATM's and POS, and other kinds of transactions conducted on those machines.

REFERENCES:

- Bhatt, D. (2015). An Analytical Study on Use of Plastic Money in India: With Special Reference to Card Holders of Gujarat. *Impact Factor*, 5(4).
- Bisht, A., Nair, P., Dubey, R., & Hajela, T. Analysis of the use of plastic money: A boon or a bane.
- K, P, Bindu. (2016). A study on the importance and popularity of Plastic money in Aluva. *IOSR Journal of Economics and Finance (IOSR-JEF)* 7(1).
- Kaur,H. (2014). Perception of card holders towards plastic money in Sirsa. *International Journal of Multidisciplinary Research and Development* , 1(6), 227-229
- Kaur, M., & Kaur, K. (2008). Development of plastic cards market: past, present and future scenario in Indian banks. *Asia Pacific Business Review*, 4(4), 62-74.
- Lotz, S., & Zhang, C. (2013). Paper or Plastic? Money and Credit as Means of Payment. *CEPP Discussion Paper Series*.
- Patel, B., & Amin, U. (2012). Plastic Money: Road map towards cash less society. *Paripex Indian Journal of Research*, 1(11).
- Patil, S. (2014). Impact of plastic money on banking trends in India. *International Journal of Management Research and Business Strategy*, 3(1).
- R, Nirmala.,Sonu.(2015). Analysis of the use of plastic money.2nd International Conference on Science, Engineering & Management.
- <https://www.atminventor.com/>
- <https://www.cashcofinancial.com/2016/01/the-history-of-plastic-money/>.
- <https://www.rbi.org.in/>
- <https://www.cashcofinancial.com/2016/01/the-history-of-plastic-money/>.
- <https://www.rbi.org.in/>



Available at
Datta Meghe Institute of Management Studies
www.dmims.edu.in/research-journal



MALL MANAGEMENT AND SHOPPING BEHAVIOUR WITH REFERENCE TO SHOPPING MALL

Dr. Suman Yadav, Assistant Professor, Mr. Ashu & Mr. Manish Jha, Assistant Professors

Fairfield Institute of Management & Technology

Abstract : *Mall management built an image of the mall which influences the mall patronage Chebat et al, (2010). Mall management strategies like Price promotional and non-price promotional strategies enhanced footfall and construct an image of mall in the mind of the shoppers. This study tries to established relationship among mall management promotional strategies in Indian shopping mall environment with shopping behaviour and customer patronage behaviour. Firstly, the study computed Correlation to determine the association between mall management strategies (price, event and promotional strategies) with frequency of visit, time spent in mall and amount spent. Secondly, the study tries to established relationship between mall management strategies and patronage behaviour. Further, the findings also reveal that price based management strategies influence spending behaviour while promotional strategies influence frequency of visit to mall*

Key Words: Mall Management Strategies, Spending Behaviour, Price & Promotion Strategies, Patronage

Introduction: In retail marketing to understand the patronage behaviour of the consumer is an important issue for retail managers because it enables them to identify and target those consumers who are most likely to purchase Pan & Zinkhan, (2005). In the mid-1930s Reilly was the first researcher who proposed the gravity pull model to the retailers. This model describing the relationship between retail trade area size and distance travelled to the retail area. According to this model consumer make single purpose shopping trip to the nearest shopping center. Gravity pull model has seen several extensions including price Dodds et

al., (1991), services, Baker et al., (2002), quality of products Vahie & Paswan (2006) and assortments, Stassen et al., (1999). Further researcher like Christaller (1935, 1966) & Craig (1984) proposed center place theory according them if a shopping mall provide better quality of products and good assortments could catch shoppers from a long distance. With the growth of the shopping mall, where various new malls were built each year grabbed academic researcher attention toward the consumer motives to visit a shopping mall. Tauber (1972) identified two types of motives to visit a shopping mall: personal and social. The

personal motives include the needs for role-playing, diversion, self-gratification, learning about new trends, physical activity and sensory stimulation. The social motives include the needs for social experiences, communication with others, peer group attractions, status and authority. Shopping mall management has long struggled to identify factors affecting mall patronage **Burns, (1992); Kirkup & Rafiq, (1994); Kenney, (2000)**. From the perspective of shopping mall management, a mall that can generate more traffic is one that can demand higher lease price from its store tenants because more mall traffic usually translates into more store traffic and sales. Mall management built an image of the mall which influences the mall patronage **Chebat et al, (2010)**. Mall management built mall image and generate footfall by recommending many strategies such as: Price promotional and non-price promotional strategies. Price promotional activities make shoppers to keep value of money and make some saving. While non price strategies like fashion show, point of purchase, display, photo contest and shopping carnivals influence impulse buying and patronage.

The dynamic nature of sales promotion has inspired many researchers **Chebat et al., (2010) Talpade & Haynes, (1997); Parsons, (2003); Kim, et al., (2004)** of western countries to turn their attention to study the various issues related to this element of promotion mix. Many studies have been conducted on the planning, implementation and evaluation aspect of sales promotion worldwide. In addition to this not much work has been done in the area of mall management strategies and comparative analysis of the different **mall management strategies** with respect to mall patronage. Very limited studies have been conducted in India taking in to consideration mall management strategies and till now no relationship have been established among mall management promotional strategies in Indian market environment with shopping behaviour and customer patronage behaviour.

Review of Literature

Mall Management Strategies and Shopping Behaviour

Mall activation or mall promotion is one such medium wherein the consumer gets to build brand affinity with the product and company. rice based promotional events include group wide sales, gift with purchase, discounts **Talpade & Haynes, (1997); Parsons, (2003); Kim, et al., (2004)** This priced based promotional activity encouraging visits **Folkes & Wheat, (1995); Smith & Sinha, (2000)** and also increased spending behaviour of the customer in the mall.

Entertainment based promotional events include general entertainment like stage show, art exhibition, fashion show, musicians. This type of promotion held in a very pleasing environment or festival season because they created a degree of excitement and excellence of shopping experience **Wakefield & Baker, (1998)**. Entertainment based activity positively related with the visit **Wakefield & Baker, (1998); Parson, (2003)**.

Public Relation oriented promotional events include School and community display, painting competition and social campaigns **Alexander & Muhlebach, (1992)**. This type of promotion used to build mall image in the society rather than sale and visit drivers.

Store based promotional events include discounts, fashion show, school holiday and other temporary activity within the store that create memorable experience for the participating customers **Parson, (2003); Sit et al., (2003)**. This type of events provides additional value to the customer shopping experience and positive image towards the store **Close et al., (2009)**.

Haesun (2004) investigated the effect of retailer's fashion and price orientation on manufacturer's offerings of retailer's cooperation with promotional support. Results of the study showed significant effect of price orientation on both offering frequency and cooperation level. **Chiew et al., (2005)** in their study evaluated the impact

of sales promotional tools, namely coupon, price discount, free sample, bonus pack, and in-store display, on product trial and repurchase behaviour of consumers. A study result gets downed that trail determines repurchase behaviour and also mediates in the relationship between sales promotions and repurchase. A study by **Parson, (2003)** attempted to find out the impact of different mall activities (price, promotion and event) on sale and visit behaviour in shopping mall. Results suggested that events activities had no impact on visit and spending behaviour while sale and promotional activities was found to be a strong impact on visit and spending. Therefore, we hypothesize that the sale and promotional activities have positive impact on shopping behaviour.

H₀₁: *Price promotional mall activities have no influence on frequency, time spent and amount spending behaviour.*

H₀₂: *Non Price promotional mall activities have no influence on frequency, time spent and amount spending behaviour.*

Shopping Behaviour and patronage

An understanding of patronage behaviour is a key issue for retail managers because it facilitates them to identify and target those consumers most likely to purchase and loyal to the shopping mall. In the past, a large number of constructs affecting the retail patronage have been explored. The choice of store and frequency was found to be affected by factors like competitive price, services, product quality, store atmosphere, opening hour, store size etc. **Baker et al., (2002); Shim et al., (1998); Finn & Louviere, (1996); Pan & Zinkhan, (2005) & Roy (1994)**. The results of a study conducted by **Pan and Zinkhan,**

(2005) suggest that various predictors (e.g., service, product selection, quality) are strongly related to shoppers' retail choice, whereas others (e.g., store attitude, store image) are important antecedents of shopping frequency. Shoppers vary in the way they behave in the shopping mall and in perceived benefits received by them in shopping mall forecaster them to repatronage intention **Bloch et al., (1989); Jones et al., (2006)** Research suggested that retail patronage can be enhanced by location and retail tenant selection. It also suggested that area in which shopping mall located appeal to a specific type of frequent customer **Raajpoot et al., (2008)**. Since shopping value is an outcome of the shopping experience, it may influence future patronage intentions. In a study of mall shoppers describing a typical shopping experience at a mall anchor store, **Babin & Attaway (2000)** found that hedonic and utilitarian shopping value positively influenced customer share. Customer share was operational zed as a consumer's recall of previous repeat purchase behaviour, in terms of time and money, at a specific retailer relative to competitors, capturing an estimate of actual patronage behaviour. Past behaviour is a predictor of Future behaviour, therefore we hypothesize that shopping behaviour (frequency of visit, time spent and amount spending) will influence patronage for future mall visits

H₀₃: *There is no association between shopping behaviour (time spent, amount spent and frequency of visit).*

H₀₄: *Shopping behaviour (time spent, amount spent and frequency of visit) no influence on mall patronage behaviour.*

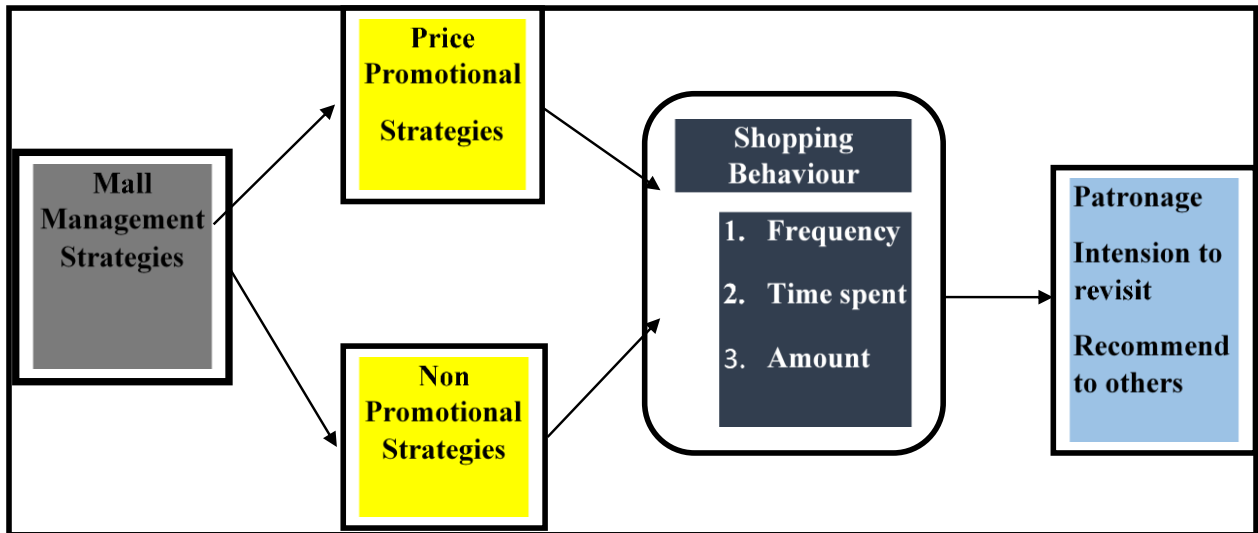


Fig:1

Conceptual framework

Research Design : A research design lays the foundation for conducting the research. It is a frame work or blue print for conducting the marketing research. It is the arrangement of conditions for collection and analysis of data in a manner that aims to combine relevance to the research purpose with economy in procedure. The present study adopts a Descriptive Research Design to study the shopper and mall related variables/constructs and their impact on shopping behaviour and mall patronage behaviour. Descriptive Research is a type of conclusive research that has as its major objectives the description of something. Descriptive research assumes that the researcher has much prior knowledge about the problem. This research is pre-planned and structured and it typically based on large repetitive sample **Malhotra, (2008)**.

Target Population : The present study tries to map the mall patronage behaviour of shoppers in Delhi and NCR. Further an attempt was made to ascertain the impact of the shopper related variables (demographic) and mall related variables (mall management strategies) on shopping behaviour and mall patronage. Delhi and NCR malls are selected to analyses the patronage behaviour of mall shoppers. The logic behind selecting Delhi and NCR malls for primary data collection

can be justified by the argument that due to high migration rate from different states of the country to the Delhi & NCR makes it almost representative of the entire country. There were very few studies in the field of shopping mall which focused on country analysis. Thus the population of interest (universe) included all the people frequenting or visiting different malls in Delhi and NCR. For this purpose, the list of all the malls was generated. The total number of malls in Delhi, NCR came out to be 63 as per the study on research on Indian malls (refer to. Appendix A). From the list, the three malls having the maximum footfall were chosen (refer to Appendix B).The three malls were Select City walk (Delhi), The Great India Palace (Noida) and Ambience Mall (Gurgaon).Along with these three another three malls were chosen one each from Delhi, Noida and Gurgaon respectively.

Sample Design : The total number of malls in Delhi, NCR came out to be 63 as per the study on research on Indian malls. From the list, the three malls having the maximum footfall were chosen. The three malls were Select City walk (Delhi), The Great India Palace (Noida) and Ambience Mall (Gurgaon). Along with these three another three malls were chosen one each from Delhi, Noida and Gurgaon respectively. Six Malls were approached for data collection two malls from Delhi, two from Gurgaon and two from

Noida and 200 hundred shoppers approached from each mall. Total 1200 shoppers approached for data collection from six shopping malls and 965 shoppers' returned filled questionnaire. At final stage of the 869 questionnaire were found useable for survey.

The Research instrument

1. Mall Management strategies : Mall management has long struggled to identify factors affecting mall patronage **Parsons, (2004 & 2003)** from the mall management point of view we were used three statement on ranking scale to understand the mall management strategies impact on shopping behaviour and patronage behaviour.

2. Demographic Information : Respondents' personal information was obtained from various items concerning demographic characteristics. Respondents were asked to check self-descriptive categories about gender, age, marital status, level of education, household income, occupation, No. of earning members and No. of kids.

3. Shopping behaviour : Respondents were asked how much time they spend in shopping mall (less than 1 hour, 1-3 hours, 3-5 hours and above 5 hours) Respondents were asked how much money they spend on per visit in shopping mall (1000-2000, 2001-3000, 3001-4000,4001-5000,5001-6000 and above 6000) and how frequently you visit shopping mall from last three months (up to 3 times, 4 to 8 times, 9 to 12times, and more than 12 times). How many stores they visit generally, to whom they visit mall and how

much amount they spent amount on food and non-food items.

4. Patronage Intentions towards a Mall : Patronage intentions towards the mall was measured by adopting items from the scale developed by **Dodd et al., (1991)**. The three-item re-patronage intention scale originating from **Oliver & Swan (1989)** on a five -point Likert-type scale ranging from strongly disagree (1) to strongly agree (5) includes statements such as "The likelihood that I would visit this shopping mall in the future" was used.

Result and Analysis : Demographic data were analysed using frequencies and percentages to develop a profile to describe participants in this study. All participants (n = 869) were survey at mall intercept survey. An equal distribution of responses was received from female and male participants with (n = 444) male (51.1%), and (n = 425) male (48.9 %). Participant ages ranged from less than 16 years to above 55 years. Based on the responses, it was found that 381, participants belonged to the age bracket of 16-25 yrs. (43.8%),180 were aged between 26-35yrs. (20.7%), 149 were of the age group of 36-45yrs. (17. 2%), 110 in age group of 46-55 yrs. (12.7%),46 respondents were age above 55 yrs. (5.3%) and only three were age falling in the age of less than 16 years (.3%) (45.3%) reported that they had two earning members in the family and (43.6%) had only one earning member in the family. Survey results revealed that (9%) respondents reported that there were three earning members in the family, while only (2.1%) respondents reported that they had four earning members in the family.

Analysis of Shopping Behaviour

Table 1: Shopping Behaviour

Shoppers behaviour in mall	Frequency	Percentage
Time spent in shopping mall		
Less than 1hrs.	117	13.4
1hrs. to 3hrs.	307	35.3
3hrs. to 5hrs.	266	30.6
More than 5hrs.	179	20.7
Amount spent per visit		

1000-2000	224	25.8
2000-3000	216	24.9
3000-4000	121	13.9
4000-5000	133	15.3
5000-6000	88	10.1
Above 6000	87	10.0
Frequency of visit from last three month		
Up to 3times	120	13.8
4 to 8 times	112	12.9
9 to 12 times	307	35.3
More than 12 times	330	38.0
When visit mall		
In weekends	574	66.2
In weekdays	126	14.5
In holidays	168	19.3
Visit mall with (company with)		
With friends	441	50.7
With family	397	45.6
Alone	31	3.7
Time taken to reach mall		
Less than 15 min.	161	18.6
15 to 30 min.	428	49.2
30 min to 45 min.	141	16.2
45 min. To 1hrs.	87	10.0
More than 1 hrs.	52	6.0
No. Of store visited		
Less than 5 stores	209	24.0
5 to 10 stores	561	64.6
11 to 15 stores	93	10.7
Above 15 stores	6	.7
Spent amount on food items		
Less than 500	257	29.6
500 to 1000	428	49.2
1000 to 1500	91	10.5
1500 to 2000	49	5.6
Above 2000	44	5.1
Spent amount on non food items		
Less than1000	98	11.3
1000 to 2000	319	36.7
2000 to 3000	214	24.6
3000 to 4000	141	16.2
4000 to 5000	50	5.8
Above 5000	47	5.4

Mall management strategies and shopping behavior : In the study, respondents were asked ranked the following mall management strategies or activities have

influence on their visit towards mall and amount spending behaviour. Rank given by respondent to mall management strategies

1	Price based activities	.215**	.000	.520**	.000	.075**	.171
2	Promotion based activities	.056	.307	.072	.188	.067	.176
3	Event based activities	.079	.148	-.316 *	.000	.242**	.000

Correlation significant at 0.01 levels (two tailed)

Note ** shows positive association, * shows negative association, P= indicate the significance level, R= indicate the direction of the relationship

The result showed there is a positive association between prices based strategies with amount spent ($r=.520, P<.01$), time spent ($r=.215, P<.01$). Promotional based strategies showed insignificant relationship with the all shopping behaviour. Both event and promotional based strategies had negative association with amount spending behaviour. Event based strategies or activities

had positive association with frequency of visit ($r= .242, P<.01$) while with time spent and amount spending behaviour there was a negative relationship exposed.

In summary, Mall management strategies found have influence on shopping behaviours. Therefore, **Hypothesis was rejected (H_{01})** for mall management strategies have no influence on frequency of visit, time spent and amount spent on per visit.

Mall management Strategies and Mall Patronage Behaviour

Table 5: Correlation with mall management strategies and mall patronage behaviour

Sr. No.	Mall management strategies	Intention to revisit the mall		Buy in future from mall		Recommend to the friends	
		Pearson Correlation	Sig.	Pearson correlation	Sig.	Pearson correlation	Sig.
1.	Price based activities	.275**	.000	.350**	.000	.339**	.000
2.	Promotional based activities	-.046*	.177	-.071*	.037	-.802*	.015
3.	Event based activities	-.284*	.000	-.343*	.002	-.332*	.000

Correlation significance at 0.01 levels (two tailed)

Note ** shows positive association, * shows negative association, P= indicate the significance level, R= indicate the direction of the relationship

Hypothesis2 stated that mall management strategies have no influence on mall patronage behaviour. To access this hypothesis correlation was computed to find out the association between mall management strategies and mall patronage behaviour. The above correlation table

showed that only price based activities showed ($r= .275, .350, .339, P<.01$) influence on mall patronage behaviour. (See table 4.29) Shoppers who influenced by price based activities interested to visit the shopping mall again, buy from the shopping mall and recommend the shopping mall to family and friends. On the other hand, event based and promotional based activities not exposed any connection or significant relationship with mall patronage behaviour.

In summary, Mall management strategies were found have influence on mall patronage behaviour. Therefore, Hypothesis (H₀₂) is rejected for mall management strategies have no influence on mall patronage behaviour in terms of intention to visit, buy from the mall in near future and recommend the shopping mall to family and friends.

Shopping behaviour Variables relationship

: Study hypothesis (H₀₃) stated that there is no

association between shopping behaviour (time spent, amount spent and frequency of visit). This hypothesis tried to find out the interrelationship between times spent, amount spent and frequency of visit is ascertained. To access the inter relationship between shopping behaviour variables correlation is computed.

Table 6: Correlation matrix mean and standard deviation

	Time spent	Amount spent	Frequency of visit
Time spent	1.00		
Amount spent	-.410*	1.00	
Frequency of visit	.519**	-.525*	1.00
Min	1.00	1.00	1.00
Max	4.00	600	1.00
Mean	2.80	2.89	5.00
S.D	.91	1.65	2.97
			1.03

Correlation significant at 0.01 levels (two tailed)

Note ** shows positive association, * shows negative association, P= indicate the significance level, R= indicate the direction of the relationship

The above table showed correlation matrix and descriptive statistics the shopping behaviour variables. The variables mean is less than 3 ($M= 2.97$) and standard deviation for these variables range from .91 to 1.65, indicating a substantial amount of variance exit in the responses. There is significant inter correlation exit between shopping behaviour variables. Strong and positive relationship

($r= .519, P<0.01$) exit between time spent and frequency of visit, point out that shoppers who frequently visit shopping mall spent more time in shopping mall and vice versa. On the other hand, amount spent behaviour showed strong but negative relationship with the time spent ($r= -.410, P<0.01$) and frequency of visit ($r= -.525, P<0.01$) point out that shoppers who are spender in shopping mall are less frequenter and less time spender. Therefore, study rejected the hypothesis(H₀₃) result shows there is association exist between situational factors and shopping behaviour.

Table 7: Correlation with shopping behaviour and mall patronage behaviour

Sr. No.	Shopping Behaviour	Intention to revisit the mall		Buy in future from the mall		Recommend the mall to friends	
		Pearson Correlation	Sig.	Pearson correlation	Sig.	Pearson correlation	Sig.
1.	Time spent	.278**	.000	.218**	.000	.236**	.000
2.	Amount spent	-.046*	.177	-.045*	.037	-.038	.015
3.	Frequency of visit	.445**	.000	.245**	.002	.487**	.000

Correlation significance at 0.01 levels (two tailed)

Note ** shows positive association, * shows negative association, P= indicate the significance level, R= indicate the direction of the relationship

A positive association found between time spent and frequency of visit with all patronage behaviour intention to revisit ($r = .278, .445, P < 0.01$) buy from the mall in near future ($r = .218, .245, P < 0.01$) and recommend the mall to family and friends ($r = .236, .487, P < 0.01$). While amount spending shopping behaviour showed insignificant relationship with all mall patronage behaviour. The relationship between Amount spent & patronage intentions was not statistically significant. Therefore, hypothesis (H_{04}) stated that shopping behaviour has no impact mall patronage behaviour rejected.

Discussion & conclusion

Mall management adopted different type of strategies to differentiate retailers from their competitors **Sit et al., (2003)** and create better shopping experience **Parson, (2003)** for their shoppers. Previous researches exposed shoppers visit shopping mall either for hedonic purpose or utilitarian purpose **Wake field & Baker, (1998)** and mall management exploit both types of events to satisfy the shoppers hedonic as well as their utilitarian motives. This study tries to discover that how mall management strategies influence shopping behaviour (time, amount spent and frequency) and mall patronage behaviour (intention to revisit, buy from the mall in near future and recommend the mall to family and friends). Result of the study showed that price based strategies or activities implemented by mall management had huge control on shopping behaviour in terms of time spent and amount spent. Study results are consistence with the previous researches **Parson, (2003)** which explains that price based activities like sale, discount and gift with purchase scored high on spending behaviour. These price based activities offered shoppers not only value for money **Schindler, (1989)** but also enjoyment in buying which further influence their time spent behaviour **Nicholls et al., (2000); Parson, (2003)**.

Study results also showed that Non price based promotional activities like product display had no influence on time spent, amount spent and frequency of visit. Study result is inconsistency with the previous study **Parson, (2003)** which explored that non price based promotional activities had impact on visit. While event based activities like festival décor, live performances and art and food exhibition had shown significant relationship with frequency of visit while this entertainment based activities had shown insignificant relationship with time and amount spending behaviour.

Result showed that out of three mall management strategies only price based strategy had impact on mall patronage behaviour. Mall management marketing department operate these promotional activities like product display and product launch to utilize the unfilled space of the shopping mall and these activities are main sources to mall management to generate the revenue. Entertainment based activities are mainly used by mall management to promote the shopping mall, to make people aware of shopping mall and to increase the footfall in shopping mall **LeHew & Fairhurst, (2000)**.

On the basis of the results, study concludes that mall managers should adopt proper marketing strategies. Price based strategies had more impact on spending as well as time spent behaviour. Appropriate mall management strategies help to build the image of the shopping mall which further influences the shopper's positive attitude towards shopping mall and their loyalty towards shopping mall **Chebat et al., (2010)**. So, malls managers should employ more attractive price based strategies with entertainment aspect which help to satisfy both hedonic and utilitarian motives. Mall management should coordinate with the stores in the shopping mall to conduct periodic price based and promotional activities to generate sale **Chebat et al., (2010)**. Along with price based activities, mall management should promote non price promotional activities and entertainment

based activities because these are main revenue sources for the mall management. Mall management should promote and advertise these activities properly and combine these activities with price based activities in order to approach related customer which in turn, will help mall management to generate revenue for retailers.

In the current study, statistical results showed strong inter linkage between frequency of visit and time spent behaviour in shopping mall. It means frequent visitors spend more time in shopping mall, while there was insignificant relationship between amount spending behaviour and frequency of visit and time spent behaviour. Study results are consistence with the previous research by **Zhuang et al., (2006)** which revealed that frequent shoppers and who spent more time spent more amounts on food items rather than non-food items in shopping mall.

In context of shopping behaviour impact on mall patronage behaviour, study results showed that time spent behaviour and frequency of visit had significant relationship with all mall patronage behaviour. It means shoppers who spent more time in shopping mall and frequent visitors to shopping mall showed positive attitude towards intention to revisit the shopping mall, buy from mall in near future and recommend the shopping mall to his friends and family members. There was a negative and insignificant relationship found between amount spending behaviour and mall patronage behaviour.

References

1. Alexander, A. A., & Muhlebach, R.F. (1992). Shopping centre management. *Institute of Real Estate Management*, Chicago, IL.
2. Babin, B.J., & Attaway, J.S. (2000). Atmospheric affect as a tool for creating value and gaining share of customer. *Journal of Business Research* 49 (2), 91-99.
3. Baker, J., Parasuraman, A., Grewal, D. & Voss, G.B. (2002). The influence of multiple store environment cues on perceived merchandise value and patronage intention. *Journal of Marketing*, 66(2), 120-41.
4. Baker, J., Parasuraman, A., Grewal, D. & Voss, G.B. (2002). The influence of multiple store environment cues on perceived merchandise value and patronage intention. *Journal of Marketing*, 66(2), 120-41.
5. Bloch, P.H., Ridgway, N.M., & Sherrel, D.L. (1989). Extending the concept of shopping: An investigation of browsing activity. *Journal of the Academy of Marketing science*, 17(1), 13-21.
6. Burns, D. (1992). Image transference and retail site selection. *International Journal of Retail & Distribution Management*, 20(5).
7. Chebat, J.C., Sirgy, M.J., & Grzeskowiak, S. (2010). How can shopping mall management best capture mall image? *Journal of Business Research*, 63, 735-740.
8. Christaller, W. (1935). Die Zentralenorte in sudlentac land. Jena, E Germany.
9. Christaller, W. (1966). Central Places in Southern Germany, Trans CW Baskin, Englewood Cliffs, Nj Prentice Hall.
10. Churchill, G.A. (1999) Marketing Research: Methodological foundation, 7th ed. Fort Worth, TX: dryden Press.
11. Close, A.G., Krishan, A.S., & Latour, M.S. (2009). The event is me. *Journal of Advertising Research*, 49(3), 271-284.
12. Craig, C.S., Ghosh, A., & Mclafferty, S. (1984). Models of retail location process: A Review. *Journal of retailing*, 60(1), 5-36.
13. Dodd, W. B., Monroe, K. B., & Grewal, D. (1991). Effects of price, brand, and store information on buyers' product evaluations. *Journal of Marketing Research*, 28(3), 307-319.

14. Dodd, W. B., Monroe, K. B., & Grewal, D. (1991). Effects of price, brand, and store
15. Finn, A., & Louviere, J. (1996). Shopping centre image, consideration, and choice: anchorstore Contribution. *Journal of Business Research*, 35(3), 241-251.
16. Folkes, V., & Wheat, R.D. (1995). Consumers price perception of promoted products. *Journal of Retailing*, 71(3), 317-328.
17. Haesun, Part (2004). US Retailer's Cooperation with Manufacturer Promotional Support. *Journal of Fashion Marketing and Management*, 8(4), 412-424.
18. information on buyers' product evaluations. *Journal of Marketing Research*, 28(3), 307-319.
19. Jones, M. A., Reynolds, K. E., & Arnold, M. J. (2006). Hedonic and utilitarian shopping value: Investigating differential effects on retail outcomes. *Journal of Business Research*, 59 (9) 974-981
20. Kenney, M.T. (2000). Quantifying business enterprise value in shopping malls: current issues and future trends. *Appraisal Journal*, 68(3), 307-318.
21. Kim, I., Christiansen, T., Feinberg, R., & Choi, H. (2004). Mall entertainment and shopping behaviour: a graphical modelling approach. *Advanced Consumer Research*, 32, 487-490.
22. Kirkup, M., & Rafiq, M. (1994). Managing tenant mix in new shopping centres. *International Journal of Retail & Distribution Management*, 22(6), 29-37.
23. LeHew, M.L.A., & Fairhurst, A.E. (2000). US shopping mall attributes: an exploratory investigation of their relationship to retail productivity, *International Journal of Retail & Physical Distribution*, 28(6), 261-279.
24. Malhotra, N.K. (2008). *Marketing research an applied orientation* (5th edition). Upper Saddle River, NJ: Prentice Hall.
25. Ndubisi, Oly, Nelson and Moi, Tung, Chiew (2005). Customers Behavioural Response to Sales Promotion: The Role of Fear of Losing Face. *Asia Pacific Journal of Marketing and Logistics*, 17 (1), 2-49.
26. Pan, Y., & Zinkhan, G. M. (2005). Determinants of retail patronage: A meta analytical perspective. *Journal of Retailing*, 82(3), 229-243.
27. Parsons, A., & Ballantine, P. W. (2004). Market dominance, promotions, and shopping mall group performance. *International Journal of Retail & Distribution Management*, 458-463.
28. Parsons, A.G. (2003). Accessing the effectiveness of shopping mall promotions: customer analysis. *International Journal of Retail and Distribution management*, 31(2), 74-79.
29. Raajpoot, N.A., Sharma, A., & Chebat, J.C. (2009). The role of gender and work status in shopping center patronage. *Journal of Business research*, 61(9), 825-833.
30. Roy, A. (1994). Correlates of mall visit frequency. *Journal of Retailing*, 70(2), 139-161.
31. Schindler, R.M. (1989). The excitement of getting a bargain: some hypotheses concerning the origins and effects of smart shopper feelings. *Advance in consumer research*, 16,447-453.
32. Shim, S., & Eastlick, M. A. (1998). The hierarchical influence of personal values on mall shopping attitude and behaviour. *Journal of Retailing*, 74(1), 139-160.
33. Sit, J., Merrilees, B., & Birch, D. (2003), Entertainment-seeking shopping centre patrons: the missing segments. *International Journal of Retail & Distribution Management*, 31(2), 80-94.
34. Smith, M.F. & Sinha, I. (2000). The impact of price and extra product promotion on store preference. *International Journal of Retail & Distribution Management*, 28(2), 83-92.
35. Stassen, R.E., Mittelstaedt, J., & Mittelstaedt, R.A. (1999). Assortment

- overlap: its effect on shopping patterns in a retail market when distributions of prices and goods are known. *Journal of Retailing*, 75(3), 371-386.
36. Talpade, S., & Haynes, J. (1997). Consumer shopping behaviour in malls with large scale entertainment centres. *Mid Atlantic Journal of Business*, 33(2), 153-163.
37. Tauber, E.M. (1972). Why do people shop? *Journal of Marketing*, 36, 46-49.
38. Vahie, A., & Paswan, A. (2006). Private label brand image: its relationship with store image and national brand. *International Journal of Retail and Distribution Management*, 34 (1),67-84.
39. Wakefield, K. & Baker, J. (1998). Excitement at the mall: determinants and effects on shopping response. *Journal of Retailing*, 74(4), 515-539.
40. Zhuang, G., Tsang, A., Zhou, N., Li, F., & Nicholls, J.A.F. (2006). Impacts of situational factors on buying decisions in shopping malls: An empirical study with multinational data. *European Journal of Marketing*, 40(1/2), 17 - 43.



Available at
Datta Meghe Institute of Management Studies
www.dmims.edu.in/research-journal



AN ANALYTICAL STUDY ON MARKETING STRATEGY OF PATANJALI WITH SPECIAL REFERENCE TO BISCUITS PRODUCTS- NAVI MUMBAI AREA

Shaikh Umar Ali Zakir Hussain, Anuj Harikant Tiwari, Anmol Ravi Das, Dr. Geeta Kohade

Abstract : *In India, Ayurveda and ayurvedic products are the tradition holistic medical system after centuries of experiment, studies and meditation natural scientist and early physic system develop this system history of Ayurveda can be discovered may back through the growth of civilization. The segment of Indian consumer can isolated broadly is to urban and rural market and also consumer of Indian market can be attracted by many marketers from across the world. This study is focused on, "analytical study on marketing strategy of patanjali products with special reference to biscuits in Kalamboli area". The objectives & hypothesis is fulfilled through questionnaire and proved that 'consumers has positive attitude towards patanjali products. The present study is descriptive in nature and the survey has been done on 96 consumers through structured questionnaire. The collected data were analysed by using Ms.Off and presented our data or information through graphical presentation. This study will help us to know the marketing strategy adopted by Patanjali to improve the sales of Biscuits product and the satisfaction level of consumers*

Key Words: Marketing strategy, Customer satisfaction, Pricing strategy

INTRODUCTION : Patanjali Ayurved Limited is an Indian FMCG company. Manufacturing units and headquarters are located in the industrial area of Haridwar while the registered office is located at Delhi. The company manufactures mineral and herbal products. It also has manufacturing units in Nepal under the trademark Nepal Gramudhyog and imports majority of herbs. It is valued at 30 billion(US\$470 million) and some predict revenues of ₹5,000 crore (US\$780 million) for the fiscal 2015-16.^[1]

Introduction OF FMCG Companies : Fast-moving consumer goods (FMCG) or consumer packaged goods (CPG) are products that are sold quickly and at relatively low cost. Examples include non-durable goods such as packaged foods, beverages, toiletries, over-the-counter drugs and many other consumables.^[2]

Definition of Marketing Strategy : An organization's strategy that combines all of its marketing goals into one comprehensive plan. A good marketing strategy should be drawn from market research and focus on the right product mix in order to achieve the

maximum profit potential and sustain the business.^[3]

REVIEW OF LITERATURE:

DR. Anuja Agarwal 2017 Conducted a study to know about patanjali products on FMCG business. Hitherto dominated by multinationals like HUL, NESTLE, P&G Products ETC. The data collected in the study by using Non Probability Convincing Sampling Procedure this survey has done through questionnaire on the basis of the study they concluded that patanjali products captured a number of consumers also they found that from 2008 to 2012 there is huge increment in number of products which is from 26 to 120. They also suggested about limitations of patanjali products that delivery system should be improved by patanjali company.^[4]

Dr. Girish Taneja, Rajan Girdhar, Neeraj Gupta, "Marketing Strategies Of Global Brands In Indian Markets" This research is an attempt to investigate why some international brands, that are successful globally, fail to attract significant market share in India. The marketing strategies of these Global brands have been critically analyzed to present the view of how they encountered with initial failures and were able to overcome the enormous amount of challenges due to diverse nature of the Indian markets.^[5]

OBJECTIVES:

1. To study about the advertising strategy of patanjali products
2. To study the customer satisfaction towards marketing strategy
3. To know the sales promotion strategy of Patanjali.
4. To know the satisfaction of customers towards Pricing of Patanjali Biscuits.

HYPOTHESIS:

H0: Consumer's attitude and herbal ingredients in a product are independent to each other.

H1: Consumer's attitude and herbal ingredients in a product are dependent to each other.

RESEARCH METHODOLOGY:

The study is Descriptive type. The research paper is based on the primary & secondary data. The primary data is collected through the structured questionnaire from 96 consumers of patanjali product within Navi Mumbai. The questionnaire was designed to fulfill the objective and hypothesis of study.

1. **Universe of study :** The universe of study shall be Navi Mumbai City only.
2. **The sample design**
 - The study is focused on Consumers in Navi Mumbai City.
 - The total population in Mumbai City: 22,046,000 (2018)

The sample frame for collecting primary data shall be as follows :

S.N.	Selected Category	No. of Respondent
2.	Customers	100
	TOTAL	100

3. Data collection

Primary data:

Respondents of all categories has been selected at random for collecting primary data by way of structured questionnaires & interview. Selected consumers are the representative of various areas in Navi Mumbai city and all respondents are the representative of different income, age, occupation, standards of living etc.

Secondary data:

Secondary data has been collected from books, magazines, websites, newspaper, television, journal.

4. Data processing

The data collected from the primary and the secondary sources and has been processed

and tabulated according to the objectives of study.

5. Data analysis

The processed data has been analyzed on the basis of the objective and hypothesis by applying various statistical tools.

DATA COLLECTION

1. Which Biscuit do you like the most?

Sr. no	Particulars	No of respondents	% of respondents
1	Patanjali	33	34.37
2	Parle g	12	12.5
3	Britania	27	28.125
4	Sun feast	6	6.25
5	Oreo	18	18.75
Total		96	100

Table 1.1 Choice of customers towards Biscuits

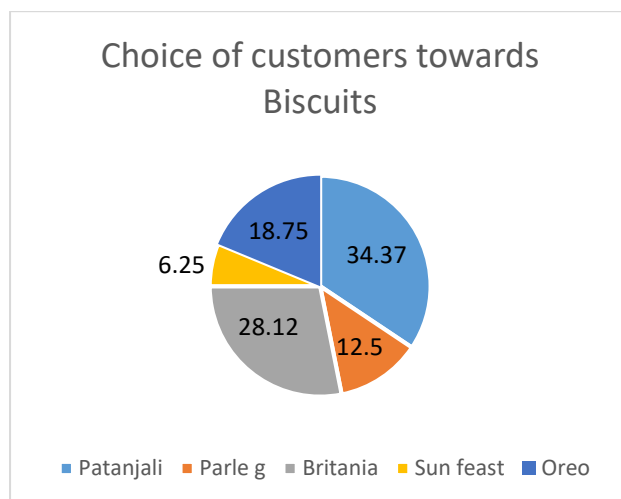


Figure 1.1 Choice of customers towards Biscuits

Interpretation:

It has been proved from the above pie chart that maximum customers like Patanjali products

2. Do you use patanjali biscuit?

Sr. no	Particulars	No of respondents	% of respondents
1	People who use patanjali biscuit	76	79
2	People who did not use patanjali biscuit	20	21
Total		96	100

Table 1.2 Use of patanjali biscuit

patanjali biscuit

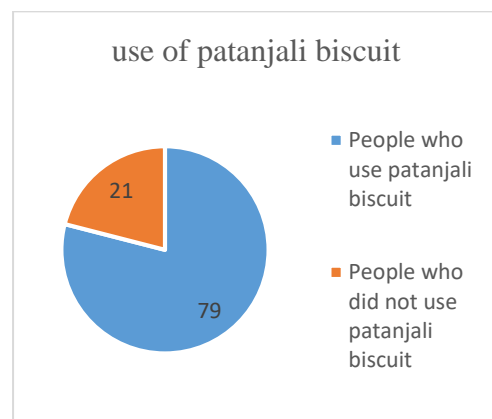


Figure 1.2 Use of patanjali biscuit

Interpretation:

It has been proved from the above pie chart that maximum (79%)customers use patanjali biscuits.

3. Which patanjali biscuit do you like the most?

Sr. no	Particulars	No of respondents	% of respondents
1	Jeeera bites	18	18.75
2	Cream feast	18	18.75
3	nariyal	18	18.75
4	Digestive	21	21.87
5	Arogya	21	21.87

Tot al		96	100
--------	--	----	-----

Table 1.3 Market of Patanjali biscuits

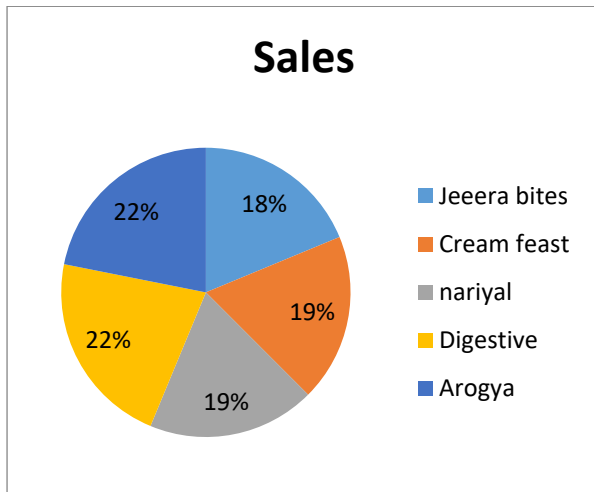


Figure 1.3 Market of Patanjali biscuits

Interpretation:

It has been proved from the above pie chart that maximum customers like Digestive and Arogya biscuits of Patanjali brand

4. Which marketing strategy of patanjali do you like the most?

Sr. no	Particulars	No of responde nts	% of rerspond ents
1	Advertiese ment through celebrity endorceme nt	21	21.9
2	Sales Promotion	30	31.25
3	pricing	12	12.5
4	Focused on herbal activities	33	34.37
Tot al		96	100

Table 1.4 Marketing strategy of patanjali Products

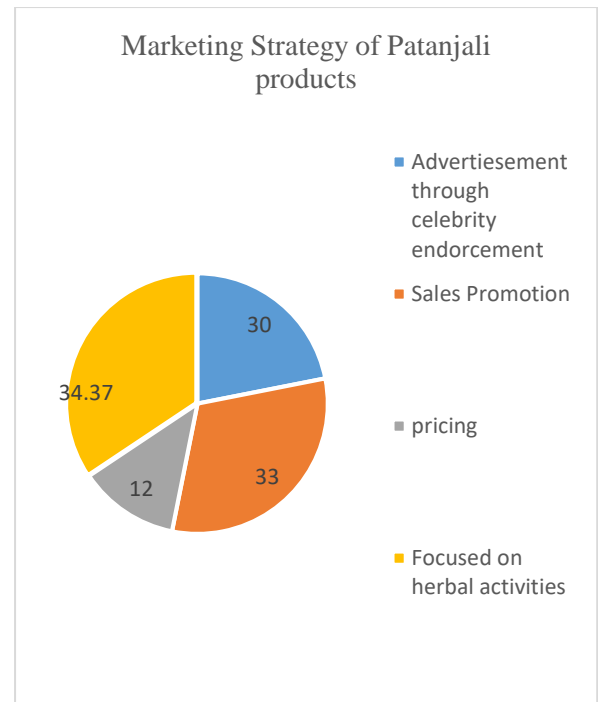


Figure 1.4 Marketing strategy of patanjali Products

Interpretation:

It has been proved from the above pie chart that maximum consumers are satisfied with the marketing strategy of patanjali such as giving focus on herbal actives and sales promotion activities.

5. Are you satisfied with the pricing strategy of patanjali products?

Sr. no	Particula rs	No of responden ts	% of rersponde nts
1	No of people who said yes	59	61.46
2	No of people who said no	18	18.75
3	No of people who says can't say	19	20
Tot al		96	100

Table 1.5 pricing strategy of patanjali products

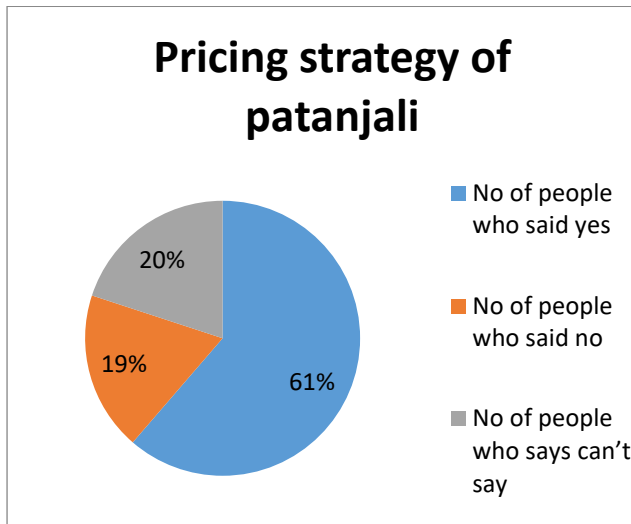


Figure 1.5 pricing strategy of patanjali products

Interpretation:

It has been proved from the above pie chart that maximum (62%) customers satisfied with the pricing strategy of patanjali products.

6. Which medium of advertisement do you like the most?

Sr. no	Particulars	No of respondents	% of respondents
1	Television	60	57.14
2	Newspaper	15	15.62
3	Internet	18	18.75
4	Radio	0	0.00
5	magazines	3	3.125
Total		96	100

Table 1.6 medium of advertisement

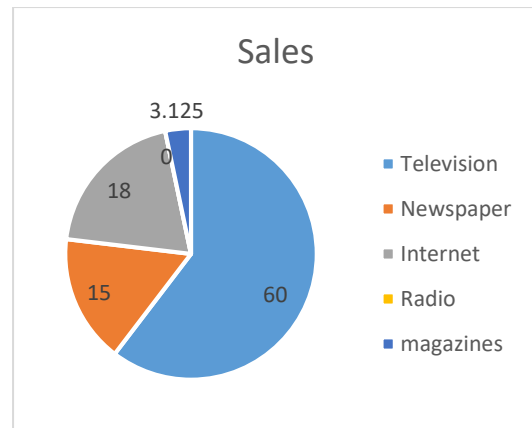


figure 1.6 medium of advertisement

Interpretation:

It has been proved from the above pie chart that maximum (60%) consumers use Television medium of advertisement.

7. Which factor of patanjali biscuit do you like the most?

Sr. no	Particulars	No of respondents	% of respondents
1	Celebrity endorsement	3	3.12
2	Good quality	21	21.87
3	Easily digestable	9	9.37
4	Provides nutritious elements	15	15.62
5	Natural ingredient	48	50.00
Total		96	100

Table 1.7 Factor of patanjali biscuit

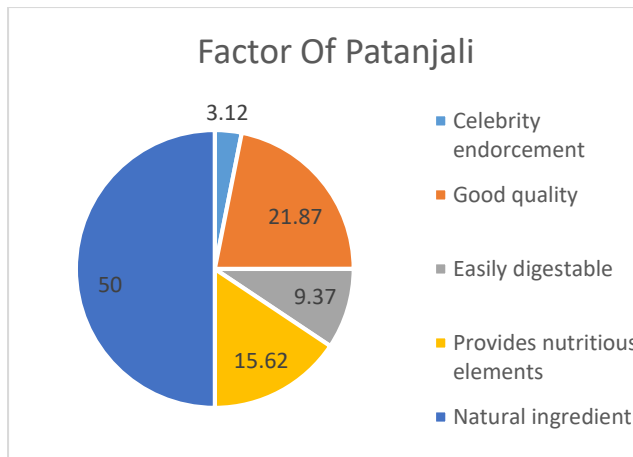


Figure 1.7 Factor of patanjali biscuit

Interpretation:

It has been proved from the above pie chart that maximum (50%) consumer's reason to use Patanjali products is Good quality.

8. Are you satisfied with the sales promotion strategy of patanjali products?

Sr. no	Particulars	No of respondents	% of respondents
1	No of people who said yes	39	40.62
2	No of people who said no	27	28.12
3	No of people who said can't say	30	31.25
Total		96	100

Table 1.8 sales promotion strategy of patanjali products

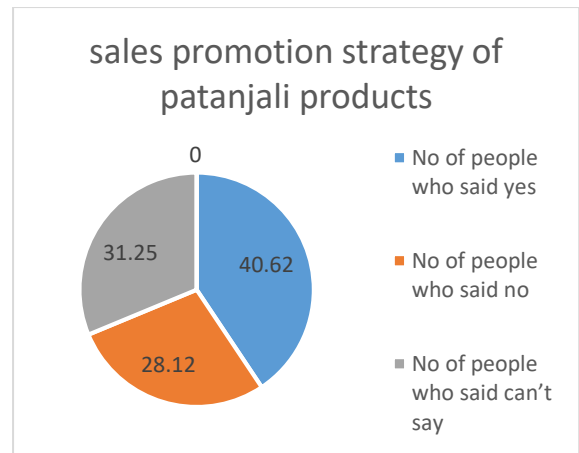


Figure 1.8 sales promotion strategy of patanjali products

Interpretation:

It has been proved from the above pie chart that maximum (41%) consumer's satisfied with the sales promotion strategy of patanjali products.

9. What is your opinion about the statement " There are no harmful chemicals in patanjali products?"

Sr. no	Particulars	No of respondents	% of respondents
1	Strongly Agree	21	21.87
2	Agree	33	34.37
3	Neutral	24	25.00
4	Disagree	12	12.5
5	Strongly disagree	6	6.25
Total		96	100

Table 1.9 Opinon of customers

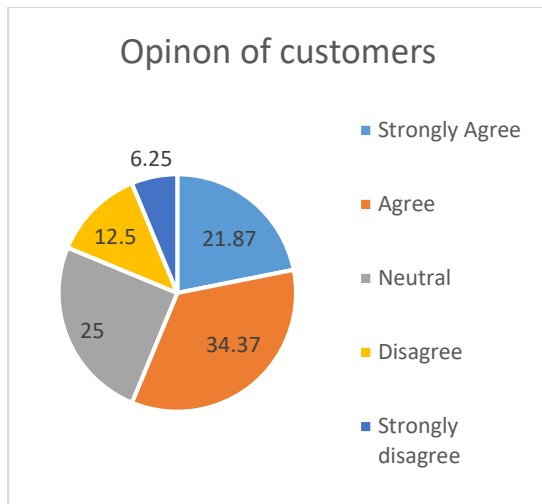


Figure 1.9 Opinion of customers

Interpretation:

It has been proved from the above pie chart that maximum (35%) consumers are agreed with the statement " There are no harmful chemicals in patanjali products and some customers are strongly agreed.

Data Collection from Annexure -I (Customers/Consumers Questionnaires) and data analysis done through Tables and Pie Chart which are mentioned at the end of paper.

FINDINGS:

1. It has been found that maximum customers like Patanjali products.
2. Maximum (79%) customers use patanjali biscuits.
3. Maximum customers like Digestive and Arogya biscuits of Patanjali brand
4. Consumers are satisfied with the marketing strategy of patanjali such as giving focus on herbal actives and sales promotion activities.
5. Most of the Customers satisfied with the pricing strategy of patanjali products.
6. Television medium is used by maximum customer for getting awareness through advertisement.
7. The reason to use Patanjali products is Good quality.

8. Maximum (41%) consumer's satisfied with the sales promotion strategy of patanjali products.
9. Consumers are agreed with the statement " There are no harmful chemicals in patanjali products and some customers are strongly agreed.

SUGESSTIONS:

1. Patanjali should improve marketing strategy of jeera biscuit to improve their sales .
2. Patanjali should work on the pricing strategy of the product so that it helps in increasing the sales of the product.
3. Patanjali should focus on such a product that it can be easily digestible.
4. Patanjali should improve the advertising strategy through radio and magazine.

LIMITATIONS:

- Sample size is small because of the time constraint.
- Respondent may provide data from their memory recall, there may only be rough estimates.
- Survey is limited Navi Mumbai City only.
- Survey is limited to consumers only.

CONCLUSION:

It has been concluded that that there are different marketing strategy such as sales promotion used by patanjali to increase sales volume to the satisfied customers. The objective of the study is to know about preference of the medium for advertising customer satisfaction toward marketing strategy, sales promotion strategy and pricing strategy of patanjali biscuit. Through structured questionnaire. The sample taken for study is 96 customer and through structured questionnaire primary data has been collected and it has been found that television advertising is most preferred

medium and maximum customer are satisfied toward marketing strategy .

Research Journal ,Vol.- III,Issue-3(3),July2012

REFERENCES:

1. https://en.wikipedia.org/wiki/Patanjali_Ayurved
2. https://en.wikipedia.org/wiki/Fast-moving_consumer_goods
3. <http://www.businessdictionary.com/definition/marketing-strategy.html>
4. Dr. Anuja Agarwal ,International Journal of Informative & Futuristic Research ISSN: 2347-1697 ,Volume 4 Issue 5 January 2017
5. Dr. Girish Taneja, Rajan Girdhar, Neeraj Gupta, International Refereed

Books:

- Kothari C.R. (2008) 'Research Methodology' 2nd Edition Himalaya Publication.
- Kotler Philip(2008) 'Principle of Marketing Management' 12th Edition Prentice-Hall of India.
- Beri G.C. (2008) 'Marketing Research' 4th Edition Tata Mc-Graw Hill company.
- A.J. Lamba, the Art of Retailing, Tata McGraw Hill education, New Delhi.



Available at
Datta Meghe Institute of Management Studies
www.dmims.edu.in/research-journal



IMPACT OF BANK CHOICE BEHAVIOR ON BRAND LOYALTY- AN EMPIRICAL STUDY

Dr Neha, Assistant Professor, United College of Education, Greater Noida, U.P

Abstract : *Purpose- The intense competition in the financial services is a big challenge for the banking industry. This requires banks to be more focused on the customer's needs and requirements. Customers are endowed with diversified choices which result in unlimited switching choices (Chigambha, 2011). The objective of the present study is to identify the various factors that affect the customer choice of banks in Punjab and examine the impact of these factors on brand loyalty*

Key Words: *Banking industry, Customer choices, Factors*

Introduction

Intense competition and globalization in the financial markets arise the need to develop customer oriented strategies in order to compete successfully in the competitive retail banking environment (Clames et al., 2010). There is a new era of risk and opportunities which makes the customers more demanding (Saiz & Pilorge, 2010). Customer's perceptions are changing at a rapid rate and banks face both a threat of losing customers' trust and opportunity to gain market share. The banking business in its entirety is based on trust and confidence of the customers. Once it is broken, it can't be repaired. So the banks need to maintain the trust of the customers in order to protect their brand image. Today, majority of customers are holding accounts in more than one bank, which means customers are more likely to select a specific bank for a particular product. Customers demand specialized products and high service quality and these requirements need to be met in order to maintain the bank's

brand. A slip could lead to dissatisfied customers, negative press coverage and ultimately damaging the brand image. In order to protect their brand, banks need to evaluate the bank choice behavior of the customers. Customer's preferences, needs and requirements should be well known to the banks. Therefore, the study proposes and tests a model of bank choice behavior of customers and analyze the impact of bank choice on brand loyalty.

Traditionally, Indian banking industry has been dominated by government regulations, high cost of entry, physical distribution network (Reber, 1999). But today, banks have been confronted with increased competition due to deregulation and globalization. The international banking sector has entered the market as cross border regulations have been lifted. New technologies have boosted the competition in the banking industry. This deregulation and new technologies have created a highly competitive environment and customers are now more service

conscious. They demand specialized financial services and their behavior towards bank choice depends on a number of factors which influence their decision of selecting the bank.

Banks today are moving back to basics, shifting attention from complex product offerings to developing the greater connect and intimacy with the customers (Gopinath et al., 2012). Customers perceive little differentiation between financial providers (Beckett et al., 2000). As banks try to cope with evolving customer demands, differentiation strategy is a good starting point. Banks are more concentrated on developing customer retention strategies to compete aggressively in a more competitive banking environment. But customers are now more interested in specific products of a particular bank so banks should take the opportunity to reexamine the products and services to truly differentiate themselves from the competition. In order to survive in the competitive environment, banks should focus on their bank brand because branding leads to the differentiation which ultimately influence the customer decision of brand choice. Therefore the current study aims to investigate the determinants of bank choice behavior of customers and its impact on their brand loyalty.

Literature review

Beckett et al. (2000) developed a model of consumer behavior in the financial services industry. Data was collected with the help of focus groups. The study was conducted in U.K. In total 21 people took part in the research. The data were analyzed using a keyword approach which included identifying specific words, themes or issues which commonly occurred within and across the discussion groups. The results of the research provided that Convenience, Influence of family and friends and Image/ Reputation of the bank were considered as the most significant factors that influence consumer behavior towards the selection of banks.

Clemes et al. (2007) examined the factors that contribute to bank switching in New Zealand. Data was collected through a mail survey sent to 1960 households in Christchurch, New Zealand. Logistic regression was used for statistical analysis. The results confirmed that customer commitment, service quality, reputation, customer satisfaction, young age and low educational level were the most likely factors that contribute to customers' switching banks.

Kamakodi et al. (2008) analyzed the factors that influence the bank selection decisions. Data was collected with the help of structured questionnaire and the Responses were received from 292 respondents. Weighted Average scores were calculated. The findings revealed that availability of ATMs finds a top priority in customer bank selection. The top 10 factors of importance, influencing the respondents to choose the bank are Safety of funds, Secured ATMs, ATMs availability, Reputation of the bank, personal attention, pleasing manners of the staff, confidentiality, and closeness to work timely service and friendly staff willing to work.

Khan et al. (2008) investigated the banking behavior of Islamic bank customers in Bangladesh. Data was collected with the help of a structured questionnaire. A sample of 100 customers from 5 Islamic banks in Dhaka city of Bangladesh was taken for the study. The statistical techniques used for the analysis were Chi square tests and T test. The result exhibited the various factors that influence the banking behavior of customers. These are: Religious principles, convenient location, family and friends and rate of return. Out of which 'religious principles' demonstrated an above average mean, suggesting that Islamic bank customers still prefer an Islamic model of banking mostly because the banks follow Islamic principles.

Alina (2010) investigated the impact of individual characteristics as well as bank characteristics on bank choice. The study utilizes data from Gfk Survey of Ukraine in 2005-2006. The results indicated that the choice of a service depends mostly on such

social-demographic variables as age, income and education level and place of living. Bank characteristics, i.e. reliability, proximity to home and workplace, honesty, quick growing were the significant factors affecting the choice of services.

Goiteom W.(2011) examined the significance of bank selection criteria and to investigate how customers rank the factors based on their importance level to patronize banks and banking services. Data was collected with the help of a self administered questionnaire. A sample of 201 customers were selected from Addis Ababa City Factor analysis has been applied in order to reduce the number of total variables into manageable way The Findings revealed that the most two important bank selection criteria for customers are "convenience" and "service provision" for the entire customers while it is "bank's image" as the second most important factor for male customers. On the other hand, the least two important factors of bank selection for customers are "financial benefits/technology", "reputation" and "promotion strategy" whereas "attractiveness" for female customers.

Davidson (2011) investigated the factors that are considered important to customers while choosing a bank. Data was collected with the help of a structured questionnaire. A sample of 188 respondents was taken from Makola area, Ghana. Convenience sampling was used. Descriptives, Rankings and Cluster Analysis were used for statistical analysis. The findings revealed that Closeness of bank branch to the workplace or residence, friendliness of the personnel and ATM were chosen as the most important factors in choice decisions. Advertising and transactional cost having the least influence on people who place high value on time. Similarly, it was revealed that customers show high preference for some banks as against others based on banks unique characteristics.

Chigamba et al.(2011) investigated the determinants of the choice of commercial banks by students of the University of Fort Hare (Alice campus). Data was collected

through self-administered questionnaire. Convenience sampling method was used. The statistical techniques used for the analysis were Factor analysis, descriptive statistics, T-test and ANOVA. The results showed that the six factors, i.e. service, proximity, attractiveness, recommendations, marketing and price come out to be the important determinants of the choice of commercial banks.

Tai et al. (2013) aimed to determine the factors that influence the choice of a bank by the students of John & Wales University, Brown University, and the University of Rhode Island (All Southern New England). Data was collected with the help of a self administered questionnaire. The sampling frame constituted of 89 respondents. Ranks on the basis of importance were calculated and T test was used for the analysis. The results showed that secure feelings, proximity of branch and ATM service and bank reputation were the top three factors which influence their selection decision. Gender differences were not statistically significant, except for proximity of branch and ATM service where females rated higher in importance than males.

Adnan et al..(2013) aimed to investigate the factors that influence bank choice behavior of Malaysian Muslims. Data was collected with the help of in-depth interviews and non participant observation. The sampling frame constituted of 15 customers of Islamic banks located in Terengganu. The study extracted various factors i.e., completeness of prayer, service quality, location and lower interest rate that affects the bank choice behavior of customers. Out of which "Completeness of prayer" factor was regarded as the most important factor. The findings revealed that Malaysian Muslims considered a religious factor as the most significant factor while choosing a bank.

Atta et al. (2013) aimed to identify the factors affecting customers' choice of retail banking in Ghana. Data was collected with the help of a structured questionnaire. The sampling frame constituted of 279 customers from 5 banks selected for the study. Chi square, frequencies and descriptive analysis were

used for statistical treatment. The findings revealed that the occupation and safety of deposits were the most important factors that influence the bank choice behavior of the customers.

Need of the study : Deregulation and the emergence of new forms of technology have created highly competitive market conditions which have had a critical impact upon consumer behavior (Beckett et al., 2000). Bank providers must, therefore, attempt to better understand their customers in an attempt not only to anticipate but also to influence and determine consumer choice behavior. In this paper, a model is presented and developed which attempts to articulate consumer behavior towards bank choice. Moreover, the review of literature reveals that very little work has been done on the relationship between bank choice behavior and brand loyalty. Given the lack of literature and knowledge on the subject, it is the modest attempt to examine how bank choice behavior of customers affects the brand loyalty of the bank.

On the behalf of literature gaps, the following objectives are proposed to be fulfilled through this research:

1. To identify the various factors that influences the choice of commercial banks in India.
2. To analyze the impact of bank choice factors on brand loyalty.

Data Base and Research Methodology

Method of Data collection

The study is based on the primary data derived from a structured questionnaire to be administered to the bank customers. The questionnaire has been prepared on the basis of the existing literature, Keller (1993), Debling (2000), Chernatony (2001), Loughlin (2004), Atiglan (2005), Hashim (2007), Gleerup (2009), Norzalita (2010), Solayappan (2010), Venkatesh (2011), Mishra (2011), Thiripurasundari (2011). The questionnaire aimed at deriving information with respect to determinants of customer based brand equity. Top 10 banks, 5 each in public and private sector were selected on the basis of the report provided by Brand Finance

Banking 500(2013). Brand finance is the world's leading brand valuation consultancy of London. The Brand Finance Banking 500 is published by Brand Finance plc and is the only study to rank the top 500 most valuable banks in the world. The five banks selected in each category are: State Bank of India, Punjab National Bank, Bank of Baroda, Bank of India and Canara Bank from public sector banks. Among private banks; ICICI, HDFC, Axis, Kotak Mahindra and Yes bank were selected on the basis of highest brand values reported in Brand Finance Banking 500, 2013.

Sampling Frame : The survey targeted customers of the main branch of the selected banks from Jalandhar using purposive sampling. Respondents were approached by visiting the banks. Questionnaires were administered face to face and some questionnaires were also mailed online to the customers. Overall 300 questionnaires were distributed, 267 were received, out of which 120 respondents were selected on the basis of the experience they had with the bank. 12 customers have been deliberately selected from each bank to maintain homogeneity in the sample. Those customers were selected who have 5 years or more experience with the bank.

Statistical Tools

- Exploratory factor analysis
- Logistic Regression.

Statistical Analysis

Factor analysis : Factor analysis was used to reduce the total number of items to a smaller number of underlying factors. Principal components analysis was used to extract factors (eigenvalues > 1). Varimax rotation was used to facilitate the interpretation of the factor matrix. The Bartlett's Test of Sphericity and the Kaiser-Meyer-Olkin measure of sampling adequacy were used to validate the use of factor analysis. Exploratory factor analyses were conducted on 26 variables and five factors were extracted, namely, brand investments (9 items), brand performance (5 items) brand salience (4 items), brand unfamiliarity (3 items), brand feelings (2 items) and the brand verdict (3 items). The convergent and discriminant validity of the constructs were tested by principal

components analysis. As reflected in Table 1, The KMO index was found 0.626, which indicates the presence of sufficient inter correlations in the data matrix and the appropriateness of factor analysis. Bartlett's test of Sphericity indicates strength of the

relationship among variables. The observed significance level is .000. This means that the strength of the relationship among variables is strong. Thus, Data is good fit for Factor Analysis.

Table 1 KMO and Bartlett's Test

Kaiser-Meyer-Olkin Measure of Sampling Adequacy.		.626
Bartlett's Test of Sphericity	Approx. Chi-Square	2.977E3
	Df	325
	Sig.	.000

The brand attributes constrained to 6 factors accounting for a total of 74.261 percent of the variance. Table 2 & 3 shows the results of

Total variance explained and rotated component matrix respectively.

Table 2 Total Variance explained

Table 2 represents the Total variance explained by extracted factors. The factors are extracted so that the cumulative percentage of variance extracted by factors reaches a satisfactory level. It is recommended that the

60% of the variance. In the study, 75% of variance in brand choice is explained by six factors extracted in the study. Factor 1 explained maximum amount of variance i.e. 20%. Whereas Factor 6 explained 8 %

Component	Initial Eigenvalues			Extraction Sums of Squared Loadings			Rotation Sums of Squared Loadings		
	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %
1	8.257	31.756	31.756	8.257	31.756	31.756	5.142	19.775	19.775
2	3.766	14.486	46.242	3.766	14.486	46.242	3.995	15.365	35.141
3	2.530	9.732	55.974	2.530	9.732	55.974	3.084	11.862	47.002
4	2.227	8.564	64.538	2.227	8.564	64.538	2.732	10.507	57.509
5	1.415	5.442	69.980	1.415	5.442	69.980	2.198	8.454	65.963
6	1.113	4.281	74.261	1.113	4.281	74.261	2.157	8.298	74.261
7	.945	3.634	77.895						
8	.826	3.175	81.070						
9	.738	2.838	83.908						
10	.603	2.320	86.228						
11	.561	2.158	88.385						
12	.527	2.027	90.412						
13	.420	1.615	92.027						
14	.389	1.496	93.523						
15	.310	1.193	94.716						
16	.242	.930	95.646						
17	.227	.873	96.519						
18	.205	.789	97.308						
19	.163	.629	97.937						
20	.154	.592	98.528						
21	.133	.510	99.039						
22	.092	.354	99.393						
23	.071	.272	99.665						
24	.041	.157	99.822						
25	.033	.126	99.947						
26	.014	.053	100.000						

Extraction Method: Principal Component Analysis.

factors extracted should account for at least

variance in brand selection

Table 3 represents the Rotated Component Matrix. The method used for rotation is

varimax. This is an orthogonal method of rotation that minimizes the number of

variables with high loadings on a factor, thereby enhancing the interpretability of the factors. As reflected in the table 3, 9 items are

loaded in factor 1, 5 items in F2, 4 Items in F3, 3 items in F4, 2 Items in F5 and 3 items in F6.

Table 3 Rotated Component Matrix						
	Component					
	1	2	3	4	5	6
1. Cordiality of staff	.863					
2. General service quality	.838					
3. Speed of depositing money	.727					
4. Spread of branch network	.723					
5. Service charges	.707					
6. Speed of withdrawals	.650					
7. Computerization in the bank	.619					
8. Interest on savings and loans	.617					
9. Sufficient number of personnel	.565					
10. Atmosphere of the bank		.838				
11. Grievance handling procedures		.757				
12. Proximity to your office / residence		.704				
13. Reputation of the bank		.629				
14. Layout of the bank		.513				
15. Bank's publications regarding services and performance			.773			
16. Banker customers meet			.770			
17. Bank's innovativeness in introducing new services			.752			
18. Advertisement and publicity			.642			
19. Marital status				.948		
20. Status of family				.753		
21. Age				.596		
22. Family bank					.801	
23. Relatives / friends working in the Branch					.753	
24. Level of income						.799
25. Products/services						-.604
26. Savings						.597
Extraction Method: Principal Component Analysis. Rotation Method: Varimax with Kaiser Normalization.						
a. Rotation converged in 8 iterations.						

The six major factors extracted from the rotated component matrix are as follows:

Factor 1 consisted of attributes namely cordiality of staff, general service quality, speed of depositing money, spread of branch network, service charges, speed of withdrawals, computerization, interest on savings and loans, sufficient number of

personnel. So it was named "timely service & friendliness of staff"

Factor 2 consisted of attributes namely atmosphere, grievance handling procedures, proximity, reputation and layout of the bank. This factor was named as "Brand Image".

Factor 3 deals with attributes namely Bank's publications, bank's innovative practices and

advertisement and publicity. So it was named “Brand Promotion”.

Factor 4 was named “social factors” because the attributes involved marital status, Status of the family and age of the customers.

Factor 5 was named “Family & Friends Recommendations” as it involves family bank and friends, relatives working in the branch.

Factor 6 involves level of income, products/ services and savings which named as “Economic factors”.

Logistic Regression

In the following section, we use logistic regression to further investigate the relationships between these variables. The logistic regression models the likelihood of occurrence of an event (e.g., the likelihood of a customer being brand loyal). In our case, it assumes the probability of a Customer being a brand loyalist is determined by a set of predictor variables. Our goal, however, is to investigate the impact of six specific factors (i.e. Timely service & friendliness of staff, Brand Image, Brand promotion, Social factors, Family/ Friends Recommendations and Economic factors) on Brand loyalty. The variable “Brand loyalty” is dependent variable and the factors extracted from Factor

analysis are considered as Independent variable. In logistic regression, the dependent variable should be categorical and independent variable may or may not be categorical. In the study, brand loyalty is computed by asking the respondents that “whether they consider themselves Brand loyal or not?” Code 1 is given to those who respond ‘Yes’ and 0 is given to those who respond ‘No’. Cox and Snell’s R-Square attempts to imitate multiple R-Square based on ‘likelihood’, but its maximum can be (and usually is) less than 1.0, making it difficult to interpret. Here it is indicating that 55.2% of the variation in the DV is explained by the logistic model. The Nagelkerke modification that does range from 0 to 1 is a more reliable measure of the relationship. Nagelkerke’s R2 will normally be higher than the Cox and Snell measure. In our study, Cox & Snell R square is reported as .066 whereas Nagelkerke R square is .088. The overall hit ratio, i.e. the number of cases correctly classified is 59.5 i.e. 60%. The following table (Table 4) has several important elements. The Wald statistic and associated probabilities provide an index of the significance of each predictor in the equation. The Wald statistic has a chi-square distribution

Table 4 Variables in the Equation

	B	S.E.	Wald	df	Sig.	Exp(B)
Step 1 ^a F1 Timely service & friendliness of staff	.039	.186	.043	1	.835	1.039
F2 Brand image	.062	.187	.109	1	.741	1.064
F3 Brand promotion	-.063	.182	.121	1	.728	.939
F4 Social factors	.356	.194	3.379	1	.066	1.428
F5 Family & Friends Recommendations	-.024	.197	.015	1	.903	.976
F6 Economic factors	-.419	.191	4.818	1	.028	.658
Constant	.313	.187	2.782	1	.095	1.367

a. Variable(s) entered on step 1: F1, F2, F3, F4, F5, F6.

As reflected in Table 4, Factor 4 i.e. Social factors is significant at the 10 % level of significance as p=.066 and factor 6 i.e.

Economic factors is significant at the 5 % level of significance as p=.028. The results depicted that there is positive influence of social

factors on brand loyalty, whereas economic factors have a negative influence on brand loyalty. Economic factors includes level of income of the customers, products and services availed by the customers and savings of the customers. The results are similar with the findings of Bertocchi (2009), Chaniotakis (2010) and Bose (2011) which asserted that level of income and products and services can be negatively influenced brand loyalty because the increment in the income motivates customers to take risk of switching the bank in order to avail best services. Moreover, Customers are more likely to bear switching costs with the increased income, whereas customers remain loyal to an organization as long as they feels that organization gives them better products and services as compared to others otherwise they are more willing to shift to another bank.

Conclusion

The research has examined the consumer behavior towards bank choice in order to assess the brand selection decisions. The factors extracted in the study are Timely service & friendliness of staff, Brand image, Brand promotion, Social factors, Family & Friends Recommendations & Economic factors. The findings of the study demonstrated that the consumers' choice of banks is greatly influenced by social factors as well as economic factors and this is in keeping with the research of Bertocchi (2009), Chaniotakis (2010) and Bose (2011). The study has enhanced the knowledge of how customers choose their banks and how it influences their brand loyalty. In the light of these findings, bank managers are able to assess the customer behavior towards bank selection and devise strategies for retaining the customers in the bank. In this respect, the current study has made a contribution to the existing knowledge and understanding of the important behavioral factors in the selection of the banks and its impact on brand loyalty.

References

- Atilgan, E., Safak, A., and Serkan, A. (2005) "Determinants of the brand equity. A verification approach in the beverage industry in Turkey",

Marketing Intelligence & Planning, Vol.23, pp 237-248.

- Dabone; Atta; Osei, B.A & Petershie,B.(2013).Factors Affecting Customers Choice Of Retail Banking In Ghana . International Journal of Research In Social Sciences.3(1).37-44.
- Alina, A. Individual And Bank Characteristics That Impact An Individual's Demand For Services.Master thesis submitted to Kyiv School of Economics
- Beckett A., Hewer P & Howcroft B.(2000).An exposition of consumer behavior in the financial services industry. International Journal of Bank Marketing .18(1). 15-26.
- Bose, S.;Rao,V.G.(2011). Perceived benefits of customer loyalty programs: validating the scale in the indian context. Management & Marketing Challenges for the Knowledge Society.6(4).543-560.
- Chernatony, L. Harris, F. and Dall'Olmo Riley, F. (2001) "Added value: its nature, roles and sustainability", European Journal ofMarketing (in press).
- Clemes , M.D; Gan, C & Zhang D. (2010) .Customer switching behavior in the Newzealand banking industry.Banks and Bank Systems2(4).50-65.
- Clemes , M.D; Gan, C & Zhang D. (2010) .Customer switching behavior in the Chinese retail banking industry. International Journal of Bank Marketing, 28 (7).519 - 546.
- Agyei, As; Davidson(2011). The factors that influence the choice of banks by customers – A case study of Makola community. Master Thesis submitted to the Institute of Distance Learning, Kwame Nkrumah University of Science and Technology
- Adnan, A ; Nasir, N.A &Yusof D. (2013) Bank Choice Behaviour among Malaysian Muslims: A Qualitative

- Approach International Research Journal of Social Sciences.3(2), 1-8.
- Debling F.(2000) "On-brand banking: An examination of the factors contributing to effective branding and brand development through direct marketing in the consumer financial services sector", *Journal of Financial Services Marketing*, Vol. 5, No.2, pp.150±173.
 - Keller, K.(1993), "Conceptualizing, measuring and managing customer based brand equity", *Journal of Marketing*, Vol.57, January, pp.1-22.
 - Khan,K.N;, Ahmed, B.(2008)An insight into factors influencing bank selection decisions of Indian customers. *Asia-Pacific Business Review*. 4(1).
 - O'Loughlin, D., Szmigin, I. and Turnbull, P.(2004) "Branding and Relationships: Customer and Supplier Perspectives", *Journal of Financial Services Marketing*, Vol. 8, No. 3, pp. 218-230.
 - Mishra P. & Datta B. (2011), "Configuring Customer-Based Brand Equity by Brand Association, Personality and Image", *The Research Journal of Social Science and Management*, Vol.1, No.5, pp 35-44.
 - Norzalita Abd A., & Norjaya Mohd Y. (2010) " Analyzing the brand equity and resonance of banking services:Malaysian consumer perspective",*International Journal of Marketing Studies*, Vol.2,No.2,pp.180-189.
 - Gleerup A.and Harborn M.(2009) "How do students choose their banks",Bachelor thesis, Kristianstad University.
 - Ioannis, E.C;Constantine, L; Magdalini, S. (2010). Consumers' intentions of buying own-label premium food products. *Journal of Product & Brand Management*.19(5).327 - 334
 - Thiripurasundari U. & Natarajan P. (2011), "Conceptual & Contextual Dimension of Brand Equity", *Zenith International Journal of Multidisciplinary Research* , Vol.1, No. 3, ISSN 2231 5780.
 - Venkatesh B (2011), "Effect of Branding on Marketing of Banking Services in India", P.hd. Thesis, K.J.Somaiya Institute of Management Studies & Research



Available at
Datta Meghe Institute of Management Studies
www.dmims.edu.in/research-journal



IMPACT OF BAN ON USING PLASTIC CARRY BAGS ON RETAIL STORES WITH SPECIAL REFERENCE TO NAVI MUMBAI CITY

Dr. Geeta Kohade, Prof. Rahul Gadewar

Abstract: *In the era of globalization, Customer's buying behaviour is very important to maintain the equilibrium position in economic condition. Customer's buying behaviour get changes as per the facilities provided by retailers and retailer's have to provides facilities to customers under some circumstances such as governmental rules and regulations. Hence the title of this paper is "Impact of Ban on Using Plastic Carry Bags on Retail Stores with Special Reference To Navi Mumbai City". The objectives of this study were to know problems and benefits get by retailers and customers due to decision taken by government regarding ban on using plastic bags, to know whether replacement of plastic bags are provided by retail store, to do comparative study on scenario between before Ban and After Ban of Plastic Bag. Primary data have been collected using the structured questionnaire with personal interviews with the customers at the stores and through personal observations. Secondary data was collected from various magazines, papers, Text books and related websites. Simple random sample has been taken as 100 retailers and 100 customers. It has been concluded that Customers' buying behaviour and facilities provided by retailer are associated with each other*

Key Words: *Customers buying behaviour, retailing, services*

INTRODUCTION:

A plastic bag, polybag, or pouch is a type of container made of thin, flexible, plastic film, nonwoven fabric, or plastic textile. Plastic bags are used for containing and transporting goods such as foods, produce, powders, ice, magazines, chemicals, and waste. It is a common form of packaging.^[1]

The Maharashtra government on March 23, 2018, banned the manufacture, usage, sale, transport, distribution, wholesale and retail sale and storage, import of plastic bags with or without handle, and

disposable products made out of plastic and thermocol. Citing the environmental risks and harm caused to wild animals from ingestion or entanglement in plastic, the government enforced the ban with immediate effect. As per the notification, violators will be fined Rs 5,000 and Rs 10,000 for the first and second-time offense. A third-time offender will have to shell out Rs 25,000 and may also face imprisonment for a period of three months.^[2]

STATEMENT OF THE PROBLEM: .

As recently new rule came from BJP government regarding Ban on Plastic

bags so researchers need to study on various aspects about impact of this rule on retail sector in India. As customers are the king of market so we need to study on problems faced by retailer towards ban on using plastic bags in Navi Mumbai City as well as to know the replacement of plastic bags are provided by retail store in Navi Mumbai city, to know the reason behind implementation of rule regarding ban on plastic bags and to analyse the impact of ban on carrying or using plastic bags on customers during shopping in Navi Mumbai City, etc. It will then be put into an assessment in order to draw conclusions and formulate the basic recommendations for the said topic. The researcher shall deal with the study "Impact of Ban on using Plastic Carry Bags on retail stores with special reference to Navi Mumbai City"

INTERDISCIPLINARY RELEVANCE:

The proposed research is related to the subject area-Marketing Management, buying behavior of customers, retail sector in Mumbai city and Impact of ban of using plastic carry bags on customers and retailers.

REVIEW OF RESEARCH AND DEVELOPMENT IN THE SUBJECT:

1. The Impact of Plastic Bags on the Environment: A field Survey of the City Of Sana'a And The Surrounding Areas, Yemen (International Journal of Engineering Research and Reviews ISSN 2348-697X (Online) Vol. 2, Issue 4, pp: (61-69), Month: October - December 2014, In this research paper, researcher surveyed the field for the city of Sana'a and recorded of the where about of those plastic bags accumulated. The number of factories producing plastic bags and discuss the causes and effects and reviewed a range of solutions for a clean environment for us and our future generations. The isolated microbial

strains were identified based on their cultural morphological and biochemical study.^[3]

2. Effect of Organised retail on Unorganised retail in Indian retail market: Gupta Himanshu¹ Dubey Neetu² and Patani Pawan³ (Research Journal of Management Sciences Vol. 1(1), 7-13, August (2012) The broad objective of the study was to understand consumer behavior towards organised and unorganised retail stores and to find out the consumers satisfaction level from organised retail stores as well as unorganised retail stores. The perception of the traditional retailers about the modern retailing.^[4]

OBJECTIVES:

1. To study on problems faced by retailers due to decision taken by government regarding ban on using plastic bags.
2. To know whether replacement of plastic bags are provided by retail store in Navi Mumbai city.
3. To know the problems faced by customers while purchasing products from retail store in Navi Mumbai city.
4. To know the reason behind implementation of rule regarding ban on plastic bags.
5. To analyse the impact of ban on buying behaviour of customers in Navi Mumbai City.
6. To do comparative study on scenario between before Ban and After Ban of Plastic Bag in Navi Mumbai City.

HYPOTHESIS:

H0: Customers' buying behaviour and facilities provided by retailer are Independents to each other.

H1: Customers' buying behaviour and facilities provided by retailer are associated with each other.

RESEARCH METHODOLOGY:**6. Universe of study**

The universe of study shall be Navi Mumbai City only.

7. The sample design

- The study is focused on Retailers and customers in Mumbai City.
- The total population in Mumbai City: 22,046,000 (2018)

The sample frame for collecting primary data shall be as follows :

S.N.	Selected Category	No. of Respondent
1.	Retailer	100
2.	Customers	100
	TOTAL	200

8. Data collection**Primary data:**

Respondents of all categories has been selected at random for collecting primary data by way of structured questionnaires & interview. Selected customers and retailers are the representative of various areas in Navi Mumbai city and all respondents are the representative of different income, age, occupation, standards of living etc.

Secondary data:

Secondary data has been collected from books, magazines, websites, newspaper, television, journal.

9. Data processing

The data collected from the primary and the secondary sources and has been processed and tabulated according to the objectives of study.

10. Data analysis

The processed data has been analyzed on the basis of the objective and hypothesis by applying various statistical tools.

Data Collection from Annexure -I(Retailers Questionnaires) and Annexure-II (Customers Questionnaires) and data analysis done through Tables and Pie Chart which are mentioned at the end of paper.

FINDINGS:

1. It has been found that after ban on using plastic carry bags by government maximum retailers and customers don't use plastic carry bags while shopping from retail stores in Navi Mumbai City.
2. It has been found that maximum retailers as well as customers are satisfied with the decision taken by government regarding ban on using plastic carry bags in retail stores in Navi Mumbai City.
3. Maximum retailers provides replacement of plastic bags and most of the retailers provide cloths bags and paper bags for packaging.
4. Maximum retailers are satisfied but faced some problems such as they have to incurred cost in providing replacement facilities to customers and some products could not get packed if polythene bags are not used, hence packaging also one of the major problem faced by retailers.
5. Despites of problems faced by retailers after ban in retail stores maximum retailers said that they get benefited such as customers carry their own bags hence sometimes reduce cost of packaging.
6. Retailers said there are different changes happened in buying behavior of customers such as customers have to carry their own carry bags for purchasing and if they don't carry then they demand for replacement.
7. Maximum retailers has been observed that replacement of plastic bags gives positive

impact on buying behavior of customers such as maximum customers don't demand for plastic carry bags.

8. After survey from customers it has been proved that maximum customers get influenced by personal factors such as age, gender, income, occupation, education, etc) and legal factors (such as governmental rules and regulations, law, etc.)

9. Maximum customers are satisfied with the decision taken by government regarding ban on using plastic carry bags in retail stores in Navi Mumbai city as they get replacement facilities of plastic carry bags from retailers such as cloths bags and paper bags.

10. Despite of satisfaction after ban on using plastic bags maximum customers faced problems while shopping from retail stores such as low quality replacement is been provided from retailer which leads to problems while handling products and hence they need to carry their own bags other than plastic bags.

11. Other than above mentioned problems customers get some benefits such as retailers gives replacement of plastic bags which is good for environment and hence they minimizes the use of plastic bags .

12. From above all findings it has been found that "Customers' buying behaviour and facilities provided by retailer are associated with each other" hence alternative hypothesis is accepted and null hypothesis is rejected.

DATA ANALYSIS AND INTERPRETATION

List of Tables

SUGESSTIONS AND RECOMMENDATIONS:

1. It is suggested that retailers should provide better quality while using replacement of plastic bags which leads to satisfy customers while shopping from retail stores.
2. Retailer should offer some scheme for motivating customers to bring carry bags while purchasing
3. Retailers can provide eco-friendly carry bags which is beneficial for environment and wild animals.
4. Retailers should do some promotion activities such as advertising, sales promotion which will helps them to change customers buying behavior in a positive way.
5. "Customers' buying behaviour and facilities provided by retailer are associated with each other" hence retailers should provide good facilities to customers such as good packaging, offers, discounts, awareness to support governments rules and regulations like ban on using plastic bags, etc.

LIMITATIONS:

- Sample size is small because of the time constraint.
- Respondent may provide data from their memory recall, there may only be rough estimates.
- Survey is limited Navi Mumbai City only.
- Survey is limited to retailers and customers only.

Table Number	Based on Annexure-I &II	Name of Table
1	Annexure-I(Retailers)	Use of plastic carry bags
2		Satisfaction
3		Replacement provided to customers
4		Types of replacement
5		Problems faced by retailers
6		Types of problems faced by retailers
7		Benefits to retailers after ban
8		Changes in buying behavior of customers
9		Opinion about impact of replacement on buying behaviour
10	Annexure-II(Customers)	Use of Plastic carry bags
11		Factors influence on buying behaviour
12		Customer Satisfaction with decision
13		Types of replacement
14		Problem faced by customers
15		Different problems faced by customers
16		Benefits to customers

List of Pie-Chart

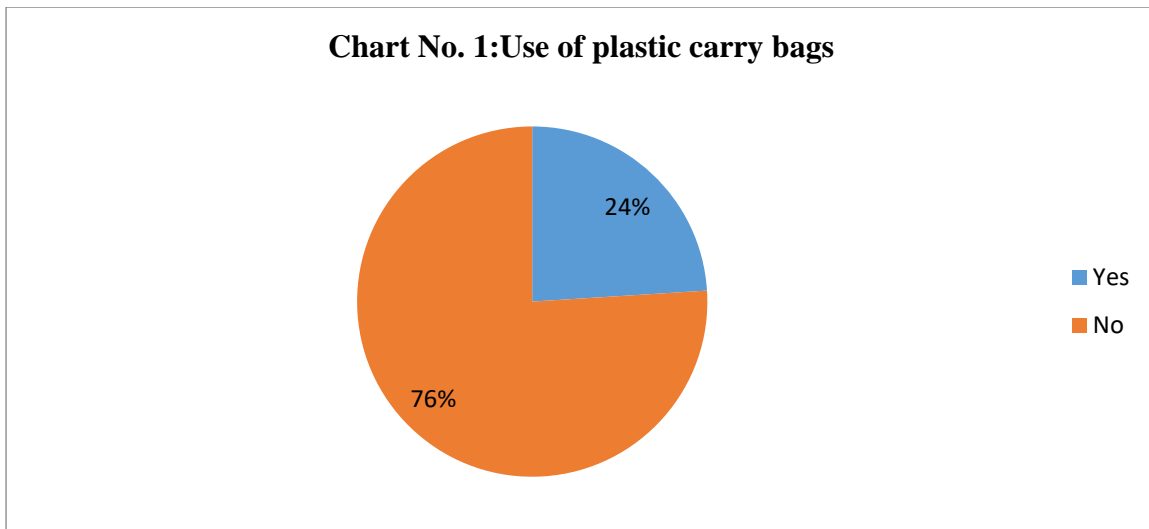
Table Number	Based on Annexure-I &II	Name of Pie-Chart
1	Annexure-I(Retailers)	Use of plastic carry bags
2		Satisfaction
3		Replacement provided to customers
4		Types of replacement
5		Problems faced by retailers
6		Types of problems faced by retailers
7		Benefits to retailers after ban
8		Changes in buying behavior of customers
9		Opinion about impact of replacement on buying behaviour
10	Annexure-II(Customers)	Use of Plastic carry bags
11		Factors influence on buying behaviour
12		Customer Satisfaction with decision
13		Types of replacement
14		Problem faced by customers
15		Different problems faced by customers
16		Benefits to customers

Data Collected from Retailers:

Table No.1: Use of plastic carry bags

1.Do you use plastic carry bags in your shops?

Sr. No.	Particular	No.of Respondent
1	Yes	24
2	No	76
	Total	100



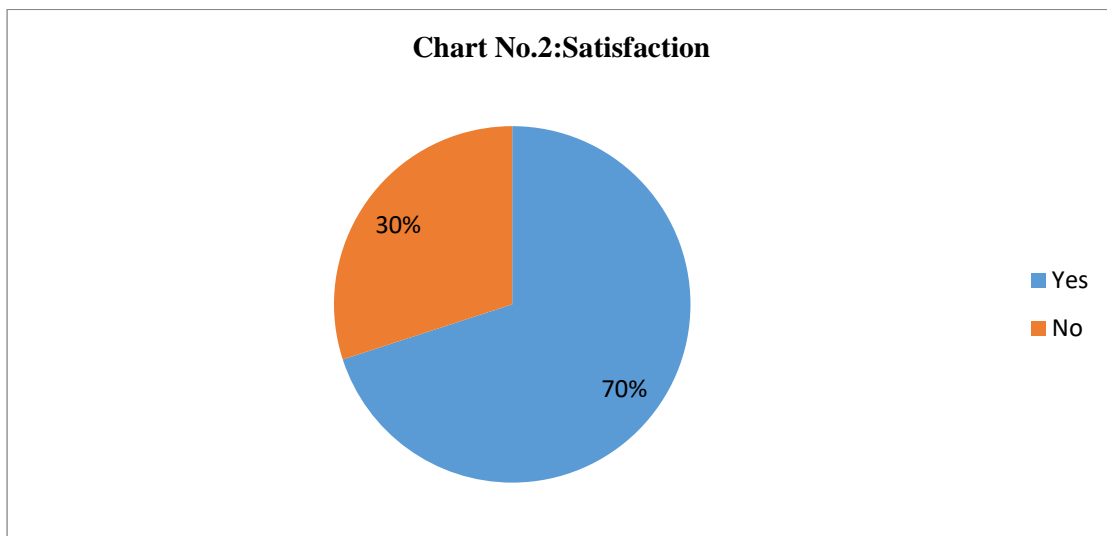
Interpretation:

It has been proved that after ban on using plastic carry bags maximum retailers don't use plastic carry bags.

2. Are you satisfied with decision taken by government regarding plastic ban?

Table No.2: Satisfaction

Sr. No.	Particular	No. of Respondent
1	Yes	70
2	No	30
	Total	100



Interpretation:

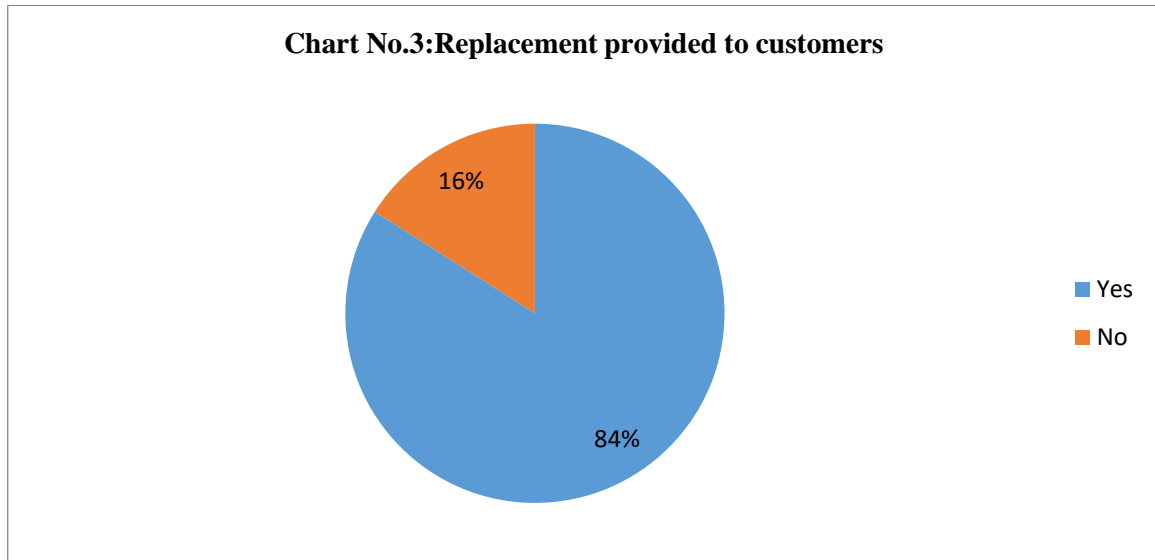
It has been proved from above pie chart that maximum retailers are satisfied with the

decision taken by government regarding ban on using plastic carry bags in retail stores.

3.Do you provide any replacement to customers instead of using plastic bags ?

TableNo.3:Replacement provided to customers

Sr. No.	Particular	No.of Respondent
1	Yes	84
2	No	16
	Total	100



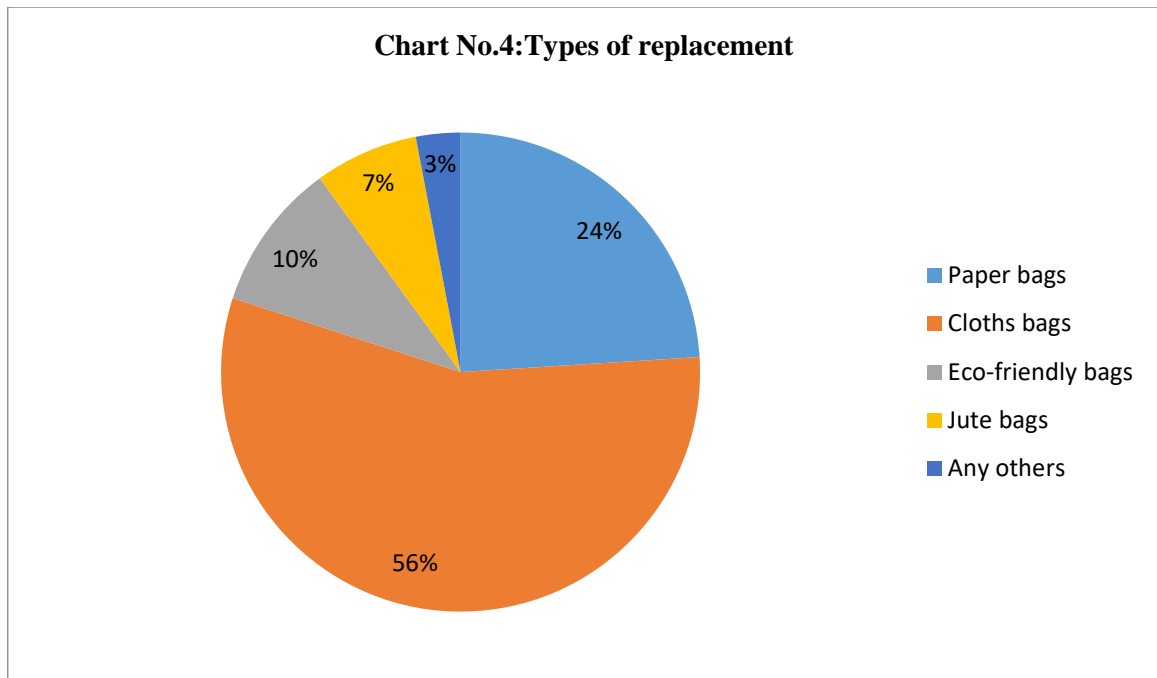
Interpretation:

It has been proved from above pie chart that maximum retailers provides replacement to customers instead of using plastic bags.

4. Which replacement do you provide ?

Table No.4:Types of replacement

Sr. No.	Particular	No.of Respondent
1	Paper bags	24
2	Cloths bags	56
3	Eco-friendly bags	10
4	Jute bags	7
5	Any other	3
	Total	100



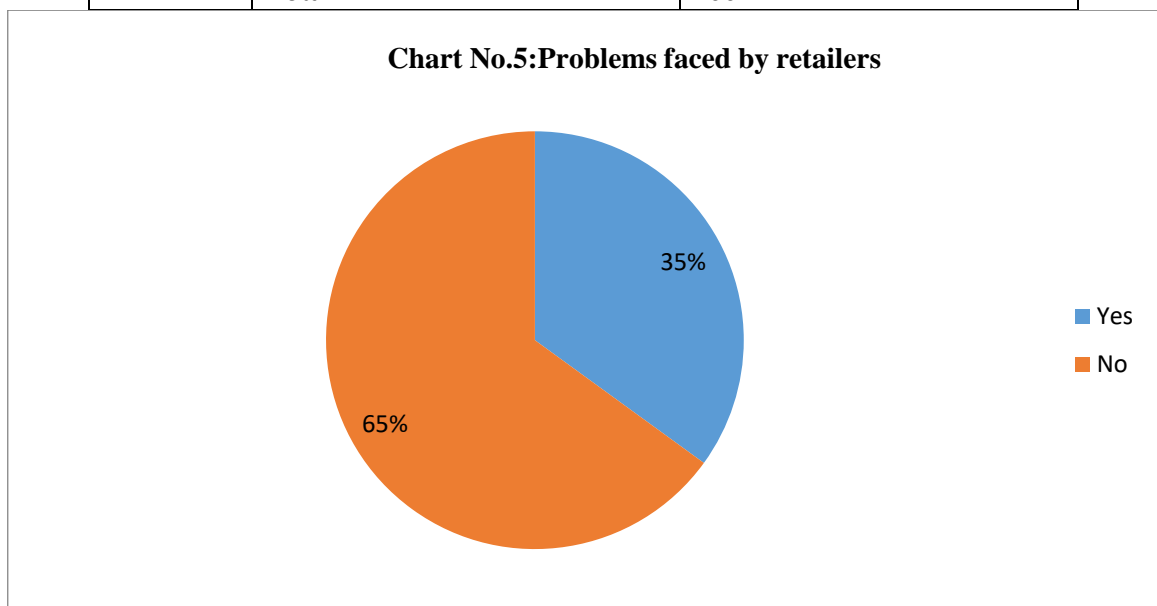
Interpretation:

It has been proved from above pie chart that maximum retailers provides replacement of plastic bags and most of the retailers use cloths bags and paper bags.

5. Do you face any problem while selling the product due to ban on plastic bags?

Table No.5:Problems faced by retailers

Sr. No.	Particular	No.of Respondent
1	Yes	35
2	No	65
	Total	100



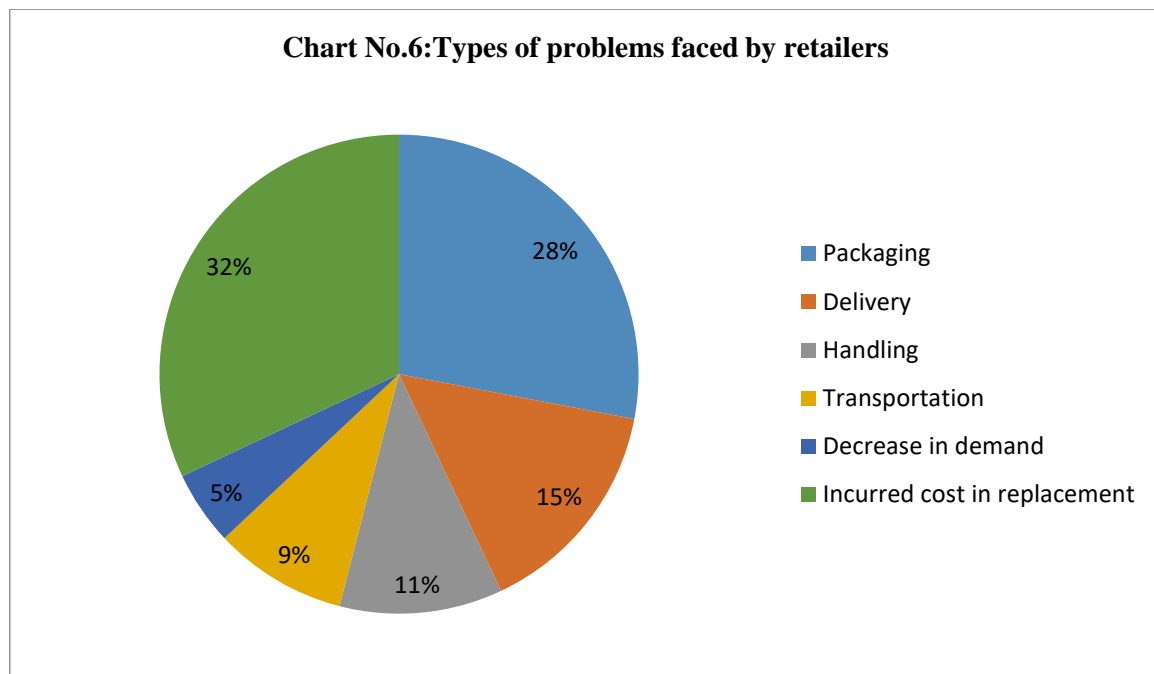
Interpretation:

It has been proved from above pie chart that maximum retailers are satisfied but faced some problems.

6. Which problems do you faced most while selling the product?

Table No.6:Types of problems faced by retailers

Sr. No.	Particular	No.of Respondent
1	Packaging	28
2	Making delivery	15
3	Handling	11
4	Transportation	9
5	Decrease in demand	5
6	Incurred cost in replacement of plastic carry bags	32
	Total	100



Interpretation:

It has been proved from above pie chart that maximum retailers are satisfied but faced some problems such as they have to incurred cost in providing replacement facilities to customers and some products

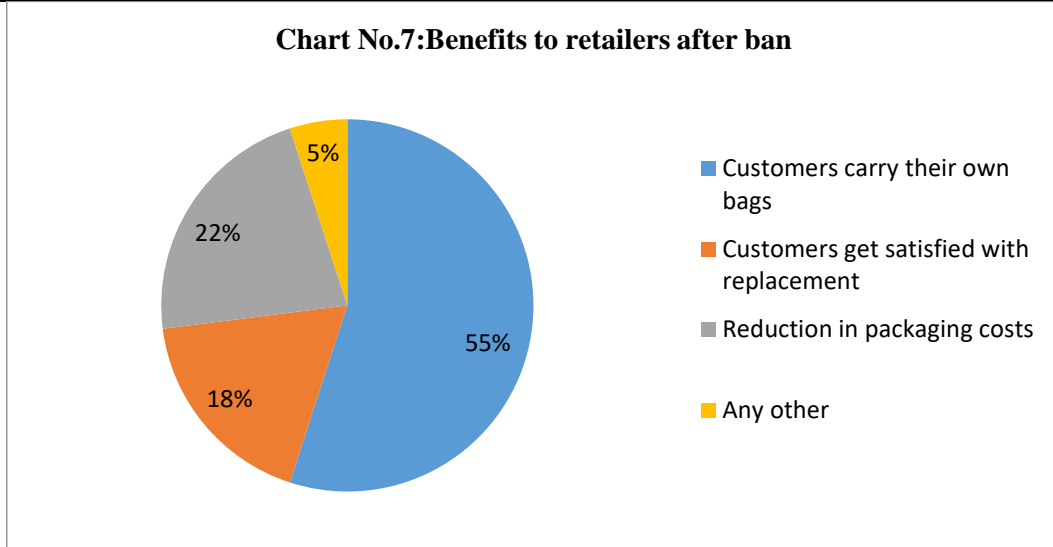
could not get packed if polythene bags are not used, hence packaging also one of the major problem faced by retailers.

7. What are the benefits that you got after ban on plastic bags?

Table No.7:Benefits to retailers after ban

Sr. No.	Particular	No.of Respondent
1	Customers carry their own bags	55
2	Customers get satisfied with replacement	18

3	Reduction in packaging costs	22
4	Any other	5
	Total	100



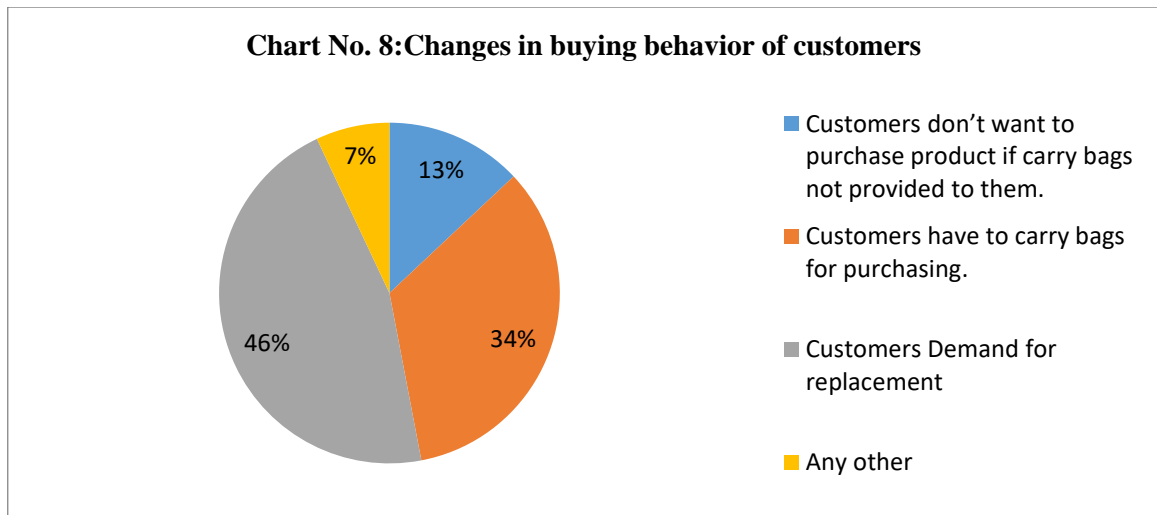
Interpretation:

It has been proved from above pie chart that despite of problems faced by retailers after ban in retail stores but maximum retailers get benefited such as customers carry their own bags hence sometimes reduce cost of packaging.

8. What are the changes in buying behavior of customers after ban?

Table No. 8:Changes in buying behavior of customers

Sr. No.	Particular	No.of Respondent
1	Customers don't want to purchase product if carry bags not provided to them.	13
2	Customers have to carry bags for purchasing.	34
3	Customers Demand for replacement	46
4	Any other	7
	Total	100

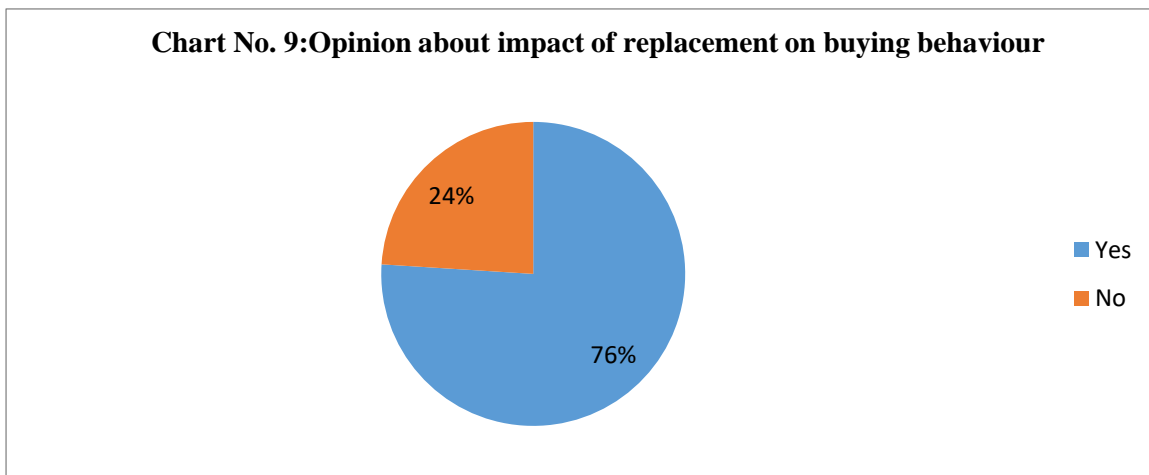


Interpretation:

It has been proved from above pie chart that retailers said there are different changes happened in buying behavior of customers such as customers have to carry their own carry bags for purchasing and if they don't carry then they demand for replacement.

**9. What do you think ,replacement of plastic bags gives positive impact on buying behavior of customers?
Chart No. 9:Opinion about impact of replacement on buying behaviour**

Sr. No.	Particular	No.of Respondent
1	Yes	76
2	No	24



Interpretation:

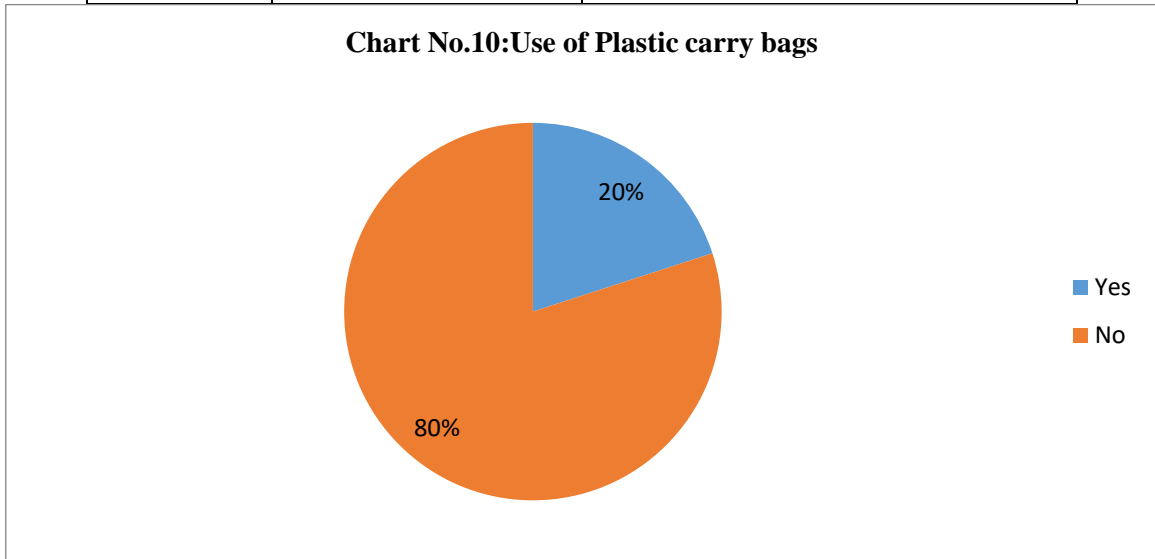
It has been proved from above pie chart that maximum retailers have observed that replacement of plastic bags gives positive impact on buying behavior of customers.

Data Collected from Customers:

1.Do you use plastic carry bags ?

TableNo.10:Use of Plastic carry bags

Sr. No.	Particular	No.of Respondent
1	Yes	20
2	No	80
	Total	100



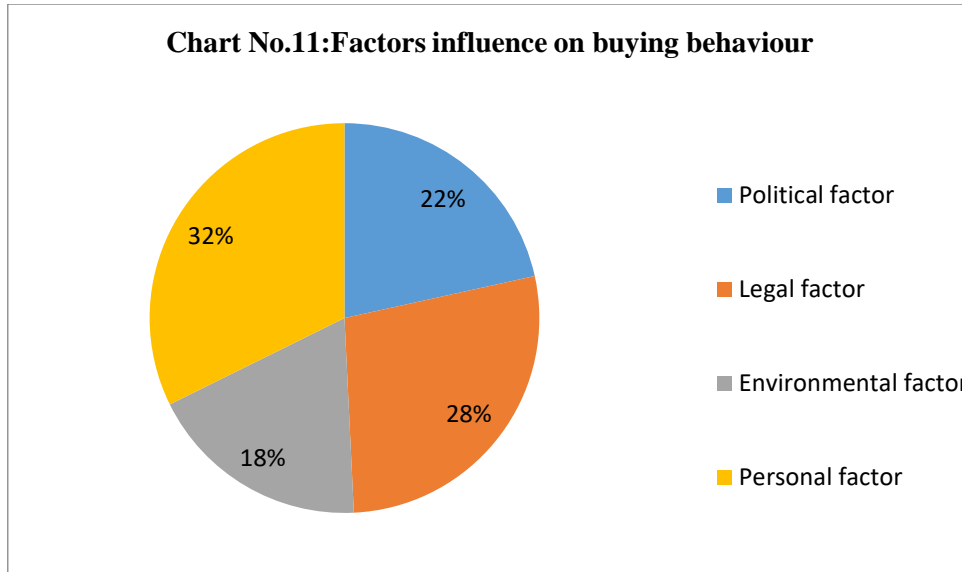
2.What are the different factors get influence on your purchasing behavior?

Interpretation:

It has been proved that after ban on using plastic carry bags maximum customers don't use plastic carry bags.

Table No.11:Factors influence on buying behaviour

Sr. No.	Particular	No.of Respondent
1	Political factor	14
2	Legal factor	18
3	Environmental factor	12
4	Personal factor	21
5	Social factor	12
6	Cultural factor	23
	Total	100



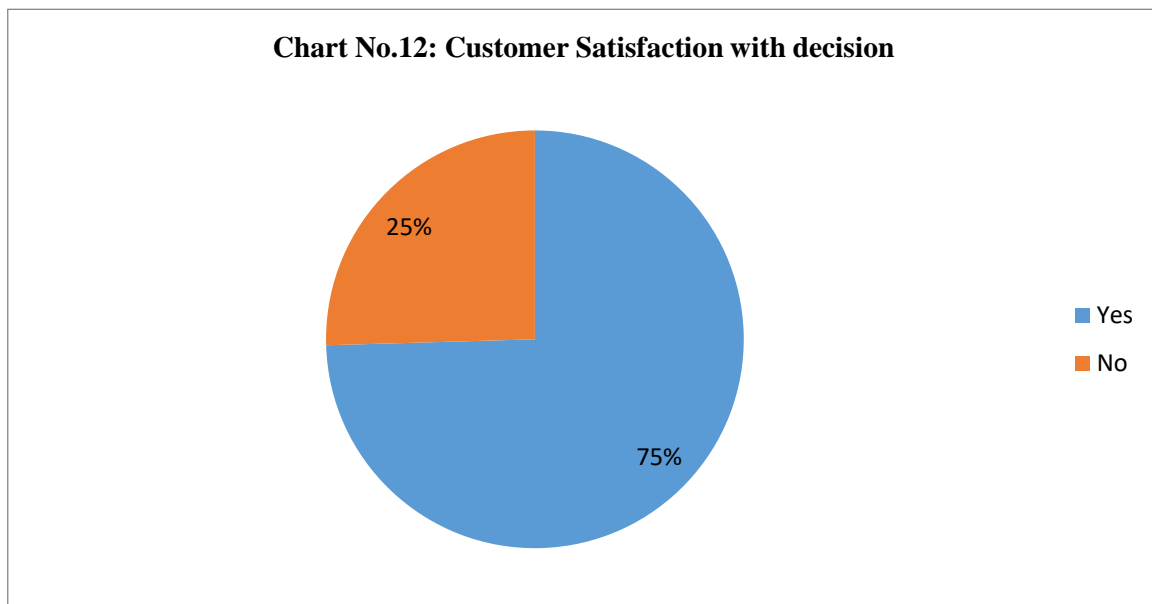
Interpretation:

It has been proved from above pie chart that maximum customers get influenced by personal and legal factors.

3.Are you satisfied with the decision taken by government regarding ban on plastic bags?

Table No.12: Customer Satisfaction with decision

Sr. No.	Particular	No.of Respondent
1	Yes	82
2	No	28
	Total	100



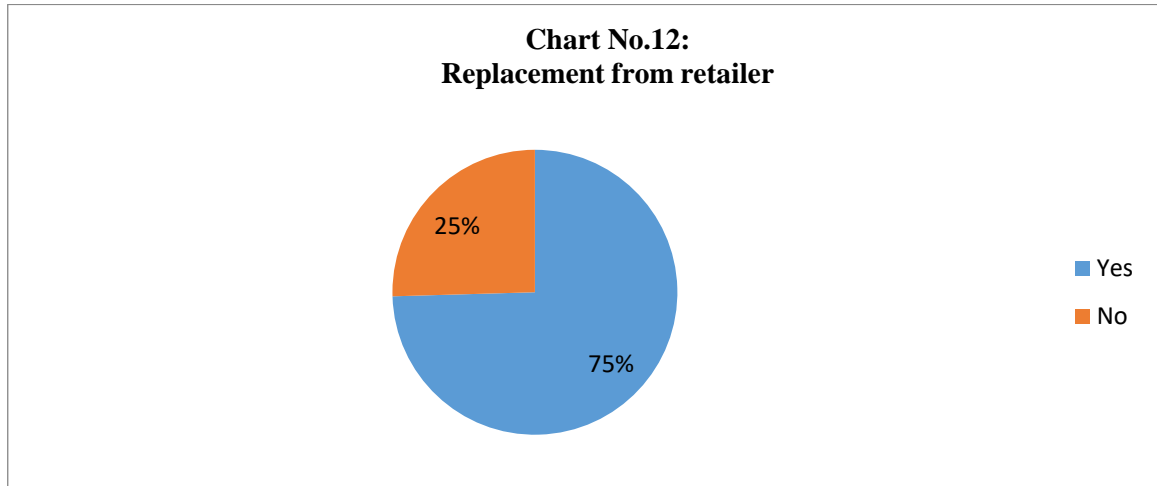
Interpretation:

It has been proved from above pie chart that maximum customers are satisfied with the decision taken by government regarding ban on using plastic carry bags in retail stores.

4.Do you get any replacement from retailers instead of plastic bags?

Table No.12: Replacement from retailer

Sr. No.	Particular	No.of Respondent
1	Yes	82
2	No	28
	Total	100



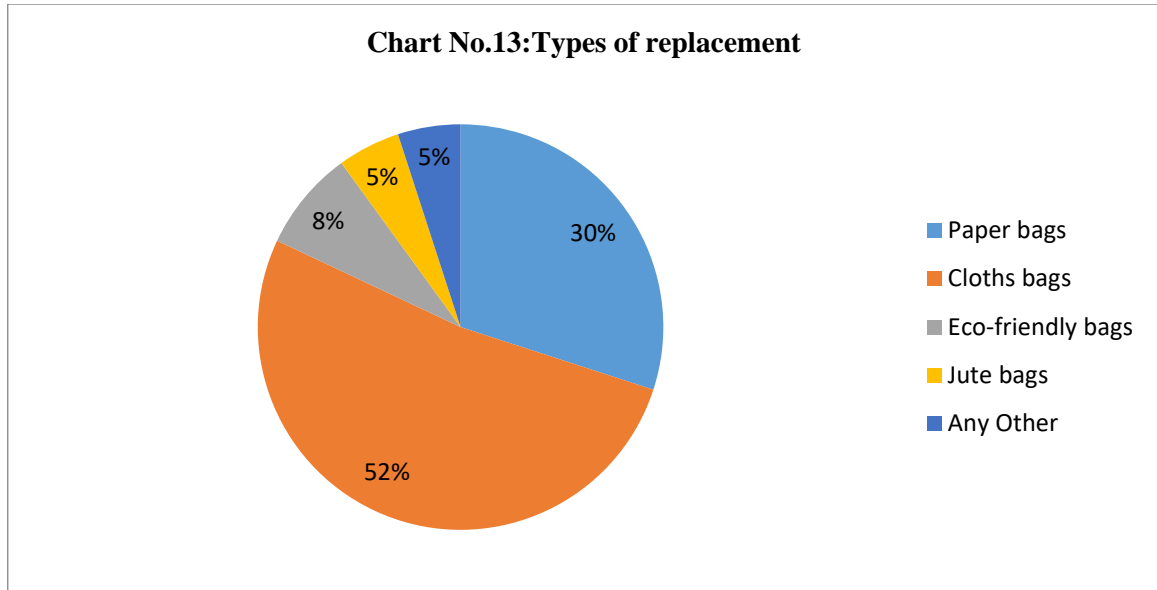
Interpretation:

It has been proved from above pie chart that maximum customers get replacement of plastic carry bags from retailers.

5.Which Replacement do you get from retailers ?

Table No.13:Types of replacement

Sr. No.	Particular	No.of Respondent
1	Paper bags	30
2	Cloths bags	52
3	Eco-friendly bags	8
4	Jute bags	5
5	Any other	5
	Total	100



plastic carry bags from retailers such as cloths bags and paper bags.

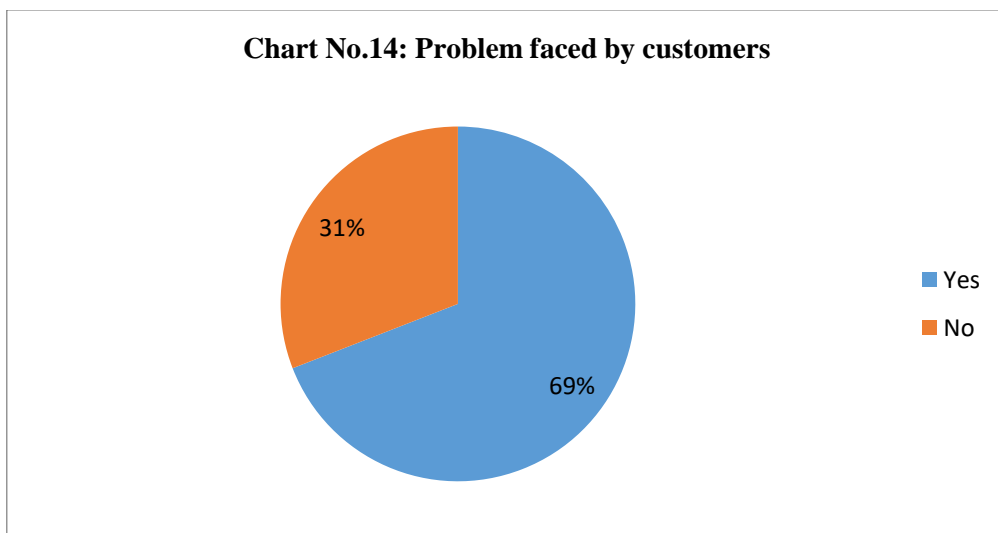
Interpretation:

It has been proved from above pie chart that maximum customers get replacement of

6..Do you face any problem while purchasing the product due to ban on plastic bags?

Table No.14: Problem faced by customers

Sr. No.	Particular	No.of Respondent
1	Yes	69
2	No	31
	Total	100



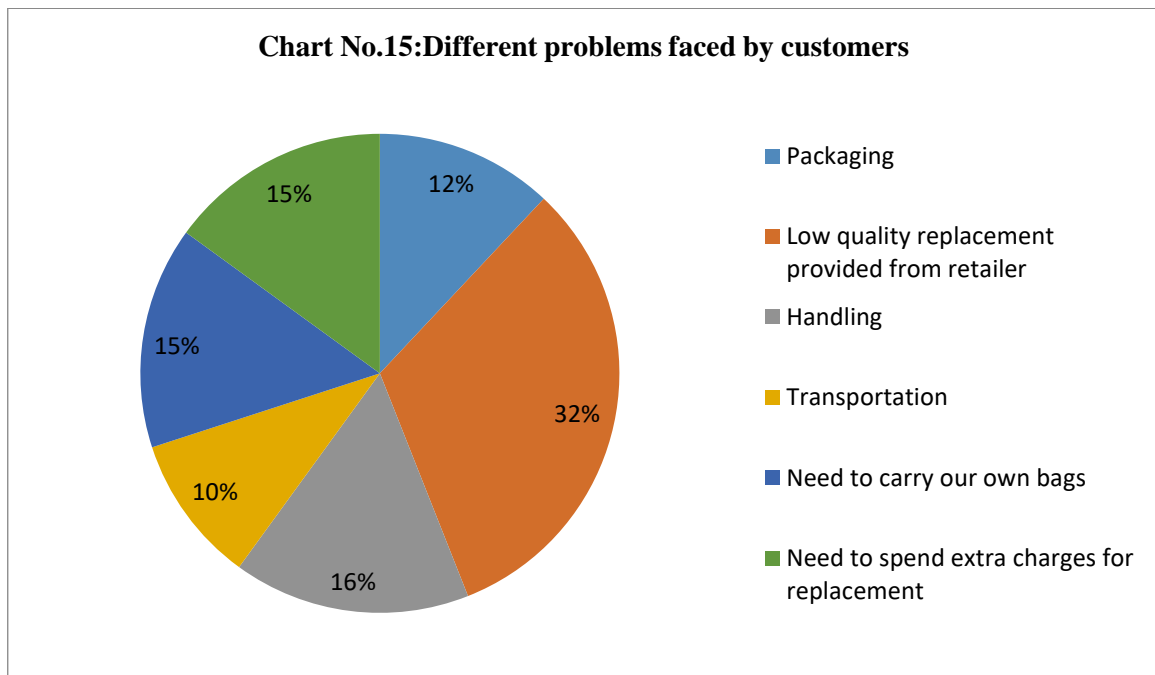
Interpretation:

It has been proved from above pie chart that maximum customers faced problems while shopping from retail stores.

7.Which problems do you faced most while purchasing the product?

Table No.15:Different problems faced by customers

Sr. No.	Particular	No.of Respondent
1	Packaging	12
2	Low quality replacement provided from retailer	32
3	Handling	16
4	Transportation	10
5	Need to carry our own bags	15
6	Need to spend extra charges for replacement	15
	Total	100



Interpretation:

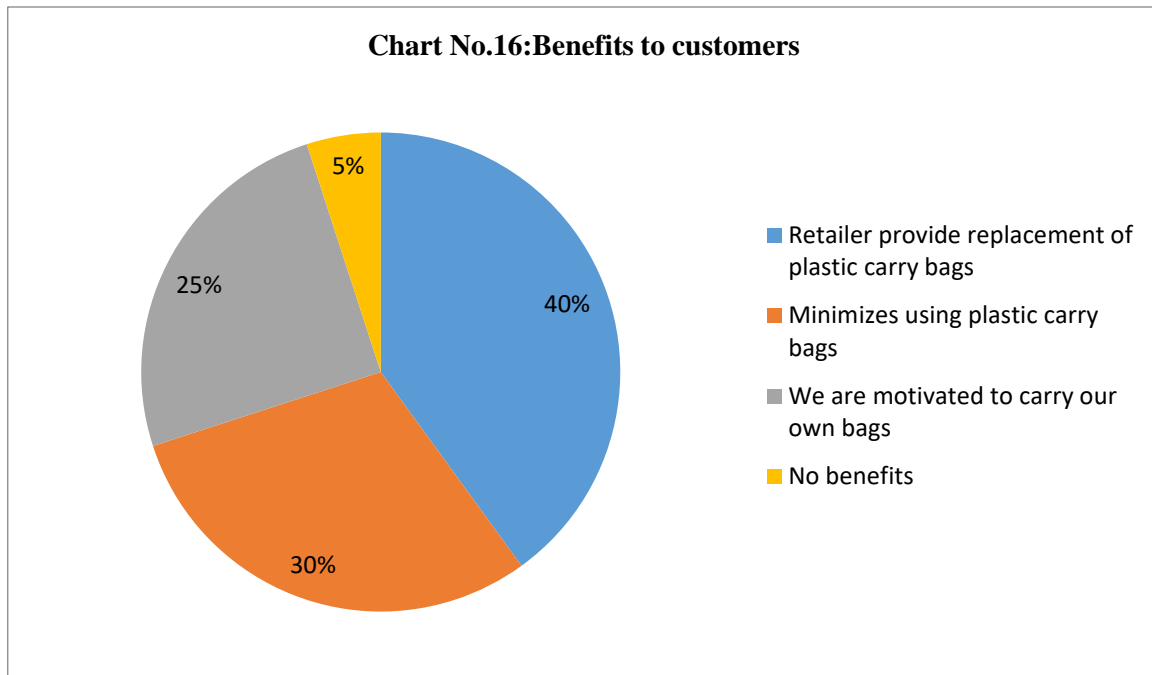
It has been proved from above pie chart that maximum customers faced problems while shopping from retail stores such as low quality replacement is been provided from

retailer which leads to problems while handling products and hence they need to carry their own bags other than plastic bags.

8..What are the benefits that you got after ban on plastic bags?

Table No.16:Benefits to customers

Sr. No.	Particular	No.of Respondent
1	Retailer provide replacement of plastic carry bags	40
2	Minimizes using plastic carry bags	30
3	We are motivated to carry our own bags	25
4	No benefits	5
	Total	100



Interpretation:

Despite of some problems customers get some benefits such as retailers gives replacement of plastic bags which is good for environment and hence they minimize the use of plastic bags which have been proved from above pie chart.

CONCLUSION:

A plastic bag, polybag, or pouch is a type of container made of thin, flexible, plastic film, nonwoven fabric, or plastic textile. The Maharashtra government on March 23, 2018, banned the use of plastic carry bags citing the environmental risks and harm caused to wild animals from ingestion or entanglement in plastic, the government enforced the ban with immediate effect. Survey is been done

on 100 retailers and 100 customers through structured questionnaire and interview and found that after ban on using plastic carry bags by government maximum retailers and customers don't use plastic carry bags while shopping from retail stores in Navi Mumbai City and they are satisfied with this decision. Maximum retailers provides replacement of plastic bags and most of the retailers provide cloths bags and paper bags for packaging but some problems faced by them such as they have to incurred cost in providing replacement facilities to customers and some products could not get packed if polythene bags are not used, hence packaging also one of the major problem. Retailers said there are different changes happened in buying behavior of customers such as customers have to carry their own carry bags for purchasing and if they don't carry then they demand for replacement. After survey from

customers it has been proved that maximum customers get influenced by personal factors such as age, gender, income, occupation, education, etc) and legal factors (such as governmental rules and regulations, law, etc.) retail stores such as low quality replacement is been provided from retailer which leads to problems while handling products and hence they need to carry their own bags other than plastic bags. "Customers' buying behaviour and facilities provided by retailer are associated with each other" hence retailers should provide better quality of replacements of plastic carry bags which should be easy for handling, packaging, transporting, etc.

- Beri G.C. (2008) 'Marketing Research' 4th Edition Tata Mc-Graw Hill company.
- A.J. Lamba, the Art of Retailing, Tata McGraw Hill education, New Delhi.

REFERENCES:

1. https://en.wikipedia.org/wiki/Plastic_bag
2. <https://indianexpress.com/article/india/plastic-ban-in-maharashtra-mumbai-from-june-23-what-is-allowed-what-is-banned-all-you-need-to-know-5228307/>.
3. **The Impact of Plastic Bags on the Environment: A field Survey of the City Of Sana'a And The Surrounding Areas, Yemen** (International Journal of Engineering Research and Reviews ISSN 2348-697X (Online) Vol. 2, Issue 4, pp: (61-69), Month: October - December 2014, Available at: www.researchpublish.com
4. **Effect of Organised retail on Unorganised retail in Indian retail market: Gupta Himanshu¹ Dubey Neetu² and Patani Pawan³** (Research Journal of Management Sciences Vol. 1(1), 7-13, August (2012)

Books:

- Kothari C.R. (2008) 'Research Methodology' 2nd Edition Himalaya Publication.
- Kotler Philip (2008) 'Principle of Marketing Management' 12th Edition Prentice-Hall of India.

CONTENTS

Editorial	5
Risk and Return Analysis of the Stock Market in India: Special Reference to IT and Banking Sector	7
BRICS Economies: Implications for the Global Financial Order	15
A Comparative Regression Analysis of Onsite And Offsite ATM & POS Deploy ability In Indian Banking Sector During The Period Of 2014 To 2016	20
Mall Management and Shopping Behaviour With Reference to Shopping Mall	30
An Analytical Study on Marketing Strategy of Patanjali With Special Reference to Biscuits Products- Navi Mumbai Area	43
Impact of bank choice behavior on brand loyalty- An Empirical study	51
Impact of Ban On using plastic carry bags on retail stores with special reference to Navi Mumbai city	61

Call for Papers: Volume 7, Issue 1

**Dharohar Research Journal Invites Original Research Papers for its
Volume 7, Issue 1, to be published on 20th June, 2018**

Guide Lines for Contributors

About the Institute:

Datta Meghe Institute of Management Studies (DMIMS) was established in 1994, under the educational trust named Nagar Yuwak Shikshan Sanstha (NYSS) at Nagpur, with an aim to cater Quality Management education. NYSS has a long history of excellence in all genre of education. Educational society has established 39 institutions which impart quality education right from pre-primary to postgraduate levels covering various faculties like Medical Sciences, Engineering and Management. More than 6900 highly qualified & skilled staff are dedicatedly engaged in the towering efforts of educating more than 40,400 students.

DMIMS is an Autonomous Institute *affiliated to Rashtrasant Tukadoji Maharaj Nagpur University and offers two-year, full time Master of Business Administration(MBA) Programme. The MBA programme has been accredited twice, by National Board of Accreditation (NBA) in 2008 and in 2013.*

Research Journal:

Dharohar Research Journal, "DHAROHAR" ISSN No: 2455-4448, is Biannual On-line Management journal, which is published in the month of June and December every year.

Guidelines for Authors

1. Dharohar Research Journal of Management invites original Articles/ Research Papers/case studies/Book Review from academicians/research scholars/practicing managers for possible publication.
2. Articles/ Research Papers/case studies/Book Review may be from Management/ Commerce.
3. The article/research paper should be submitted as a single MS Word file typed in 12-point Times New Roman font on A-4 size paper in double line spacing with margin of 1" on all sides.
4. The single word file should consist of the title page, abstract, main article or research paper. All tables, charts, images should be added in the end of the paper. References should be cited in the style prescribed in the publication manual of the American Psychological Association (APA Guidelines).
5. The title page should consist of important details in the following order Title of the Article/Research Paper, Complete Name(s) of the Author(s), Address, Institutional Affiliation(s), Telephone Number(s), E-mails id(s). A paper can have maximum four authors.

6. The length of the articles should be between 3500 to 5000 words approximately. The abstract should clearly outline the purpose, scope and conclusion of the paper and should be drafted between 150-200 words along with three to four key words listed alphabetically separated by commas
7. Reference list should not consist of any unpublished results or piece of research. All tables and figures should be serially numbered and duly acknowledged. The sources of data should be mentioned under each chart/table or figure.
8. The authors should be accurate in reproduction of copyrighted material and should obtain permission from copyright holders, if necessary. Articles published in Dharohar Research Journal should not be reproduced or reprinted in any form, either in full or in part without prior written permission from the Editor.
9. An author can contribute one article for publication in an issue as the main author. However, as co-authors two more submissions are possible.
10. The articles received for publication would be peer reviewed by the experts in their respective fields.
11. The manuscripts will be checked and screened for plagiarism or originality checks after submission.
- 12. There is no publication/ processing fee.**
13. The paper should be submitted electronically as an MS Word attachment to the Editor-In-Chief: at shinychib@gmail.com
14. For any further details required please visit our website www.dmims.edu.in

Important Instructions:

Ethical Guideline for Authors: The Author shall present an accurate and complete account of the research performed. The corresponding author must have obtained the approval of all other authors for each submission. Ghost authors are not permitted. The material in the submission shall be original. The material based on prior work, including that of the same author's shall be properly attributed by proper citation. The author shall have the obligation to notify the editor immediately should any one of the statements in this list ceases to be true.

Ethical Guidelines for Peer Reviewers: The Peer reviewer shall review manuscripts for which they have the subject expertise required to carry out a proper assessment. Peer reviewers shall respect the confidentiality of peer review and shall not reveal any details of the manuscript under review and of its review. Peer reviewers shall be objective and constructive in their reviews.

Ethical Guidelines for the Editor: The Editor shall actively seek the views of authors, readers, reviewers, and editorial board members about ways of improving the journal's success. The Editor shall support initiatives designed to reduce academic misconduct. The Editor shall support initiatives to educate researchers about publication ethics. The Editor shall provide clear advice to reviewers. The Editor shall require reviewers to disclose any potential competing interests before agreeing to review a submission. The Editor shall encourage reviewers to comment on questions and possible research misconduct raised by submissions.