ISSN 2249 - 9040

VOLUME 9 NO. 1 JANUARY-JUNE 2019

IPE Journal of Management

Listed in
- Ebsco Database
- ProQuest
- Ulrichs Web

INSTITUTE OF PUBLIC ENTERPRISE
ICSSR (MHRD, GoI) Recognized Centre for Excellence

Aims and Scope

IPE Journal of Management is a bi-annual, peer-reviewed journal which publishes empirical, theoretical and review articles dealing with the theory and practice of management. The aim of the journal is to provide a platform for researchers, academicians, practitioners and policy-makers from diverse domains of management to share innovative research achievements and practical experience, to stimulate scholarly debate both in India and abroad on contemporary issues and emerging trends of management science and decision-making.

We thank Indian Council of Social Science Research (ICSSR) for Financial Assistance for Publication of the Journal.

Published by: Satyam N Kandula on behalf of Institute of Public Enterprise

Owned by: Institute of Public Enterprise

Printed by: Satyam N Kandula on behalf of Institute of Public Enterprise

Printed at: Wide Reach Advertising Pvt Ltd, 21, Surya Enclave, Trimulgherry, Hyderabad - 500015.

Place of Publication: Institute of Public Enterprise, OU Campus, Hyderabad - 500007.

IPE Journal of Management

IPE Journal of Management

Volume 9 No 1 January-June 2019 ISSN 2249 - 9040

Contents

ISSN 2249 - 9040 Volume 9, No 1, January-June 2019 pp. 1-13

Impact of Organizational Climate on Employee Turnover Intentions – An Empirical Study

G. Hima Bindu[1]
V. Srikanth[2]

Abstract

Across the world organizations have realized that retention of talented employees is critical for the success of organizations. Employee retention has become one of the major challenges for HR Managers today. Research on employee turnover had been of great interest to the researchers and academicians alike because of the serious negative effects, employee turnover can have on the organizations. Numerous research studies on employee turnover reveal a number of factors that can impact employee turnover. This paper explores to identify the impact of certain dimensions of organizational climate on turnover intentions of employees. The study was carried out in select service sector organization based at Hyderabad. The data collected from 295 employees from select service sector organizations was analyzed for reliability (Chronbach, 1952) and found to be quite consistent. The data was then subjected to chi-square analysis to test association between the variables, correlation analysis to find the degree and direction of association between the variables, single linear regression and multiple regression to examine the impact of organizational climate dimensions on turnover intentions of employees. The results establish that the organizational climate dimensions are negatively correlated with employee turnover intentions and all dimensions of organizational climate negatively impact turnover intentions. Out of all dimensions, trust, training & development, employee wellness, performance management and work environment turned out to be good predictors of turnover intentions.

Keywords: Employee Turnover, Turnover Intentions

Introduction

The greatest strength of India is its rich and abundant human resources. The growth and prosperity of a nation or an organization depends on the proper development and deployment of its human resources. Service sector is the largest and fastest growing sector in India, growth of India's service sector has drawn

1 Assistant Professor – HR & OB, Amity Global Business School, Hyderabad and can be reached at hbpedaprolu@hyd.amity.edu

2 Coordinator (Research), Institute of Public Enterprise, Hyderabad. and can be reached at villsrikanth@ipeindia.org

global attention. Unlike other countries where economic growth has led to a shift from agriculture to manufacturing industries, in India there has been a shift from agriculture to service sector. Human Resources have become one of the greatest factors in determining the quality of services in service sector organizations in India. Today's service sector organizations are facing a two way problem of economic anxiety and employee turnover. According to Aon Hewitt survey 2017, service sector saw higher attrition rate when compared to manufacturing sector. Employee turnover has become a significant problem in service sector organizations over the past decade and it has a direct impact on the bottom line of the company. Experts of management education named it as 'employee turnover'; some have called it 'attrition'. In Human Resource Management terminology, it refers to the phenomenon of employees leaving the organization. It is usually measured in the metric called "attrition rate".

Turnover is an observable fact which every organization deals with. Turnover has often been associated with organizational withdrawal and has been studied among organizational scholars for a long time (Hinshaw & Atwood, 1984). The consequences of high turnover in service sector organizations is instability in the employee group and long-term vacancy, an increased workload for remaining employees and a lack of knowledge among new employees. These components can affect quality of service and dissatisfaction among customers and employee groups (Barak et al., 2001; Hinshaw & Atwood, 1984). Therefore it is important to examine turnover in service sector. According to a study by society for Human Resource Management, employers spend an equivalent of six to nine months of an employee's salary in order to find and train their replacement. There are tangible and intangible costs associated with employee turnover, these include the cost of hiring a new employee which includes the cost of advertising, screening, interviewing and selecting, cost of on-boarding including the cost of training, lost productivity, lost engagement, cost of errors in customer service by a new employee etc. Another huge cost that might be associated with the turnover is the loss of intellectual capital which will affect heavily its competitive advantage if the left employee worked for a competitor.

Turnover Intentions is a precursor to actual turnover. It is the measurement of whether a business' or organization's employees plan to leave their position. Gauging the turnover intentions discloses the actual turnover.

In such a context it becomes necessary to investigate the relationship between organizational climate dimensions and employee turnover intentions. This research seeks to empirically examine the same.

Literature Review

Turnover intention is the thought or feeling of leaving but not necessarily the act of leaving the organization. It refers to one step before leaving (planning to leave). In contrast, actual turnover is the employee's departure from an organization. Information related to turnover intention or the turnover cognition provides organizations an opportunity to salvage employee-management relationship and stop the loss of the employees (Fang, Tony, & Verma, 2002).

Meyer and Cuomo (1962) found that turnover among engineers was directly associated with extremely high aspirations of these engineers for administrative responsibilities. Apparently, these individuals possessed high expectations concerning their level of achievement. When such expectations were not met, their tendency to seek this satisfaction elsewhere increased.

Evan (1963) found that avoidable employee turnover was significantly lower when a trainee was assigned to a department with two or more other trainees than when he was assigned to a department either alone or with only one other trainee. Evan speculated from these findings that a new employee (trainee) who has the substantive support of other new employees will be better able to contend with the stresses and ambiguities created by a new job than he would without such support.

In a questionnaire survey of 156 staff nurses, Lyons (1971) found that perceived role clarity was negatively related to voluntary turnover and propensity to leave.

In an effort to test the applicability of Adam's theory of inequity to turnover, Telly, French and Scott (1971) surveyed a large sample of hourly production workers drawn at random from shops rated either high or low in turnover (based on previous turnover rates). The subjects were administered a Likert-type questionnaire designed to measure perceived inequities among various factors in the work environment. It was found that "high turnover" groups perceived significantly greater inequity with respect to the treatment they received from both supervisors and lead men. Telly et al., speculated that when an employee perceives inequitable treatment, he/she may feel frustrated and will not contribute his best efforts toward the primary goals of the organization, if this perceived inequity becomes excessive, he will actually separate himself from the organization.

The importance of co-worker support in retention has been pointed out by Farris (1971). In a predictive study among scientists and engineers, he found that both perceived low inclusion in the organization and perceived low group cohesiveness were somewhat effective predictors of employee turnover.

(Mobley, 1982) indicated that the intention to quit an organization may be a significant response to stress factors arising out of incongruence between an individual's psychological perception about his/her job environment on the one hand and his/her needs and aspirations on the other, mediated by an individual's attitudinal facets such as the level of involvement and satisfaction with his/her job responsibilities.

Graen, Liden, and Hoel (1982) found that the quality of the leader–member (exchange relationship) predicted employee turnover, they emphasized that leadership plays an important role in predicting the turnover behavior of employees.

Pfeffer (1983) argued the importance of demographic fit. According to him demographic variables have a significant role in predicting the turnover intentions of employees. These variables were age, gender and tenure in an organization. During this time period, researchers also attempted to identify the consequences of turnover. These early studies primarily focused on increased costs and organizational performance decrements following turnover.

Wood and Macaulay (1989) have conducted a study to determine why employees working in hospitality industry leave their jobs. According to them, reasons for employees' turnover are quality of supervision, lack of communication, working conditions, incompatibility with company culture, low pay and fewer benefits, lack of clear definition of responsibilities, lack of direction on what to do.

Silverthorne (2004) ascertained that job satisfaction is positively associated with worker productivity and negatively associated with employee turnover. In other words, greater job satisfaction is associated with greater productivity, so more satisfied employees ought to be more productive, relative to lesser-satisfied employees. These findings are aligned with research showing that job satisfaction is positively related to employee engagement. Research has shown that more satisfied employees are more engaged in their work, while less satisfied employees are less engaged. Lower levels of engagement are associated with employee withdrawal, particularly in terms of voluntary turnover (Lambert et al., 2001). Therefore, it is accepted that job satisfaction and employee turnover intention are inversely related.

Radzi et al.,(2009) stated that the managers are mainly responsible for the tasks such as wage satisfaction, work schedule, workload, rewards, and job responsibilities; therefore, they do not think of other alternatives outside the organization due to these responsibilities and they tend to have lower turnover intention.

The turnover intention was also found to differ based on marital status and the single employees were observed to have a higher turnover intention compared to married employees. The reason of this may be due to the financial responsibilities assumed by the married employees in their families. This finding support the findings of Carbery et al. (2010). They reached the conclusion that the turnover intention of married employees was lower due to their financial obligations.

Shukla & Sinha, (2013) studied leading banks in semi urban and urban areas of India to elicit the influence of job stress, compensation, job satisfaction, employee relationship with management and career growth on employee turnover. The results establish that job satisfaction and work environment influenced employee turnover

Jeen (2014) studied turnover in retail stores in India and found that motivation, and better incentives had insignificant impact on turnover. The study also suggested that turnover was impacted by Quality of work life, career growth, working hours, working conditions, and salary.

Need for the Study and Research Gap

From the above section it is evident that there is huge amount of literature on the area under discussion and there are numerous factors influencing turnover intentions of employees. However, there seems to be less work done on the impact of organization climate dimensions on turnover in service sector organizations in the current time context. Hence, this study is specifically designed to bridge this gap. All this reduces to certain set of questions like…

- What is the impact of organization climate dimensions on turnover intentions of employees?
- What is the important dimension which impacts the turnover intentions of employees?
- If so, what is the level of evidence? Is it possible to find it empirically?

To answer these questions and to ascertain certain evidence to these doubts, this study is devised with the objectives, hypothesis and variables.

Objective

To study the impact of organizational climate dimensions on turnover intentions of employees.

Hypothesis

Null Hypothesis (Ho) : Organizational climate dimensions are not associated with employee turnover intentions.

Alternate Hypothesis (Ha) : Organizational climate dimensions are associated with employee turnover intentions.

Variables Under Study

- Organizational climate dimensions viz.,
  - Trust
  - Training & Development
  - Transformation & Diversity
  - Leadership
  - Employee Wellness
  - Communication
  - Performance Management
  - Rewards & Recognition
  - Team Work
  - Work Environment
- Turnover Intentions of employees

Participants

Sample composed of 295 employees of select service sector organizations based in Hyderabad. This sample was chosen purely on the basis of convenience and availability of employees.

Data Collection Tools and Scales

- Organizational Climate dimensions (10) were measured using a 50 itemed (5 each for each dimension) questionnaire based on Litwin and Stringer scale (Litwin and Stringer,1967) on a five point Likert scale with point anchors ranging from "1" being strongly disagree to "5" being strongly agree.
- Turnover Intentions of employees was measured using a 8 itemed questionnaire (Shore and Martin, 1989) on a five point Likert scale with point anchors ranging from 1. Strongly disagree to 5. Strongly agree. This scale is widely used in the literature and validity of this scale stands tested.

Statistical Tools

The data collected from 295 employees was analyzed for reliability (Chronbach,

1952) to test the reliability of the scales. The data was then subjected to Pearson's chi-square analysis to test the statistical association between the variables, further the data was subjected to Pearson's correlation analysis to measure the degree and direction of association between the variables, then the data was subjected to single linear regression and multiple linear regression analysis to measure the impact of organization climate dimensions on turnover intentions of employees. Statistical package SPSS version 20 was used to carry out the statistical analysis.

Summarized Results

Table-1: Demographics

Demographic	Variables	Frequency	Percent
Gender	Male	192	65
	Female	103	35
Age	22-32	97	33
	33-42	91	31
	43-52	56	19
	Above 52	51	17
Marital Status	Married	200	68
	Unmarried	95	32

Table-2: Measures of Reliability (Chronbach's Alpha):

Sl. No	Variables	No. of Items	Cronbach's Alpha
1	Organizational Climate dimensions	50	0.834
2	Turnover Intentions of employees.	8	0.821

Table-3: Summarized Results of Chi-square Analysis to Measure the Statistical Association between the Variables (Pearson's Chi-Square Analysis):

Sl. No.	Variables	Significance Value	P-Value for Pearson Chi-Square Statistic	Inference Drawn
1	Trust Vs Turnover Intentions	0.05	0.000	Associated
2	Training & Development Vs Turnover Intentions	0.05	0.000	Associated
3	Transformation & Diversity Vs Turnover Intentions	0.05	0.000	Associated
4	Leadership Vs Turnover Intentions	0.05	0.000	Associated
5	Employee Wellness Vs Turnover Intentions	0.05	0.000	Associated
6	Communication Vs Turnover Intentions	0.05	0.000	Associated
7	Performance Management Vs Turnover Intentions	0.05	0.000	Associated
8	Rewards & Recognition Vs Turnover Intentions	0.05	0.000	Associated
9	Team work Vs Turnover Intentions	0.05	0.000	Associated
10	Work Environment Vs Turnover Intentions	0.05	0.000	Associated

Table-4: Measures of Degree and Direction of Association

S. No.	Variables	Correlation Coefficient (r) at 0.01 level of significance (two tailed)	Inference
1	Trust Vs Turnover Intentions	-0.730	Negative and strong
2	Training & Development Vs Turnover Intentions	-0.750	Negative and strong
3	Transformation & Diversity Vs Turnover Intentions	-0.717	Negative and strong
4	Leadership Vs Turnover Intentions	-0.742	Negative and strong
5	Employee Wellness Vs Turnover Intentions	-0.738	Negative and strong
6	Communication Vs Turnover Intentions	-0.746	Negative and strong
7	Performance Management Vs Turnover Intentions	-0.766	Negative and strong
8	Rewards & Recognition Vs Turnover Intentions	-0.760	Negative and strong
9	Team work Vs Turnover Intentions	-0.714	Negative and strong
10	Work Environment Vs Turnover Intentions	-0.739	Negative and strong

Table-5: Linear Regression Analysis Results

Predictors	Turnover Intentions		
	Unstandardised coefficient B	R square	Significance Value
Trust	-0.873	0.533	0.000
Training & Development	-0.857	0.563	0.000
Transformation & Diversity	-0.807	0.514	0.000
Leadership	-0.776	0.551	0.000
Employee Wellness	-0.812	0.545	0.000
Communication	-0.775	0.557	0.000
Performance Management	-0.866	0.585	0.000
Rewards & Recognition	-0.781	0.578	0.000
Team work	-0.801	0.510	0.000
Work Environment	-0.770	0.546	0.000

Table-6: Regression Equations

S. No.	Variables	Regression Equation
1	Trust Vs Turnover intentions of employees	Y = 5.311 – (0.873) X
2	Training & Development Vs Turnover intentions of employees	Y = 5.175 – (0.857) X
3	Transformation & diversity Vs Turnover intentions of employees	Y = 5.047 – (0.807) X
4	Leadership Vs Turnover intentions of employees	Y = 4.892 – (0.776) X
5	Employee wellness Vs Turnover intentions of employees	Y = 5.075 – (0.812) X
6	Communication Vs Turnover intentions of employees	Y = 4.898 – (0.775) X
7	Performance Management Vs Turnover intentions of employees	Y = 5.215 – (0.866) X
8	Rewards & Recognition Vs Turnover intentions of employees	Y = 4.934 – (0.781) X
9	Team work Vs Turnover intentions of employees	Y = 5.041 – (0.801) X
10	Work Environment Vs Turnover intentions of employees	Y = 4.894 – (0.770) X

Table-7: Results of Multiple Regression Analysis

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	0.804[a]	0.646	0.642	0.6931

a. Predictors: (Constant)

Table-8: Result of ANOVA[a]

Model	Sum of Squares	df	Mean Square	F	Sig.
Regression	822.876	10	82.288	171.314	0.000[b]
Residual	451.033	939	0.480		
Total	1273.909	949			

a. Dependent Variable: Turnover Intentions

b. Predictors: (Constant), Trust, Training & Development, Transformation & Diversity, Leadership, Employee wellness, Communication, Performance Management, Rewards & Recognition, Teamwork, Work Environment.

Table-9: Regression Results

Model	Unstandardized Coefficients		Standardized Coefficients	T	Sig.
	B	Std. Error	Beta		
(Constant)	5.425	0.077		70.337	0.000
Trust	-0.153	0.050	-0.128	-3.030	0.003
Training & Development	-0.163	0.056	-0.143	-2.940	0.003
Transformation & Diversity	0.010	0.051	0.009	0.205	0.837
Leadership	-0.053	0.052	-0.051	-1.016	0.310
Employee Wellness	-0.105	0.050	-0.095	-2.080	0.038
Communication	-0.068	0.053	-0.065	-1.273	0.203
Performance Management	-0.297	0.055	-0.263	-5.397	0.000
Rewards & Remuneration	-0.193	0.053	-0.188	-3.619	0.000
Teamwork	0.080	0.053	0.071	1.496	0.135
Work Environment	-0.002	0.055	-0.002	-0.034	0.973

a. Dependent Variable: Turnover Intentions

Regression Equation

$Y = 5.425 – (0.153) X1 – (0.163) X2 - (0.105) X5 – (0.297) X7 – (0.193) X8$

Interpretation and Discussion

Measures of Reliability

The reliability of the both the scales used have been judged through Cronbach's alpha coefficient. The alpha coefficients of reliability show high values signifying the reliability of the data collected

Measures of Association (Chi-Square Analysis)

Chi-Square test of association between all the dimensions of organization climate (10) and turnover intentions of employees shows a test statistic value 'p' (= 0.000).

These values being less than 0.05 at 5% level of significance portrays that there is association organization climate dimensions and turnover intentions. Thus, the Null Hypothesis ($H_{0)}$ is rejected and the Alternate Hypothesis (Ha) is accepted.

Correlation Analysis

- Organizational climate dimension-trust and turnover intentions are strongly and negatively correlated (r = -0.730) at 0.01 level of significance. It indicates that if the members perceive trusting climate they are less likely to quit the organization.
- Training and Development is negatively correlated with turnover intentions (r = 0.750) indicating that that if the members perceive more opportunities for Training and Development then the propensity to leave reduces.
- Organizational climate dimension-transformation and diversity and turnover intentions are strongly and negatively correlated (r = -0.717) at 0.01 level of significance. It indicates that if the members perceive climates which foster Transformation & Diversity, they are less likely to quit the organization
- Leadership is strongly and negatively correlated with turnover intentions (r =-0.742) indicating that if the members perceive better Quality of Leadership and Participative Management style in their organizations, then intentions to quit decreases.
- Organizational climate dimension- employee wellness and turnover intentions are strongly and negatively correlated (r = -0.738) at 0.01 level of significance. It indicates that if the members perceive climate which fosters Employee Wellness, they are less likely to quit the organization.
- Communication is strongly and negatively correlated with turnover intentions (r = -0.746) indicating that that if the members perceive better quality of communication in their organizations, then the propensity to leave reduces.
- Organizational climate dimension- performance management and turnover intentions are strongly and negatively correlated (r = -0.766) at 0.01 level of significance. It indicates that if the members perceive better performance feedback mechanisms, they are less likely to quit the organization.
- Rewards and recognition is strongly and negatively correlated with turnover intentions (r =-0.760) indicating that if the members perceive that their jobs are rewarding and their work is well recognized, then there is less probability of them quitting the organization.
- Team work and turnover intentions are strongly and negatively correlated (r = -0.714) at 0.01 level of significance. It indicates that if the members perceive climates which fosters teamwork then they are less likely to quit the organization
- Work environment is strongly and negatively correlated with turnover intentions (r = -0.739) indicating that if the members perceive that their organizations provide conducive work environment and comfortable work settings, then there is less probability of them quitting the organization.

Regression Analysis

- The results of regression analysis between trust and turnover intentions reveal the unstandardized coefficient B value (-0.873) and the corresponding p value (0.000). The p value being less than the critical value 0.05 indicates that trust is a good predictor of turnover intentions and it negatively impacts turnover intentions.
- The regression analysis between training & development and turnover intentions depicts an unstandardized coefficient B value (-0.857) and the corresponding p-value (0.000). The p-value being less than 0.05 indicates former is a strong predictor of the latter.
- The results of regression analysis between transformation & diversity and turnover intentions reveal unstandardized coefficient B value (-0.807) and the corresponding p-value of 0.00. The p-value being less than 0.05 indicates that transformation & diversity negatively impacts turnover intentions.
- The regression analysis between leadership and turnover intentions depicts an unstandardized coefficient B value (-0.776) and the corresponding p-value of 0.000. The p-value being less than 0.05 indicates that leadership negatively impacts turnover intentions.
- The results of regression analysis between employee wellness and turnover intentions reveal unstandardized coefficient B value (-0.812) and the corresponding p-value (=0.000). The p-value being less than 0.05 indicates that employee wellness is a good predictor of turnover intentions.
- The regression analysis between communication and turnover intentions depicts unstandardized coefficient B value (-0.775) and the corresponding p-value (= 0.000). The value being less than 0.05 indicates that, communication negatively impacts turnover intentions.
- The results of regression analysis between performance management and turnover intentions reveal unstandardized coefficient B value (-0.866) and the corresponding p-value being less than 0.05 indicates that employee wellness is a good predictor of turnover intentions.
- The regression analysis between rewards & recognition and turnover intentions depicts unstandardized coefficient B value (-0.781) and the corresponding p-value of 0.000. The p-value being less than 0.05 specifies that rewards & recognition negatively impacts turnover intentions.
- The results of regression analysis between teamwork and turnover intentions show unstandardized coefficient B value (-0.801) and the corresponding p-value (=0.000). The value being less than 0.05 indicates that teamwork is a good predictor of turnover intentions.
- The results of regression analysis between physical work environment and turnover intentions estimate an unstandardized coefficient B value (-0.770) and the corresponding p-value (=0.000). The p-value being less than 0.05 at 5 per cent level of significance specifies that work environment negatively impacts Turnover intentions.

- Multiple regression analysis between turnover intentions and ten dimensions of organization climate concludes that out of all dimensions of Organization climate, trust, training & development, employee wellness, performance management, rewards & recognition negatively impact turnover intentions and they are much powerful predictors of turnover intentions.

Conclusion

The results establish that the organization climate dimensions are associated with employee turnover intentions. All the dimensions are strongly and negatively correlated with employee turnover intentions. Out of all the dimensions of organization climate, trust, training & development, employee wellness, performance management and rewards have a negative impact on turnover intentions of employees and they are strong predictors of turnover intentions.

Suggestions

Based on the findings of the study the following suggestions are offered to the services sector organizations :

- Trusting Climate negatively influences turnover intentions of employees. Hence, it is important for the managers to build a climate of trust in their organizations. Hiring and promoting people who are capable of forming positive and trusting interpersonal relationships is highly recommended. Consistent behavior on part of functional managers and top management can be a driving force in enhancing trust among employees.
- Open Communication and Transparency plays a significant role in service sector organizations in reducing the turnover intentions of the employees. Enhancing the quality of communication by using multiple channels of communication is highly recommended. Having an open door policy where the employees feel comfortable bringing their concerns to the management would be beneficial.
- Employee Development opportunities negatively impact turnover intentions. Therefore, service sector organizations should prioritize on providing opportunities for employee development. Cross training can be an effective tool to optimize cost and time.
- Transformation & Diversity is a strong predictor of turnover intentions. Hence, organizations should ensure diversity while hiring. Providing diversity training is highly recommended.
- Quality of Leadership has a negative impact on intentions to quit. Therefore, service sector organizations should concentrate on developing the leadership skills among the functional managers. Leadership skills based selection criteria is highly recommended.
- Performance Management and Feedback Mechanisms have a negative impact on turnover intentions of employees, therefore service sector organizations should improve on their performance management systems and feedback mechanisms. Linking performance management to goals of the organization is highly recommended. Performance reviews should focus on results.

- There is a strong negative correlation between employee wellness and turnover intentions, hence service sector organizations should see that their employees are able to balance their life and work, this is more so in case of women and young parents. Work from home options, flexible hours, transport arrangements can serve the purpose to a large extent.
- Team Work has a negative impact on turnover intentions. Therefore, it is important that the practitioners nurture teams in their organizations, for this purpose, organizations should develop team based structures, team based performance appraisals and team based incentive plans.
- There is a strong negative correlation between rewards and recognition and intentions to quit. Therefore, service sector organizations should develop policies and practices which foster employee recognition
- Physical Work Environment impacts turnover intentions. Therefore, practitioners should check and maintain good physical setting and provide ergonomic furniture to their employees, more so in case of employees who are in direct contact with the customers.

References

Barak, Nissley & Levin (2001). Antecedents to Retention and Turnover among Child Welfare, Social Work and Other Human Services Employees: What Can We Learn From Past Research? A Review and Meta-Analysis, *Social Service Review*, 75 (4), pp: 625-638.

Carbery, R., et al., (2003). Predicting Hotel Managers' Turnover Cognitions, *Journal of Managerial Psychology*, 18 (7), pp: 649-679.

Evan, W. M. (1963). Peer-group Interaction and Organizational. Socialization: A Study of Employee Turnover, *American Sociological Review*, 28 (3), pp: 436-44.

Fang, Tony & Verma, A. (2002). Union Wage Premium, *Perspectives on Labour and Income, Ottawa*, 14 (4), pp: 17-23.

Farris, G. F.(1971). A Predictive Study of Turnover, *Personnel Psychology*, 24, pp: 311-328.

Graen, G. B., Liden, R. & Hoel, W. (1982). Role of Leadership in the Employee Withdrawal Process, *Journal of Applied Psychology*, 67 (6), pp: 868-872.

Hinshaw, A. S. & Atwood, J. R. (1984). Anticipated Turnover among Nursing Staff Study, *Final Report, National Institutes of Health, National Center for Nursing*, 34 (6), pp: 21-23.

Jeen Dorance Batty S. (2014).A Study on Attrition-Turnover Intentions in Retail Industry, *International Journal of Business & Administration Research Review,* 1 (3), pp: 55-61.

Lyons, T. (1971). Role Clarity, Need for Clarity, Satisfaction, Tension and Withdrawal, *Organizational Behavior and Human Performance Management*, 14 (6), pp: 981-1000.

Meyer, H. & Cuomo, S. (1962). Who Leaves? A Study of Background Characteristics of Engineers Associated with Turnover, *Behavioral Science*

Research, General Electric Company, Psychological Bulletin, 99, pp: 282-288.

Mobley, W. H. (1982). *Employee Turnover: Causes, Consequences and Control,* Reading, MT: Addison-Wesley.

Pfeffer, J. (1983). Organizational Demography, *Research in Organizational Behavior*, 5, pp: 299-357.

Radzi, S. M. ET AL., (2009). An Empirical Assessment of Hotel Departmental Managers Turnover Intentions: The Impact of Organizational Justice, *International Journal of Business and Management*,4 (8), pp: 173-183.

Shukla Kumar Somesh & Sinha Deepti (2013). A Study of Employee Retention in the Pharmaceuticals Sector in Dehradun City, *International Journal of Education and Psychological Research*, 2 (1), pp: 30-39.

Silverthorne, C. (2004). The Impact of Organizational Culture and Person-Organization Fit on Organizational Commitment and Job Satisfaction in Taiwan, *Leadership & Organization Development Journal*, 25 (7), pp: 592-599.

Telly, C. S., French, W. L. & Scott, W. G. (1971). The Relationship of Inequity to Turnover among Hourly Workers, *Administrative Science Quarterly*, 16, PP:164-172.

Woods, R. H. & Macaulay, J. F. (1989). Rx for Turnover: Retention Programs that Work, *Cornell Hotel and Restaurant Administration Quarterly*, 30 (1), pp: 79-90.

ISSN 2249 - 9040 Volume 9, No 1, January-June 2019 pp. 14-25

Growth and Performance of Small Scale Industries in India: A Comparative Study of Pre and Post MSME Act 2006

Pinky Bains[1]
Shivani Arora[2]

Abstract

Economic development of a country is directly related to the level of industrial growth. The competition has become intense in every field. Nations fight with game plan to sustain their economy by introducing new policies and announcing incentives to support mainly their economic-indicators. The reforms are aimed at making SSI in India more efficient and technologically up-to-date with the purpose to achieve higher and sustainable growth. Therefore, Small Scale Industries (SSI) play a significant role in planned development with its advantages of high potential for employment generation, low investment, diversification of the industrial base, dispersal of industries to rural areas, regional balancing and promotion of entrepreneurship in a developing economy. The present study aims to find the growth performance of small scale industries in India from the period 1990-91 to 2016-17. Further the analysis divides the whole period into sub-periods i.e. pre MSME Act (1990-91 to 2005-06) and Post MSME Act, (2006-07 to 2016-17) with respect to four indicators namely no. of units, production, employment and exports. As per the analysis of yearly growth rates, the double digit growth rate is observed in case of exports in post-MSME period. Instability Index value shows large fluctuations in post-MSME Act with respect to no. of units, production, employment and exports as compared to pre-MSME Act.

Keywords: Employment, Exports, Industry, Production

Introduction

In the developing nations like India, industrialization is essential source of rapid economic development as it is not only the economic growth generator but also helps as a transformer of socio-economic and institutional set-up to the economy. Industrialization in India focused on variety of policies for the development of industries in the public/private sectors. As Small Scale Industries (SSI) play a significant role in planned development with its advantages of high potential for employment generation, low investment, diversification of the industrial

1 Assistant Professor, Khalsa College, Amritsar, Punjab. and can be reached at pinky_gndu@yahoo.co.in

2 Assistant Professor, GNDU College, Verka, Punjab. and can be reached at arora.shivani55@yahoo.com

base, dispersal of industries to rural areas, regional balancing and promotion of entrepreneurship in a developing economy.

In India, the basic objective of economic liberalisation is to improve the productivity growth and competitiveness in industrial sector. These reforms aimed at making SSI in India more efficient and technologically up to date with the motive to achieve higher and sustainable growth.

As on the one hand, the process of liberalization and market reforms has involve to create extensive opportunities for the development of small-scale industries. At the same time changing world scenario has thrown up new challenges to the very existence of the small-scale sector. Therefore, the suitable strength of industrial sector could adapt to beat the environment of competition and to grow excellently. Over the past five decades, Government formulates the policies to protect the concern of the SSI sector in India and facilitate to rapid growth. These formulation and implementation of policies were related to the development of SSI sector through support agencies and various programmes like modernization, technological up gradation, marketing assistance and fiscal incentives etc (Saini and Chaudary, 2015).

Prior to the Economic Reforms of 1991, the focus of SSI development policies was mainly on protection (reservation of items for exclusive production by SSIs) and concessional incentives (such as tax rebates and subsidies). With liberalization 1991, this focus shifted to strengthening the competitive edge and capacity-building through facilitation and infrastructure. Major emphasis was placed on quality certification, technology upgrading, and market exposure with the introduction of new MSME Act 2006, the Govt. has tried to resolve some major issues related to the MSMEs like complicated bureaucratic registration procedures, lack of finance, lack of managerial skills etc. The most important thing the Act has done is to increase the significance of the sector.

The provision of Micro, Small & Medium Enterprises Development (MSMED) Act, 2006 the Micro, Small and Medium Enterprises (MSME) are classified in two Programmes: firstly, Manufacturing Enterprises i.e. employing plant and machinery in the process of value addition to the final product having a distinct name or character or use. This Manufacturing Enterprise is defined in terms of investment in Plant & Machinery. Secondly, service Enterprises i.e the enterprises engaged in providing or rendering of services and are defined in terms of investment in equipment ((Shaik, 2017).

Review of Literature

In literature there are so many studies available related to small scale industries in the context of India and others countries. Some of the studies show the importance of SSI, while other studies show the growth performance of SSI during pre-liberalization and post-liberalization. However it may note that recent studies show the impact of Micro, Small & Medium Enterprises (MSMES) Act implemented in 2006 in India. Most of the studies counted major four factors of industrial growth that are employment, number of units, exports and production. Subrahmanya Bala (2004) highlighted the impact of globalization and domestic reforms on small-scale industries sector. The study stated that small scale industries had suffered in terms of growth of units, employment, output and exports. The study also suggested the technology development and strengthening of financial infrastructure to grow SSI internationally competitive. Another study conducted by Rathod (2007) described the importance of small scale industrial sector and also the contribution of Indian small scale entrepreneurs in world economy. The study concluded that export had grown up to double digit from the last ten years. The study also suggested the need for simplified legal and regulatory framework, good governance, sufficient and accessible finance, suitable infrastructure and competitive environment to grow SSI in India. Bargal et al. (2009) examined the causal relationship among the three variables GDP, SSI output and SSI exports and compared the performance parameters of SSIs in the pre and post liberalization era. The study found that the CAGR (compound average growth rate) of different parameters of SSIs have declined in the period of pre-reform, however the increased trend has been observed in post reform period. Sonia and kansal (2009) also analysed the globalization impact on small scale industry in India for the period 1973 to 2007. The study concluded that the growth of number of units is too much increased, while the growth rate of production has declined at a high rate in 1990-91. It showed the negative trend of growth and reached at -40.44 percent growth rate of production. In the initial year of globalization the growth rate of employment has been increased which showed that after globalization employment opportunities were increased. In 2005-06, the value of exports was too much increased and the growth rate of exports was highest in 1991-92 due to subsequent change in Indian economy. The study conducted by Asra and Prasad (2011) the Impact of reforms on growth, employment, exports and sickness of small scale industries for the period 1982-83 to 1989-90 (pre-reforms) and 1990-91 to 2001-02 (post reform period). They suggested that process of economic reforms significantly influenced by the policy frame of SSI sector. Another study related to SSI by Dixit and Pandey (2011) used cointegration analysis to examine the causal relationship among SMEs output, exports, employment, number of SMEs and their fixed investment and India's GDP, total exports and employment (public and private) for the period 1973-74 to 2006-07. Their study revealed the positive causality between SMEs output and India's GDP. Singh et al. (2012) analyzed the performance of Small scale industry in India during the period 1990-91 to 2007-08. The study revealed that after economic reforms industrial sector has made good progress in terms of number of SSI units, production & employment levels. The study suggested the emergence of technology development and strengthening of financial infrastructure to boost SSI. Garg & Walia (2014) analysed the growth & performance of micro, small & medium enterprises (MSMES) in Indian economy from the Period 2001-02 To 2010-11. The study stated the significant growth of MSMEs over a period of time and also showed that industrial sector had major contributor to gross domestic product (GDP), employment and exports in Indian economy. Patil and chaudary (2014) also examined the growth and performance of small scale industries with problems of small scale industries from the period 2001-02 to 2010-11. The study concluded that the promotion of SSI is essential in India in order to achieve equitable distribution of income & wealth, economic self-dependence & entrepreneurial development. Chaudary (2014) analysed the impact of globalization on small scale industry in the context of India from the period 1994-95 to 2010-11. The result has shown a fall in the rate of growth of number of units and employment generation in post liberalisation, therefore globalisation is almost a complete failure on growth front of this sector. Rao and kiran (2014) also analysed the growth performance of small scale industry in India for 2001-02 to 2011-12. The study concluded that the average number of units registered were 222.45. The increase in average investment was 470787.18 and Sector had produced an amount of 1834332 crores by 2011-2012. The average employment provided by this sector is 2446.6 Lakh. The export potential of the Sector was 10.67 percent by 2007-2008. A recent study done by Singh & Singh (2017) related to causality between Economic Growth (gross output) and Exports (EXP) by small scale industries in India during the period 1991-2014 after economic reforms era. Granger Causality results found unidirectional causality between gross output and exports. The Vector auto regression (VAR) model has explained that there is a strong cause and effect relationship between the variables. The recent study conducted by Golla (2018) about growth and performance of Micro Small and Medium Enterprises in India before (1991-92 till 2005-06) and after MSMED Act 2006 (2006-07 till 2014-15). The analysis revealed that MSMED Act, 2006 has had a positive impact on the growth of small industries and has benefited this sector with various facilities under the Act (2006 onwards).

Objectives of the Study

- To study the concept of SSI with the reference to MSME Act, 2006
- To analyze the growth performance of small scale industry in India with the help of selected indicators (for the period pre and post-MSME Act, 2006).
- To analyze the Instability index of selected indicators with respect to SSI in India.

Database and Methodology

Data used in the study is secondary in nature and collected from Ministry of Micro, Small & Medium Enterprises, Government of India (2017). The study covers a period from 1990-91 to 2016-17. However the whole analysis of the study divides whole study in two sub-periods (i.e. pre MSME Act and Post MSME Act, 2006) and whole period (1990-91 to 2016-17) with respect to four indicators namely no. of units, production, employment and exports.

Compound Annual Growth Rates (CAGR)

In order to study the growth pattern of employment of public and private organised sector of India the compound growth rates have been calculated for the period 1991 to 2017 and sub periods wise. The growth rates have been calculated by fitting the exponential function as shown below:

Yt = abteu

Transforming the equation in linear form

Log Yt = log a + t log b + U log e

Where, Yt = value of total organised sector in year t

t = trend variable

u = disturbance term

a, b are constants.

From the estimated values of regression co-efficient ‘b’ the compound rate of growth ‘r’ was calculated as follows:

$$r = (\text{antilog } \hat{b} - 1) \times 100$$

Where, $\hat{b}$ = estimated value of b.

Instability Index

Coppock (1962) measure of instability index is based on log-variance. This index of instability is defined as:

Instability Index = antilog [(V log)1/2]

Where Vlog is

$$\sum_{t=1}^{n-1}\left[\log\left(\frac{X_{t+1}}{X_t}\right)-m\right]^2/(n-1)$$

$$\sum_{t=1}^{n-1}\left[\log\left(\frac{X_{t+1}}{X_t}\right)\right]/(n-1)$$

Here, Xt is observed value of no. of units, employment, production and exports of SSI in India for the time period t (pre and post-MSME Act and overall period), n stands for number of years in the series of data used for analysis.

Empirical Analysis

The small scale industries play a significant role in boosting the overall economic growth of an economy. The importance of SSI sector in providing large scale employment is of paramount importance. The policy framework right from the first plan has highlighted the need for the development of SSI sector keeping in view its strategic importance in the overall economic development of India. An analysis of the study divides whole period in two sub-periods (i.e. pre-MSME Act and Post-MSME Act, 2006) as well as whole period (1990-91 to 2016-17) with respect to four indicators namely no. of units, production, employment and exports.

Table-1 shows the growth and performance of small-scale industries during the period 1990-91 to 2005-06. The growth performance is based on number of units, production, employment and exports of SSI in the context of India.

Table-1: Growth Performance of SSI (before MSME Act, 2006)

Year	Units (Millions)	Percentage	Production (Billions)	Percentage	Employment (Millions)	Percentage	Exports (Billions)	Percentage
1990-91	6.79	---	788.02	---	15.83	---	96.64	---
1991-92	7.06	3.98	806.15	2.3	16.60	4.86	138.83	43.66
1992-93	7.35	4.11	844.13	4.71	17.48	5.3	177.84	28.1
1993-94	7.65	4.08	987.96	17.04	18.26	4.46	253.07	42.3
1994-95	7.96	4.05	1221.54	23.64	19.14	4.82	290.68	14.86
1995-96	8.28	4.02	1477.12	20.92	19.79	3.4	364.70	25.46
1996-97	8.62	4.11	1678.05	13.6	20.59	4.04	392.48	7.62
1997-98	8.97	4.06	1872.17	11.57	21.32	3.55	444.42	13.23
1998-99	9.34	4.12	2104.54	12.41	22.06	3.47	489.79	10.21
1999-00	9.72	4.07	2337.60	11.07	22.91	3.85	542.00	10.66
2000-01	10.11	4.01	2612.97	11.78	24.09	5.15	697.97	28.78
2001-02	10.52	4.06	2822.70	8.03	24.93	3.49	712.44	2.07
2002-03	10.95	4.09	3148.50	11.54	26.02	4.37	860.13	20.73
2003-04	11.40	4.11	3645.47	15.78	27.14	4.3	976.44	13.52
2004-05	11.86	4.04	4297.96	17.9	28.26	4.13	1244.17	27.42
2005-06	12.34	4.05	4978.42	15.83	29.49	4.35	1502.42	20.76
CAGR		4.07		13.67		4.08		16.51

Source: Ministry of Micro, Small & Medium Enterprises, Government of India (2017).

As per the Table-1 the number of small-scale units increased from 6.79 million units to 12.34 million units during 1990-91 to 2005-06. It indicates that the SSI has made progress during the period of study. The compound growth rate for number of small-scale industrial units has been 4.07 Percent from 1991-92 to 2005-06. The production of small-scale industries in 1990-91 was Rs.788.02 billion and this increased considerably to Rs. 4978.42 billion in 2005-06. The compound growth rate for the production of small-scale industries during 1990-91 to 2005-2006 was 13.67 percent. Yearly growth rate of production has experienced double digit growth rate except the years 1991-92 (2.3 percent), 1992-93 (4.71 percent) and 2001-02 (8.03 percent). The small-scale industries employed only 15.83 million people in 1990-91, which increased to 29.49 millions in 2005-06. While the compound annual growth rate (CAGR) for employment of small-scale industries has been recorded as 4.08 Percent from 1990-91 to 2005-06. The Exports of Small-Scale Industries in 1990-91 was Rs. 96.64 billions which increased to Rs. 1502.04 billions in 1990-91. This period registered a compound growth rate of 16.51 percent. Whereas the yearly growth rate of exports has experienced double digit growth rates in all years except 1996-97 (7.62 percent) and 2001-02 (2.07 percent). The figures from 1 to 4 shows the annual growth rate for the pre-MSME act, 2006 with respect to four indicators i.e. number of units, production, employment and exports of SSI in India.

Figure-1: No. of units of SSI
(Pre MSME Act, 2006)

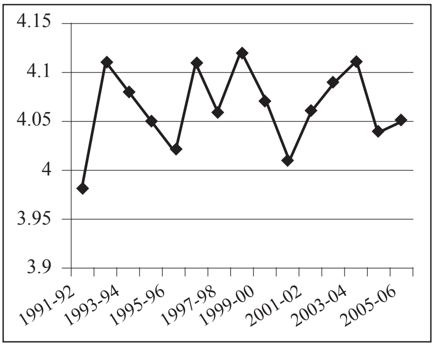


Figure-2: Production of SSI
(Pre MSME Act, 2006)

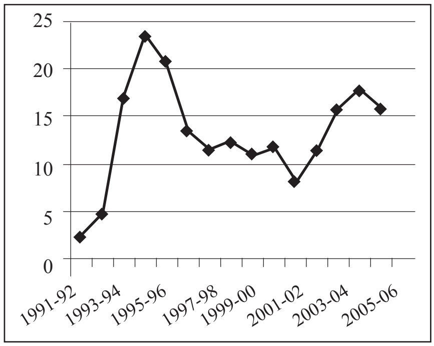


Figure-3: Employment of SSI
(Pre MSME Act, 2006)

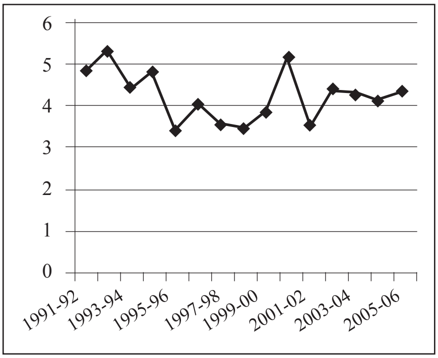
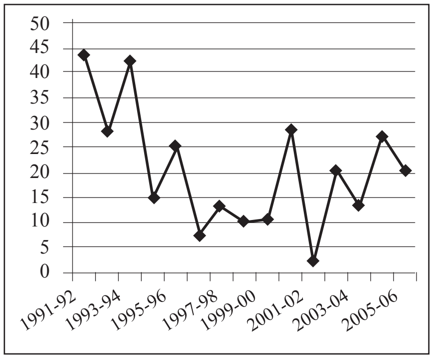


Figure-4: Exports of SSI
(Pre MSME Act, 2006)



Growth and Performance of SSI post-MSME Act, 2006

The performance of small-scale industries during post-MSMEs Act is listed in Table-2. It may be noted that that the performance of SSI in India boost extremely in the beginning year of MSME Act, 2006. This is because of two reasons one of them is that data from 2006-07 includes activities of wholesale/retail trade, legal, education & social services, hotel & restaurants, transports and storage & warehousing (except cold storage) for which data was extracted from Economic Census 2005, Central Statistics Office, MOSPI. Second reason for increasing performance of industrial sector is MSME Act, 2006 implementation in India, which is in the favor of progress of small scale industries.

Table-2: Growth Performance of SSI (Post MSME Act, 2006)

Year	Units (Millions)	Percentage	Production (Billions)	Percentage	Employment (Millions)	Percentage	Exports (Billions)	Percentage
2006-07	36.18	193.19	13513.83	171.45	80.52	173.04	1825.38	21.0
2007-08	37.74	4.31	14351.79	6.2	84.20	4.57	2020.17	10.7
2008-09	39.37	4.32	15242.35	6.21	88.08	4.61	2965.88	46.1
2009-10	41.08	4.34	16193.56	6.24	92.18	4.65	3911.59	31.9
2010-11	42.87	4.36	17215.53	6.31	96.52	4.71	5077.39	29.8
2011-12	44.76	4.41	18343.32	6.55	101.17	4.82	6301.05	24.1
2012-13	46.75	4.45	18965.87	3.39	106.14	4.91	6981.66	10.8
2013-14	48.86	4.51	19765.67	4.22	111.43	4.98	8068.78	15.7
2014-15	51.06	4.50	19987.73	1.12	117.13	5.12	8492.48	5.25
2015-16	52.09	2.02	20764.89	3.89	118.23	0.94	8553.52	0.72
2016-17	53.76	3.21	21876.09	5.35	118.98	0.63	8675.89	1.43
CAGR(%)		4.16		4.84		4.31		18.30

Source: Ministry of Micro, Small & Medium Enterprises, Government of India (2017)

The above Table-2 shows the performance of SSI after MSME ACT, 2006 for no. of units, production, employment and exports. The table shows that the number of small-scale units increased from 36.18 millions to 53.76 millions during 2006-07 to 2016-17. The compound annual growth rate for number of small-scale industrial units has been 4.16 percent from 2006-07 to 2016-17. As per the value of production, the compound growth rate during the post-MSME Act (2006-2017) period was 4.84 percent. The Production of small-scale industries during this period increased from Rs.13513.83 in 2006-07 to Rs. 21876.09 in 2016-17. Number of employees engaged in small scale sector recorded to be 80.52 million in 2006-07, which increased but at less rate to 118.98 millions in 2016-17. During post-MSME Act, 2006 period small-scale sector recorded 4.31 percent compound growth rate in employment. Export from small-scale industries in 2006-07 was Rs. 1825.38 billions, which increased to 8675.89 billions in 2016-17. The small-scale sector registered compound growth rate of 18.30 percent during 2006-07 to 2016-17. The figures from 5 to 8 shows the compound annual growth rate after MSME act, 2006 of four indicators with respect to no. of units, production, employment and exports of SSI in India.

Figure-5: No. of units of SSI (post MSME Act, 2006)

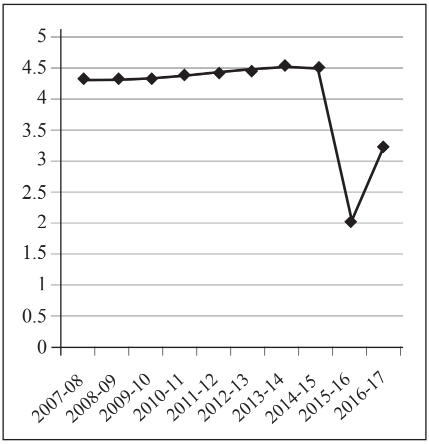


Figure-6: Production of SSI (post MSME Act, 2006)

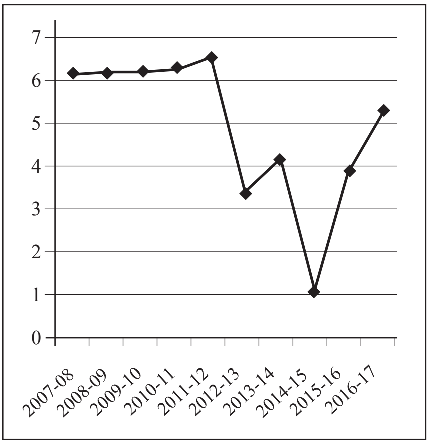


Figure-7: Employment of SSI (post MSME Act, 2006)

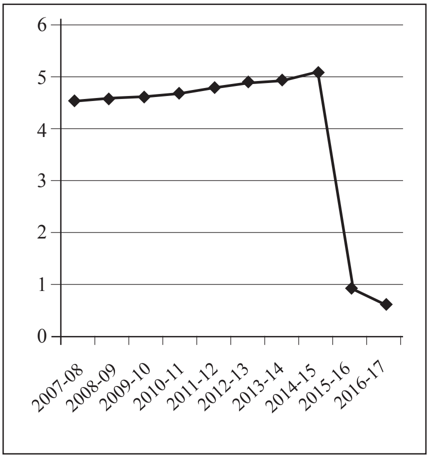


Figure-8: Exports of SSI (post MSME Act, 2006)

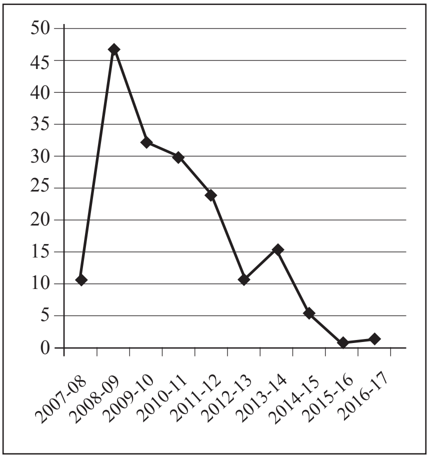


Table-3: Average Annual Growth Rate for sub periods as well as overall period (percentage)

Years	Units	Production	Employment	Exports
1991-92 to 1994-95	4.06	11.41	4.87	32.35
1996-96 to 2000-01	4.09	12.13	3.68	10.67
2001-02 to 2005-06	4.08	13.33	4.13	15.85
2006-07 to 2010-11	28.27	28.14	26.73	27.11
2011-12 to 2016-17	4.51	2.66	5.05	10.29
1991-91 to 2005-06 (Pre-MSME)	4.07	13.67	4.08	16.51
2006-07 to 2016-17 (Post-MSME)	4.16	4.84	4.31	18.30
1991-92 to 2016-17 (overall)	10.40	16.27	10.07	18.85

Source: CAGR based on Tables 5.1 and 5.2.

Table-3 shows that Compound Annual Growth Rate (CAGR) has been considered as statistical measure to compare performance of small scale industries during sub periods as well as overall period. CAGR in respect of No of units of Small scale industries, Employment and Export is mildly higher in Post MSME Act period compared to Pre MSME Act period. But the growth rate is not satisfactory. The table also shows that the small sector has been growing, even in the face of growing competition, internally and globally, and decreasing protection levels. Inclusion of service sector like wholesale/retail trade, legal, education & social services, hotel & restaurants, transports and storage & warehousing (except cold storage) and medium enterprises and merging them with SSI sector were some of the major results of the this change. Sub period wise CAGR of four factors of performance shows double digit growth rate in 2006-07 to 2010-11 as data includes activities of wholesale/retail trade, legal, education & social services, hotel & restaurants, transports and storage & warehousing. In case of exports of SSI have double digit growth rate for all the sub periods, while employment and no. of units are growing at lower rate in the concerned study period.

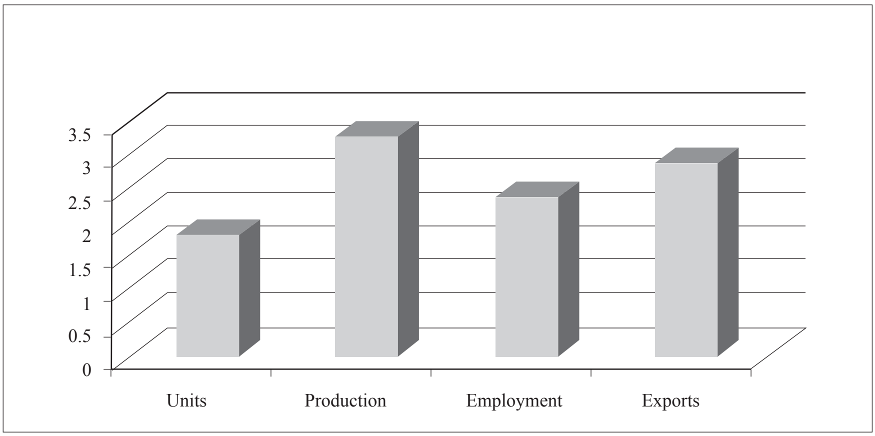
Table-4: Instability Analysis of four indicators of SSI (Pre and Post-MSME, 2006

Years	Units	Production	Employment	Exports
1991-92 to 2016-17 (Overall)	1.80	3.26	2.37	2.86
1991-91 to 2005-06 (Pre MSME Act)	1.19	2.60	1.22	2.29
2006-07 to 2016-17 (Post MSME Act)	2.33	3.80	3.59	3.76

Source: based on Coppock Measure of Instability.

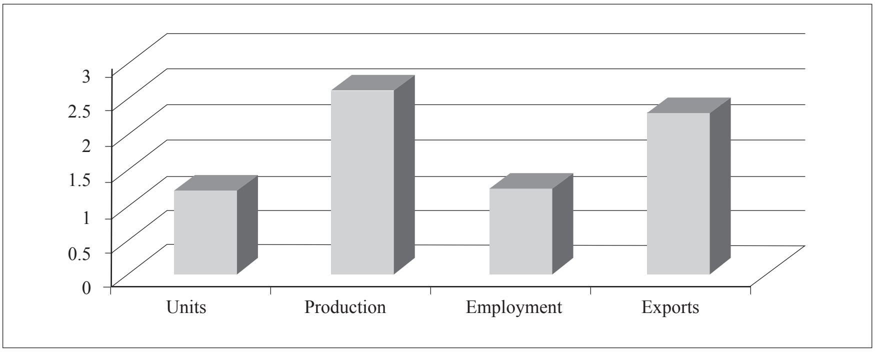
Instability Index value shows large fluctuations in post-MSME Act with respect to units (2.33 percent), production (3.80 percent), employment (3.59 per cent) and exports (3.76 per cent) as compared to pre MSME Act (as shown in the Table-4). While the overall period i.e. 1991-92 to 2016-17, the instability values are observed to be 1.80 percent for no. of units, 3.26 per cent for production, 2.37 per cent for employment and 2.86 per cent for exports in the study. The figures from 9 to 11 show the instability trend of all the four indicators of SSI for respective periods.

Figure-9: Instability Analysis (1990-91 to 2016-17)



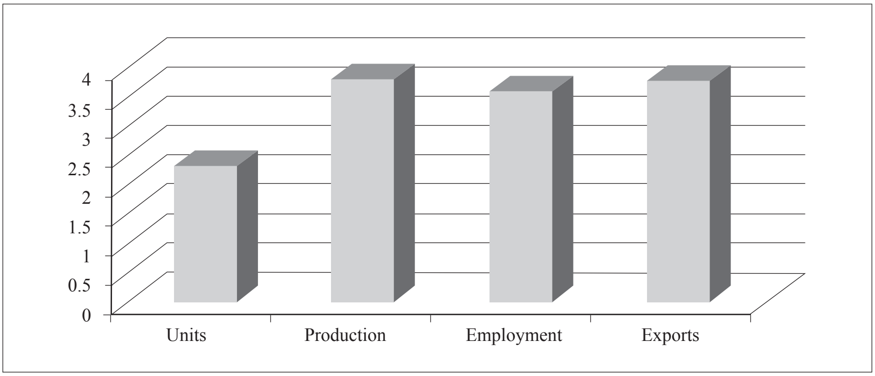
Source: based on table 1 and 2

Figure-10: Instability Analysis (Pre-MSME Act, 2006)



Source: based on Table-1

Figure-11: Instability Analysis (Post-MSME Act, 2006)



Source: based on Table-2

Conclusion

The Micro, Small & Medium enterprises (MSMEs) has often been termed as ngine of growth for all developing economies including India. In this regard, Ex-Prime Minister Dr. Manmohan Singh stated, "the key to our success in employment lies in the success of manufacturing in the small scale sector" (Garg and walia, 2014). The experiences of recent years, employment in agriculture sector has been declining as well as large industries are also experiencing jobless growth. In such a situation, the main concern for job creation on unorganized sector including small and medium enterprises and the service sector. Therefore, the present study concentrates to explore the growth performance of small scale industries in India for the period 1990-91 to 2016-17. Further the analysis divides the whole period into sub-periods i.e. pre MSME Act (1990-91 to 2005-06) and Post MSME Act, (2006-07 to 2016-17) with respect to four indicators namely no. of units, production, employment and exports. As per the analysis of yearly growth rates, the double digit growth rate is observed in case of exports in post-MSME period. Instability Index value shows large fluctuations in post-MSME Act with respect to units (2.33 per cent), production (3.80 per cent), employment (3.59 per cent) and exports (3.76 per cent) as compared to pre-MSME Act. The present study recommended that proper care should be taken care of human resources issues which depend upon the quality of HR. Training & development provisions should be followed by the SSI in order to proper functioning. Proper tax benefits should be given to SSI to maintain their standing in the globalized market. To generate more employment opportunities special attention should be given on the development of SSI by the government. They should also promote SSI, financial & technical assistance for smooth functioning of SSI.

References

Asra, S. & Prasad, K.D. (2011). Impact of Economic Reforms on Small Scale Industries in India, *International Journal of Business Management, Economics And Information Technology*, 3(2), pp: 317-321.

Balasubrahmanya, N. (2011). Small-Scale Industry Development for Export Promotion: India's Experience under Liberalization, *Micro and Small Enterprises in India: Era of Reforms,* pp: 46-66.

Bargal, H., Dashmishra, M. & Sharma, A. (2009), Performance Analysis of Small Scale Industries - A Study of Pre-liberalization and Post-liberalization period, *International Journal of Business and Management*, 1(2).

Chaudhary, G.(2014). Globalisation and its impact on SSI in India, *International Journal of Emerging Research in Management & Technology,* 3(3), pp:2278-9359.

Dixit, A. & Pandey, A.K. (2011).SMEs and Economic Growth in India: Cointegration Analysis, *The IUP Journal of Financial Economics*, 9(2), pp: 41-59.

Garg, I. & Walia. N. (2014). Growth & Performance of Micro, Small & Medium Enterprises (MSMEs) In Indian Economy, *IJRIM*, 4(8), pp: 36-47.

Golla, S.K.(2018).Growth and Performance of Micro Small and Medium Enterprises in India after MSMED Act 2006, *International Journal of Research in Management, Economics and Commerce*, 8(1), pp: 52-59.

Patil S.G. & Chaudary P.T. (2014). Problems of Small Scale Industries in India, *International Journal of Engineering and Management Research*, 4(2), pp: 19-21.

Rao, U.M. & Kiran, G.K. (2014).Performance of Small Scale Industries in India, *International Journal of Academic Research*, 1(1), pp: 39-48.

Rathod, C. B. (2007). Contribution of Indian Small Scale Entrepreneurs to Economic Growth in India: Opportunities and Challenges in Global Economy, *Prabandh Journal of Management & Research*, 23, pp: 1-12.

Saini, A. & Chaudary, M. (2015). Globalization and Its Impact on the Performance of Small-Scale Industries in India, *International Journal of Trade & Commerce-IIARTC ,* 4(1), pp:160-171.

Shaik, M. et al., (2017). Performance of MSMEs Sector in India, *SSRG International Journal of Economics and Management Studies (SSRG-IJEMS),* 4(3)**,** pp: 11-15.

Singh, R., Verma, O.P. & Anjum, B.(2012). Small Scale Industry: An Engine of Growth, *ZENITH International Journal of Business Economics & Management Research*, 2(5), pp: 210-221.

Singh, S. & Singh, D. (2017).Small Scale Industries and Economic Growth: Empirical Evidence from India During Post Economic Reforms Era, *Shanlax International Journal of Economics*, 6 (1), pp: 94-102.

Sonia & Kansal, R.(2009). Globalization and Its Impact on Small Scale Industries in India, *PCMA Journal of Business*, 1(2), pp: 135-146.

ISSN 2249 - 9040 Volume 9, No 1, January-June 2019 pp. 26-36

Maturity Levels in Implementing S&OP Process – A Study of Indian Auto Component Manufacturers

Gopaldas Pawan Kumar*

Abstract

Sales and Operations Planning (S&OP) improves the linkage between supply and demand functions. It is monthly iterative, collaborative and cross-functional process undertaken with the aim of arriving at a single operating plan to guide all business functions leading to maximum resource utilization and maintenance of desired levels of customer service, inventory levels, and production plans. A maturity model is a tool that helps the firms to assess the current status of a process against a benchmark and facilitates acquisition of capabilities to bridge the gap. A study was undertaken to find out the intensity of adoption of critical activities of S&OP process by Indian auto component manufacturers' (ACMs) who are dedicated suppliers to vehicle manufacturers' in India. In order to study the status of each ACM, a maturity level model based on four phases of S&OP comprising Demand Management, Supply Management, Pre-meeting and Final S&OP Meeting was developed to rank and categorise the companies. The findings of the survey suggest that most of the ACMs, in spite of not being aware of the framework are following processes of S&OP as per their own plans and consequently are found to be operating at sub-optimal level and below of the maturity model.

Keywords: Auto Component, Demand, Maturity Level, Supply, S&OP

Introduction

One of the major purposes of S&OP process is to balance supply with demand. It is considered as an offshoot of supply chain management and is distinguished by a single forecast managed by a cross-functional team with the primary aim of aligning business and operation strategy for reaching organizational goals. In the current business scenario of changing customer requirements and the onslaught of disruptive technologies there is tremendous pressure on the organizations to sustain their profitability. It may be noted that the process efficiency of S&OP relates to how well the S&OP process is managed in terms of procedures, organization and resource utilization. As such, it is rightly alluded to as "top management's handle on the business". The traditional S&OP process comprises Data collection, Demand Management, Supply Management, Preliminary Meeting and Executive

* Vice Principal, David Memorial Institute of Management and can be reached at gdpawan@gmail.com

S&OP Meeting (Wallace and Stahl, 2008). The success of S&OP implementation is in complying with the processes and procedures at each stage.

Auto component manufacturers (ACMs) supply parts/ components and sub-assemblies to original equipment manufacturers (OEMs) comprising passenger cars, commercial vehicles, 2 / 3-wheelers and tractors. The importance of this industry comes from the enormous economic dividend it provides to Indian economy.

S&OP process measurement and control is important for improvement of the process and is an effective way to measure the evolutionary stage of the S&OP process in an organisation (Pedroso *et al,* 2017). A maturity model helps firms to assess the current effectiveness of a process and facilitates acquisition of capabilities to improve the performance. It is structured as a series of critical activities which assess an organisation's maturity level and also used as a metric for comparison of different organizations in the same industry (Fowler, 2014). For ascertaining the maturity levels of the respondent firms in terms of S&OP, several maturity models have been proposed by researchers, practitioners and consulting firms each assessing the maturity levels of the companies on different dimensions.

Literature Review

S&OP process is a long-term planning tool that synchronises various functional plans (sales, marketing, production and financial plans, new products development and sourcing) into an integrated set of tactical plans to meet organizational goals (Lapide, 2004a; Grimson and Pyke, 2007). One of the goals of the S&OP process is to balance supply with demand and to provide early signals of potential imbalances (Wallace & Stahl, 2008; Thomé et al., 2012a). It traditionally consists of five major stages – data gathering, demand planning, supply planning, pre-meeting, and an executive S&OP meeting (Grimson and Pyke, 2007, Wallace and Stahl, 2008). A typical S&OP model consists of following stages with a short list of critical activities.

- Data Collection Stage: Data on sales, production, inventory from plants and warehouses is collected. Other important data includes sales analysis, statistical forecast reports, trend information, monthly reports etc.
- Demand Planning Stage: First-cut management forecast in units and rupees for next 15 to 18 months is worked out along with the list of assumptions made. Information on new product development, competitors' activity and prevalent economic scenario is considered.
- Supply Planning Stage: At this stage resource requirements plan, capacity constraints, vendor, raw material and supply issues etc are looked into and sorted out.
- Pre-meeting Stage: Decisions on balancing demand / supply, recommendations, what- if scenarios, agenda for the next stage meeting for executive decisions are taken within the boundaries of annual business plan.
- Final S&OP Meeting Stage: This is held at the CEO level. Decisions of previous stage are reviewed; changes authorised and adjusted with business plan. KPIs (key performance indicators) pertaining to operational and financial parameters are tracked against targets.

To understand the status of S&OP adoption in an organization, a maturity model approach is usually undertaken. It is reported that the first maturity model originated at US Air Force which funded a project at Carnegie-Mellon's Software Engineering Institute in 1989 to manage and evaluate software process at its vendors end which later became popular as capability maturity model (CMM) having five evolutionary stages: initial, repeatable, defined, managed and optimizing. Later, it was adapted in various industries to assess the success of the implementation of stage-wise critical processes.

Various authors have proposed maturity models with different dimensions and metrics. Recently, a fuzzy theory based model which employs a quantitative model that enables quantifying qualitative, imprecise, and vague information was proposed by Pedroso *et al* (2017) to assess and to categorize different S&OP maturity levels.

Table-1 provides a list of maturity models with each having emphasis on different parameters.

Table-1: Overview of S&OP Stages in Different Maturity Models

S. No.	Reference	No. of Stages	Brief description of the Stages
1	Wing and Perry (2001)	3	(i) Integrated planning solution (ii) collaboration with trade partners and (iii) network hub solutions. All integrated with information technology (IT).
2	Lapide (2005)	4	(i) Marginal (ii) rudimentary (iii) classic (iv) ideal. Each company under study is assessed on three dimensions consisting a) composition of meetings b) processes followed c) enabling technologies adopted.
3	Ventana Research (2006)	4	(i) Tactical planning focuses on balancing supply and demand (ii) advanced formal planning and review meetings instituted (iii) strategic company uses S&OP to align operational planning with corporate strategic objectives and (iv) innovative stage at which full maturity is reached when performance management and incentives are aligned with the S&OP process.
4	Grimson and Pyke (2007)	5	(i) No S&OP process (ii) reactive (iii) standard (iv) advanced and (v) proactive. Dimensions are: Meetings and Collaborations, Organisation, Measurements, Information Technology and S&OP Plan Integration.
5	Feng *et al* (2008)	3	(i) Decoupled plans – sales, production, distribution and procurement plans are decoupled (ii) partially integrated plans – sales and production plans are integrated. Distribution and procurement plans are decoupled (iii) integrated plans – S&OP process is integrated throughout the supply chain.
6	Vishwanathan (2009) - Aberdeen Maturity Model	3	(i) Best in class (top 20%) (ii) average (mid 50%) and (iii) laggards (bottom 30%). The three metrics used – customer service level, average cash conversion cycle and average forecast accuracy at the product family level.

S. No.	Reference	No. of Stages	Brief description of the Stages
7	Cacere *et al*(2009)- AMR Research model	4	(i) Reactive – Production prevails over sales, metrics are fill rates, asset utilisation, and inventory levels (ii) anticipative- goal is to match supply and demand, marketing and factory capability are integrated into S&OP (iii) collaborative stage composed of demand-driven, make and deliver processes and (iv) orchestrate involves optimised demand shaping plan. Metrics are demand risk, customer services, cash flow, market share, and profit.
8	Pedroso *et al*(2017)		(i) Process effectiveness and its sub-dimensions are: degree of formalization, scope, and collaboration and alignment (ii) process efficiency and its sub-dimensions: information preparation and sharing, meeting efficiency and KPI measurement; (iii) people and organization, its sub-dimensions: roles, responsibility and organizational structure; and knowledge, commitment, and executive sponsorship; (iv) and information technology; systems and functionalities, degree of integration and master data..

Source: Author's updated table from "Sales and operations planning: a research synthesis", Thomé, A.M.T., Scavarda, L.F., Fernandez, N.S., Scavarda, A.J.,(2012b), Int. J. Prod. Econ. 138 (1), 1–13.

Lapide Maturity Model

In order to have a comprehensive understanding of a typical maturity model, Lapide's (2005), an S&OP process maturity model is illustrated below in Figure-1 which has four stages with three dimensions consisting of meetings, processes and technology.

Figure-1: A Four-Stage S&OP Process Maturity Model

Stage 1: Marginal Process	Stage 2: Rudimentary Process	Stage 3: Classic Process	Stage 4: Ideal Process
Informal Meetings - Sporadic scheduling	**Formal meetings** - Routine schedule - Spotty attendance and participation	**Formal meetings** - 100% attendance and participation	**Event-driven meetings** - Scheduled to address changes or supply-demand imbalances
Disjointed Processes - Separate, misaligned plans	**Interfaced processes** - Demand plans reconciled - Supply plans aligned to demand plans	**Integrated processes** - Demand and supply plans jointly aligned - Collaboration with limited number of suppliers and customers	**Extended processes** - Demand and supply plans aligned internally and externally - External collaboration with all important suppliers & customers
Minimal Technology - Multitude of spreadsheets	**Interfaced applications** - Demand planning and multi-facility APS systems interfaced on a one-way basis	**Integrated applications** - Integrated demand and supply planning packages - External information brought in manually	**Full set of integrated technologies** - Advanced S&OP workbench - External facing collaborative software integrated with internal systems
Traditional Measures - Many metrics, function specific. outcomes only	**Interfaced Measures** - Consolidated set of metrics - Cross-functional awareness	**Integrated Measures** - Functional and aligned metrics approved by team - SOP process scorecard	**Ideal Measures** - Profit-based metrics - Measures of strategic initiative attainment
Lagging Performance - Lagging in most dimensions	**Matching Performance** - On par with industry averages	**Few Bright Spots** - Leading in one or two areas	**Industry Leader** -Setting the bar in service, turns, margins

Source: "Sales and Operations Planning Part III- A diagnostic Tool", Larry Lapide, "Journal of Business Forecasting", 2005.

Pedrosa *et al* (2017) found that the commonly used dimensions in majority of the S&OP maturity models are "Integrated Planning", "Technology", "Meetings" and "Processes" with no general agreement about which metrics are to be used to evaluate S&OP process properly. Each author has considered few measures as drivers of the S&OP maturity model related to demand, supply and other areas. Table-2 lists out the same, author-wise to understand few of the approaches.

Table-2: Demand, Supply and Other Related Measures

Demand Related	Supply Related	Other Measures	Author
Forecast accuracy, NPD cycle time	Capacity utilisation	Company profitability, accountability for measures	Grimson and Pyke (2007)
Expected Responses to promotions	Customer order backlogs, inventory levels (plan vs actual), capacity utilization.		Wagner *et al* (2014)
Adherence to sales and marketing plans	Adherence to operations plans	Baseline Forecast Vs budget	Lapide (2004,2005)
Quality of data for demand planning		Cross functional integration of plans, supply and demand planning in balance, actual performance Vs S&OP metrics	Bower(2005)
	Production, distribution costs, production lead time	Total Sales Vs demand	Milliken(2008)
		Customer service Vs inventory	Thome *et al* (2012 b)
	Delivery reliability, lead time, delivery variance		Godsell *et al* (2010)
	Inventory levels, supplier lead time, fill rate, delivery variance		Chae(2009)

Source: Adapted from Hana Hulthén Dag Näslund Andreas Norrman, (2016)," Framework for measuring performance of the sales and operations planning process ", International Journal of Physical Distribution & Logistics Management.

Importance of the Study

A volatile, uncertain, complex and ambiguous (VUCA) market creates demand and supply gaps, inventory imbalances, and cash flow problems. Automobile market also faces a similar situation every year and ACMs face a part of the strain. During 2017-18, auto industry has produced around 25.93 million vehicles covering PC/MUV, CV, 2/3W and tractors with a turnover of Rs 3,45,635 Cr (ACMA, 2018) with around 2.3% contribution to GDP. Its impact is very high on Indian economy; hence, any perceptible improvement in performance in terms of cost, customer service and profits is desirable.

Objective of the Study

To explore S&OP maturity level of Indian ACMs based on the total score obtained in terms of compliance to S&OP processes, on the basis of four stages comprising Demand Management, Supply Management, Pre-meeting stage and Final S&OP Meeting and rank them accordingly. It is an attempt to find out how ACMs, in spite of all of them not being aware of S&OP are following some of the processes to meet customer expectations.

Methodology

The study is based on primary and secondary data. The population for the study comprised all the major auto component companies at Tier-1 level registered in India, numbering around 250 serving passenger cars/ multi-utility vehicles, commercial vehicles, 2 wheelers, 3 wheelers and tractors.

The primary data is collected through questionnaire from executives at the highest level - CEO, Director, VP, GM, and Plant head and was designed to capture the compliance levels from the responses on S&OP processes and practices as in Table-3.

Table-3: Measures for Ranking ACMs on Maturity Level at Each Stage

Demand Planning Stage (DM)	Regularity of updating of demand planning, period of demand planning, departments involved in preparing demand plan and inputs for demand plan, forecast variance.
Supply Planning Stage(SM)	Bases of supply plan, aim, origin of supplies to OEMs, inventory holding period.
Pre-meeting Stage (PM)	Necessity of balancing supply and demand, attendance at pre-meetings, regularity of meetings.
Final S&OP meeting Stage (FM)	Approval and authorisation of the final monthly plan, process of balancing adopted.

Around 20 questions out of 36 in the questionnaire formed the basis for maturity score covering four stages comprising Demand Planning (Q8-Q12& Q14) which included data collection, Supply Planning (Q17&Q18,Q21-Q25), Pre-meeting (Q26-Q29) and Final S&OP meeting (Q30, 31 & 34). The nature of questions and the scores assigned to each response are provided in brackets, stage-wise in Annexures 1 to 4. As regards assigning scores, for Likert scale questions, points assigned were as per option selected by the respondent. For example: Strongly Disagree-1, Disgree-2, Neutral-3, Agree-4, and Strongly Agree-5 (Q8, Q9, Q17, Q18, Q22, Q26, Q28 and Q30). For all others, points allocated are indicated in brackets against each option in the respective tables. For ten of the multiple questions numbered Q10-Q12,Q21,Q23,Q24,Q27,Q29,Q31and Q34 the highest score was considered from the responses.

Results and Findings

The results of stage-wise mean and standard deviations for all the 50 ACMs were found to be as shown in Table-4. It can be seen that only Demand Planning stage had lowest mean at 3.28 with high standard deviation of 1.12 indicating wide deviations in the process parameters.

Table-4: Stage-wise Mean and Standard Deviation of ACMs

S. No.	Stage	Questions	Mean	Standard Deviation
1	Demand Planning(DM)	(Q8-Q12& Q14)	3.28	1.12
2	Supply Planning(SP)	(Q17&Q18,Q21-Q25)	3.95	0.84
3	Pre-meeting (PM)	(Q26-Q29)	4.37	0.83
4	Final S&OP meeting	(Q30,31&34)	3.75	0.97

Source: Survey Data

On further analysis of Demand Planning measures, it is seen that scores obtained for questions Q9, Q10 and Q14 impacted the outcome severely due to low mean scores and high standard deviations inferring poor practices. High standard deviations indicate wide deviations among ACMs practices. Please see Table-5

Table-5: Mean and Standard Deviations of Demand Planning Measures

Question	Mean	Std. Deviation
Q8. Importance assigned to 'Demand Planning / Forecast' by your company	4.54	.646
Q9. Demand Planning' process is a 'Rolling Plan' updated regularly	2.68	1.449
Q10. The period for ' Demand Plan / Forecast ' is	1.94	1.150
Q11. Demand Plan / Forecast 'is prepared and finalized by	3.72	1.371
Q12. Demand Plan / Forecast 'is prepared based on Inputs / feedback from	3.96	1.029
Q14. Historically, the difference between actual demand and forecasted demand is	2.86	1.069

Source: Surveyed data

Further, in order to see how ACMs fared in each of the four stages as regards process compliance the data collated showed that demand management stage was once again the weak link (only 10% were above 80% compliance). Most of the companies fared better in, Supply Management, Pre-Meeting and Final S&OP stages. Please see Table-6

Table-6: Stage-Wise Distributions of ACMs in Different Groups

% Range	Demand Management Stage(DM)		Supply Management Stage(SM)		Pre-Meeting Stage (PM)		Final S&OP Meeting Stage (FM)	
90-100	1	2%	1	2%	25	50%	10	20%
80-89	4	8%	25	50%	17	34%	16	32%
70-79	15	30%	18	36%	5	10%	6	12%
60-69	18	36%	6	12%	3	6%	11	22%
50-59	12	24%	0	0%	0	0%	7	14%

Source: Survey data

Based on the consolidated scores which were arrived at by adding stage-wise scores for each ACM, the ranking was done as provided in Table-7. These rankings were further categorized into four levels of maturity- Optimal(best-in-the-class), Sub-optimal(less than the best),Adaptive* (Satisfactory) and Primitive stages (low scores) having percentage range of 90-100, 80-89, 70-79 and 60-69 respectively.

*[It is interesting to note that the awareness of ACMs as regards S&OP was found to be low (48%) due to which the process of balancing of supply and demand was managed by maintaining higher inventory (29% for a month and around 44% for a week), tracking the production by having close

interaction with executives of OEMs and using costly transportation (72% used around 10 times a month) to meet timely deliveries]

Table-7: ACMs Rankings based on Maturity Scores

Rank	Score	ACM No.	Rank	Score	ACM No.
1	88	38	**9**	76	39
2	85	23	**10**	75	17
3	82	11	**10**	75	27
3	82	29	**10**	75	30
3	82	42	**10**	75	34
3	82	46	**10**	75	35
4	81	45	**11**	74	5
5	80	13	**11**	74	32
5	80	40	**11**	74	37
5	80	47	**12**	73	36
5	80	48	**13**	72	49
6	79	31	**14**	71	8
7	78	21	**14**	71	19
7	78	43	**14**	71	33
7	78	50	**15**	70	2
8	77	4	**15**	70	6
8	77	10	**15**	70	9
8	77	12	**15**	70	18
8	77	22	**15**	70	20
8	77	24	**15**	70	41
8	77	25	**16**	68	16
8	77	44	**17**	67	3
9	76	1	**17**	67	15
9	76	7	**17**	67	28
9	76	14	**18**	63	26

Source: Survey data

The highest score obtained by an ACM is 88 against the total score of 100, indicating a maturity level of 88%. The least score obtained is 63. All the 50 ACMs are distributed over 18 ranks with many firms occupying same ranks due to similar scores. For example ranks 3 and 5 are held by 4 ACMs each and rank 8 is occupied by 7 companies.

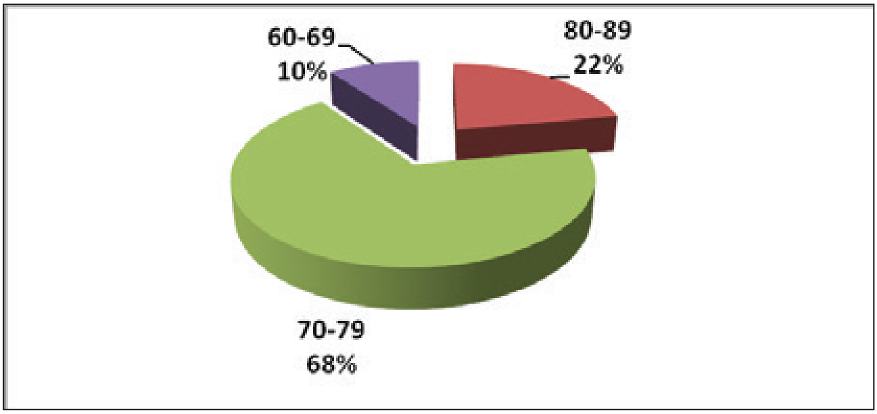
It is seen from the frequency Table-8 and the pie-chart at Figure-2 that 10% of the companies are falling in the Primitive Stage (60-69%) and 68 % in Adaptive stage (70-79%), followed by 10 % in Sub-optimal Stage (80-89%). No Company could find a place in the highest category of Optimal Stage (90-100%).

Table-8: Categorisation based on Rankings

Stage	Maturity Score	No of Companies	Percentage
Optimal	90-100	0	0
Sub-optimal	80-89	11	22
Adaptive	70-79	32	68
Primitive	60-69	5	10
	Total	50	100

Source: Survey data

Figure-2: Categorisation of ACMs as per Maturity Score



Conclusion & Discussion

It is seen from the S&OP maturity levels rankings that none of the ACMs are at Optimal Stage (90-100%).However, it is commendable to note that in spite of 52% of the ACMs not being aware of S&OP process, around 22% of the ACMs are at sub-optimal and 68% in the Adaptive stage. It could be seen from Table-6 that most of the ACMs are faring bad in the Demand Management processes as 90% companies were in 50-79% range. In this context, it is relevant to consider the observations of Grimson & Pyke (2007) that industries which have high seasonality like, automotive products tend towards longer horizons (forecast period) and the frequency of the meetings is dependent on dynamics of the market and production environments. This observation substantiates research outcome as measures related to Q9 (regular plan update), Q10 (demand period/forecast horizon) and Q14 (forecast variance) call for improvement in the light of low scores obtained by ACMs. Since, the overall success of S&OP process is a combination of all four stages, processes having low metrics in each stage need to be reviewed and improved. Also, it may be possible that with improved awareness of S&OP among ACMs, the compliance of adoption levels may increase the maturity levels reasonably.

Managerial / Practical Implications

The findings provide a simple method of assessing the overall maturity level of each of the surveyed ACMs with additional information on the stage-wise compliance of S&OP process. Once the awareness of the S&OP process is enhanced through training and development programmes or alternatively by engaging consultants, higher compliance of S&OP process could bring in desired improvements in terms of customer service and profitability. It is relevant to quote Lapide (2005) who opined that "while S&OP processes can never be executed to the fullest extent, they represent an ideal process toward which companies should evolve". It may take time for the ACMs, but it is worth trying.

Limitations of the Study

The sample size consisted of 50 Tier-1 Indian ACMs and is confined to passenger car/ multi-utility vehicle, commercial vehicle, 2 / 3 wheeler and tractor segments. It may be noted that S&OP process as a methodology to improve customer service and profitability is not known to around 52% of the surveyed Indian ACMs. Customer service for this study covers meeting consistently quality supplies, timely delivery and having superior inventory management. To maintain confidentiality, the identity of the ACMs is not revealed.

References

Annual Report of *Automotive Component Manufacturers Association of India*, (ACMA) (2016-17). (Available at : http://www.acma.in/)

Fowler, Martin, Martin Fowler.com (2014), ThoughtWorks, Blog. (Available online at : https://martinfowler.com/bliki/MaturityModel.html)

Grimson, J.A. & Pyke , D.F.(2007). *Sales and Operations Planning: An Exploratory Study and Framework*, International Journal of Logistics Management.

(Available online at: https://www.researchgate.net/publication/247621017_Sales_and_operations_planning_An_exploratory_study_and_framework)

Hana Hulthén, Dag Näslund & Andreas Norrman, (2016). Framework for Measuring Performance of the Sales and Operations Planning Process , International Journal of Physical Distribution & Logistics Management, Vol. 46 Issue: 9, pp.809-835. (Available online at: https://doi.org/10.1108/IJPDLM-05-2016-0139)

Lapide, L. (2004). Sales and Operations Planning, Part I: The Process, *The Journal of Business Forecasting*, 23(3), Pages 17-19. (Available online at : https://ctl.mit.edu/sites/ctl.mit.edu/files/library/public/article_jbf_soplanningi_lapide.pdf)

Lapide, L. (2005b). Sales and Operations Planning, Part III: A Diagnostic Model, *The Journal of Business Forecasting*, 24(1), 13-16. (Available online at : https://ctl.mit.edu/sites/ctl.mit.edu/files/library/.../article_jbf_soplanningiii_lapide.pdf)

Pedroso, C. B., Calache, L. D. R., Lima Júnior, F. R., Silva, A. L., & Carpinetti, L. C. R. (2017). Proposal of a Model for Sales and Operations Planning (S&OP) Maturity Evaluation. Production, 27, e20170024.(Available online at : http://dx.doi.org/10.1590/0103-6513.20170024)

Thomé, A. M. T., Scavarda, L. F., Fernadez, N., & Scavarda.A. J. (2012a). Sales and Operations Planning: A Research synthesis, *International Journal of Production Economics*, 138(1), 1-13. (Available online at: http://dx.doi.org/10.1016/j.ijpe.2011.11.027)

Thomé, A. M. T., Fernadez, N., & Scavarda, A. J. (2012b). Sales and Operations Planning and the Firm Performance. *International Journal of Productivity and Performance Management*, 61(4), (359-381. (Available online at : http://dx.doi.org/10.1108/17410401211212643)

Wallace Thomas F & Stahl Robert A. (2008). *Sales & Operations Planning- The How-to Handbook*, T.F.Wallace & Company,USA,Publisher: Steelwedge Software; 3 edition.

Annexure-1: Questions Related to Demand Planning

Q8	**Importance assigned to 'Demand Planning / Forecast' by your company** Low importance 1 2 3 4 5 High importance
Q9	**'Demand Planning' process is a' Rolling Plan' updated regularly (Considering immediate few weeks)** Strongly disagree 1 2 3 4 5 Strongly agree
Q10	**The period for ' Demand Plan / Forecast ' is** (Multiple Responses) O 3 Month(1) O 6 Months(2) O 12 Months(3) O 18 Months(4) O Other: ------- >18m (5)
Q11	**Demand Plan/ Forecast ' is prepared and finalized by** (Multiple Responses) O Sales / Marketing(5) O Marketing & Production(4) O Marketing, Production & Finance (3) O Cross Functional Team (2) O Other----------------------(1)
Q12	**'Demand Plan/ Forecast ' is prepared based on Inputs / feedback from** *(Multiple Responses) O Previous yr sales(3) O Front line sales team(2) O Ext environment- Economy, Politics, Legal etc(1) O Customers, Suppliers, Distributors and Trade associations (4) O All the above (5)
Q14	**Historically, the difference between actual demand and forecasted demand is found to be** O <5 % (5) O <10% (4) O <15% (3) O <20% (2) O Other: ------------(1)

Annexure-2: Questions Related to Supply Planning

Q17	**All functional plans are prepared based o**)						
	Strongly disagree	1	2	3	4	5	Strongly agree
Q18	**Resources and capacity constraints are worked out based on 'Demand Plan'**						
	Strongly disagree	1	2	3	4	5	Strongly agree
Q21	**Supply Plans' are made** (Multiple Responses)						
	O Product wise(3) O Product Family wise(4) O Aggregate wise (All Products)(5) O based on urgency (1)						
	O Other:: --------------------------------(0)						
Q22	**'Supply plan' aims to meet rolling 'Demand Plan ' in total.**						
	Strongly disagree	1	2	3	4	5	Strongly agree
Q23	**Supplies are made to OEM customers' from** * (Multiple Responses)						
	O. Plants (4)O Own finished goods warehouses(3) O. Consignment service agents(5)						
	O Third Party Logistic Providers (2) O Other: ---(1)						
Q24	**Inventories maintained at the plants / warehouses meet demand for a period of a**						
	O Day (2) O Week (5) O Month(4) O Quarter(3) O Other -----------------(1)						
Q25	**How often in a month do you utilize costly transportation to meet deliveries on time**						
	(Dispatching by air or sending through an escort.)						
	O Never (5) O <5 times (4) O < 10 times(3) O < 15 times (2) O Other: ------------(1)						

Annexure-3: Questions Related to Pre-Meeting Stage

Q26	**Catering to more than one OE customer necessitates allocation/ balancing ' Demand and Supplies'**						
	Strongly disagree	1	2	3	4	5	Strongly agree
Q27	**. Meetings on balancing ' Demand and Supply' are attended by designated persons from**						
	O Market Planning(3) O Production Planning & Control(5) O Finance Control(2) O Supply Chain Mgmt(4)						
	O Other----------------------------------(1)						
Q28	**Meetings on balancing ' Demand and Supply ' are held to improve customer service levels.**						
	Strongly disagree	1	2	3	4	5	Strongly agree
Q29	**Meeting(s) on balancing ' Demand with Supply ' is held every** *(Multiple Responses)						
	O Week (4) O Month (5) O Quarter (3) O Half year(2) O In emergencies(1)						

Annexure-4: Questions Related to Final S&OP Meeting Stage

Q30	**The aim of balancing 'Demand and Supply ' is to meet ' Business Plan' fully.**						
	Strongly disagree	1	2	3	4	5	Strongly agree
Q31	**Final ' Demand and Supply ' balancing strategy is approved /finalized by** (Multiple Responses)						
	O Manufacturing head(1) O Marketing head(2) O Mkting & Mfg heads(3) O All Departmental Heads(4)						
	O Managing Director/ COO(5)						
Q34	**The process of balancing 'Supply with Demand ' is done** (Multiple Responses)						
	O Manually(1) O Excel spreadsheets(2) O By demand management software(3) O By ERP module(4)						
	O Sales & Operations software (5)						

ISSN 2249 - 9040 Volume 9, No 1, January-June 2019 pp. 37-46

Insurance Sector and Social Security in Uttar Pradesh: An Economic Growth Perspective

Javaid Ahmad Mir[1]
P. K. Mishra[2]

Abstract

Social security and empowerment through insurance sector penetration increase the access of poor people to the labour market and the productivity of workers thereby breaking the vicious circle of poverty. In this perspective, the issue of social security has been a concern in India and its States. Uttar Pradesh being no exception. The State continues to be one of the low-income states of India depicting several socio-economic problems such as low standards of living, low level of human capital formation, unemployment, income inequality, and poverty. In this context, the insurance sector plays a critical role in providing sufficient investible funds for necessary increase in productivity, and in a broader sense contributes to employment generation and poverty reduction by ensuring social protection. Thus, this study attempts to examine the role of insurance sector penetration in providing a safeguard against socio-economic taboos and in contributing to the overall growth and development of India at large, and Uttar Pradesh in particular. The analysis indicates a declining penetration level as well as density in the State and at the national level. This is an indication of persisting unemployment problem and implied low income status both at the state and country level. Therefore, it is suggested that the suppliers of the insurance products should formulate and implement appropriate strategies to create public awareness for ensuring a congenial social environment where people can work, save and invest effectively and efficiently so as to reap the benefits of the higher rate of economic growth and human development.

Keywords: Economic Growth, Life Insurance, Social Protection, Uttar Pradesh

Introduction

In this globalized era, it has been accepted that the social security and empowerment increases the access of poor people to the labour market, raises their productivities, and assist them to come out of the poverty trap. Social security and empowerment very much depend on life and non-life indicators such as health, education, wealth

1 Doctoral Research Scholar in Economics, Central University of Punjab, Bathinda, India and can be reached at javaidahmdmir@gmail.com

2. Associate Professor in Economics, Central University of Punjab, Bathinda, India and can be reached at pkmishra1974@gmail.com

and assets, etc. In providing the protection to these life and non-life entities, the role of the insurance sector is noteworthy. Insurance sector helps prevailing social security, and confidence at the individual/household level by providing protection against loss of life and property, industrial injuries, road accidents, health hazards, and financial difficulties on account of unemployment, old age, disability (Leepsa & Digal, 2015). This ensures households of economic security and continuously provides a family income when unpredictable perils hit (Beenstock *et al*. 1988). Insurance sector contributes to economic development by creating job opportunities (Khurana, 2008) thereby reducing the extent and intensity of poverty. It provides long-term funds for infrastructure development, and at the same time strengthens the risk-taking ability (Bodla & Verma, 2007). The need for insurance in the processes of production, exchange, and consumption has been widely recognized (Taneja & Narendera, 2004). Insurance sector contributes to overall development of an economy as it is linked to other sectors such as industry, agriculture, transport, mining, petroleum, commerce & trade, health & education (Mohammad, 1998; Holsboer, 1999; Catalan *et al*. 2000; Rule, 2001; Ranade & Ahuja, 2001; Das *et al*. 2003; Kong & Singh, 2005; Kugler & Ofoghi, 2005; Arena, 2008; Vadlamannati, 2008; Curak *et al*. 2009; Michael, 2012; Chang *et al*. 2013; Verma & Bala, 2013).

Thus, this piece of research study highlights the development of the insurance sector in India with a special focus on Uttar Pradesh. According to Census Report, 2011, about 69 per cent of Indian live and work in rural areas which in absolute number is 83.30 crore. And, about 80 per cent of our rural population has no life insurance cover. The acceptable reasons may be low purchasing power, low savings, low literacy, and lack of insurance awareness among others. Uttar Pradesh is the most populous and lower developed State of India where about 80 per cent of people live in rural areas. Thus, we have taken Uttar Pradesh as a case of our example.

This study argues in favour of the insurance sector because it is felt that well informed and educated customers can create economic ripples. They make better financial decisions for themselves and for their families and contribute better to vital and thriving communities thereby fostering socio-economic development of the community (Hogarth, 2006). Furthermore, this study is imperative as the growth of insurance business enables mobilization of excess funds from surplus-spending groups and allocation of the same to the needs of the deficit-spending groups thereby assisting in the socio-economic development of an economy. Particularly, penetration of insurance sector in the rural regions can be a catalyst for inclusive growth due to its potential for stabilizing income and reducing poverty (Prasad, 2009; Hamid *et al*. 2010; Singh & Gangal, 2011). It is with this backdrop, the remaining of the paper is arranged as follows: Section 2 makes a note of the data and methodology used in the research; Section 3 makes the discussion of the results obtained through analyses; and Section 4 conclusion.

Data and Methodology

The primary objective of this paper is to examine the role of the insurance sector as a contributor to social protection against life and non-life threats in India with special focus on Uttar Pradesh. The development of the insurance sector is generally, gauged using indicators such as insurance penetration and insurance density (Beck & Webb, 2002). Insurance penetration is measured as the percentage of insurance premium to the Gross Domestic Product whereas insurance density is the ratio of insurance premium to the total population. The economic growth indicator is the per capita GDP for India and per capita GSDP for Uttar Pradesh. The required data for this research work has been collected from the Handbook of Statistics on Indian Economy, RBI and Annual Reports of IRDA.

Analysis and Discussion of Results

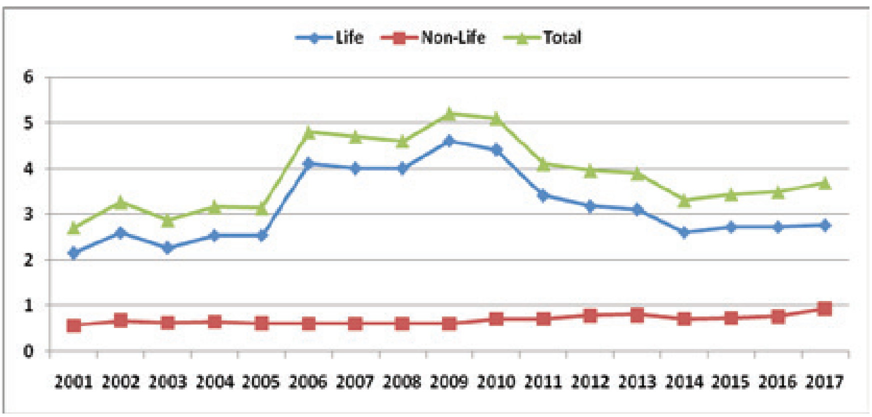
At the outset, we observe the trends in insurance penetration and density in India over the period from 2001 to 2017. The results are presented in Table-1 and Figure-1 (penetration) & Figure-2 (density).

Table-1: Insurance Penetration and Density in India

Year	Life Insurance		Non-Life Insurance		Insurance Industry	
	Density (USD)	Penetration (%)	Density (USD)	Penetration (%)	Density (USD)	Penetration (%)
2001	9.1	2.15	2.4	0.56	11.5	2.71
2002	11.7	2.59	3.0	0.67	14.7	3.26
2003	12.9	2.26	3.5	0.62	16.4	2.88
2004	15.7	2.53	4.0	0.64	19.7	3.17
2005	18.3	2.53	4.4	0.61	22.7	3.14
2006	33.2	4.10	5.2	0.60	38.4	4.80
2007	40.4	4.00	6.2	0.60	46.6	4.70
2008	41.2	4.00	6.2	0.60	47.4	4.60
2009	47.7	4.60	6.7	0.60	54.3	5.20
2010	55.7	4.40	8.7	0.71	64.4	5.10
2011	49.0	3.40	10.0	0.70	59.0	4.10
2012	42.7	3.17	10.5	0.78	53.2	3.96
2013	41.0	3.10	11.0	0.80	52.0	3.90
2014	44.0	2.60	11.0	0.70	55.0	3.30
2015	43.2	2.72	11.5	0.72	54.7	3.44
2016	46.5	2.72	13.2	0.77	59.7	3.49
2017	55.0	2.76	18.0	0.93	73.0	3.69

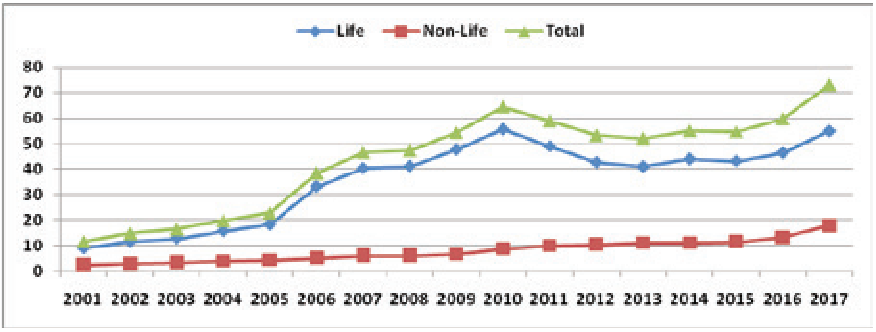
Source: Annual Reports of IRDA

Figure-1: Insurance Penetration in India, 2001-2017 (%)



Source: Authors' Own Plot

Figure-2: Insurance Density in India, 2001-2017 (USD)



Source: Authors' Own Plot

As it is evident from Figure-1 and Figure-2 that the insurance sector development in terms of insurance penetration and insurance density, is following a rising trend between 2001 and 2009. However, this trend pattern has been reversed since 2009. The penetration of life insurance shows a U-shape during 2001 and 2017 whereas that of non-life insurance shows a stagnant pattern. A similar observation has also been made for the density of the insurance sector in India. On the whole, it can be said that Indian insurance sector has been experiencing falling penetration and density in recent years (Ganesh, 2014; Nagaraja, 2015, Kaur, 2015; Ramakrishna, 2016; Vimala & Alamelu, 2018; Shukla, 2018). Experts point out several reasons including effects of global financial crisis, European debt crisis, volatility of equity market, mis-selling, declining interest of agents due to low commission structure, procedural complexity in launching new products, lack of awareness about insurance concept among general public, lack of effective communication on the part of the agents, and like (Ganesh, 2014). Some other people point to the failure of the insurance sector to fully utilize the business opportunities available at the bottom of the pyramid (Rao & Periyasamy, 2014; Majumdar, 2015; Hedge, 2015; Venugopal, 2015). According to Census Report, 2011, about 69 per cent of Indian live and work in rural areas which in absolute number is 83.3 crore. And, about 80 per cent of our rural population has no life insurance cover. The acceptable reasons may be low purchasing power, low savings, low literacy, and lack of insurance awareness among others.

Table-2: Life Insurance Penetration and Density in UP and India

Year	Life Insurance Penetration (%)		Life Insurance Density (Rs.)	
	Uttar Pradesh	All India	Uttar Pradesh	All India
2006-07	1.76	1.56	325.0	552.6
2007-08	1.79	1.73	369.2	700.7
2008-09	1.35	1.31	316.4	603.5
2009-10	1.45	1.34	394.7	700.3
2010-11	1.28	1.14	391.8	698.8
2011-12	0.85	0.78	289.8	531.1
2012-13	0.71	0.66	275.4	514.0

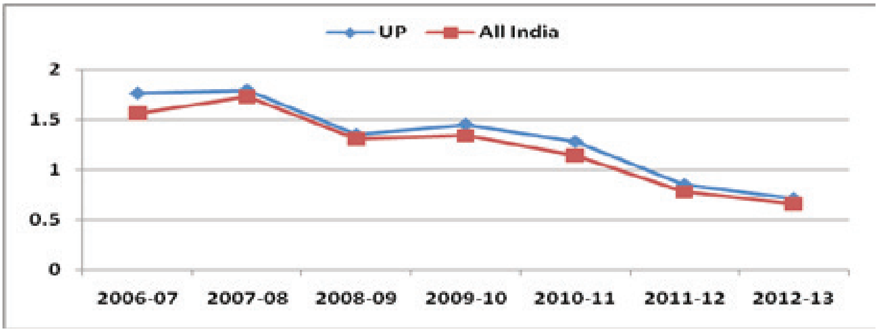
Source: Annual Reports of IRDA

This particular line of argument has motivated us to take the case of Uttar Pradesh state in India for examining whether the failure of the insurance sector in recent years is due to its business activities not being pro-poor.

We have deliberately chosen Uttar Pradesh for our study, because it is the most populous State of India saddled with a larger number of poor and multidimensionally deprived people and concentration of rural dwellings. In Uttar Pradesh, about 77.73 per cent of total populations live and work in rural areas. And, in terms of Multidimensional Poverty Index (MPI), the state is having about 68.1 per cent poor people who are deprived in many respects including health, education, housing, sanitation, etc. Thus, we examined the case of UP to cross verify the reasons cited in previous studies regarding the declining trend of insurance penetration and density for the whole country. Furthermore, looking at the stagnancy in the growth of non-life insurance in India, we considered only life insurance for this case study.

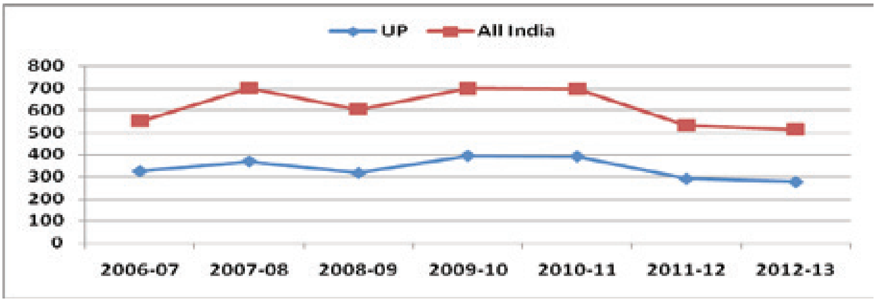
The Table-2 presents the penetration and density of life insurance in Uttar Pradesh and All India. It is clearly observed that these indicators reveal a declining trend both for UP and All India. The Figure-3 and Figure-4 also depict the same trend pattern. Therefore, we can conclude in line with the previous observations of Ganesh (2014) and Nagaraja (2015) regarding the falling tendency of the insurance sector in India may be due to the reason that the sector is not targeting the rural masses for insurance coverage (Ganesh, 2014; Rao & Periyasamy, 2014; Majumdar, 2015; Hedge, 2015; Venugopal, 2015).

Figure-3: Life Insurance Penetration in UP & India, 2006-07 to 2012-13 (%)



Source: Authors' Own Plot

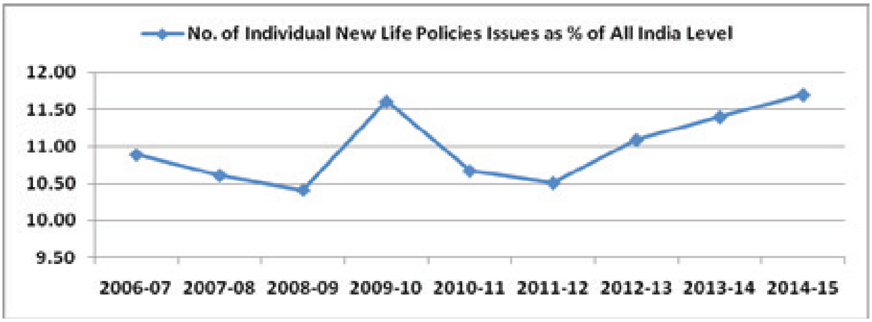
Figure-4: Life Insurance Density UP & India, 2006-07 to 2012-13 (Rs.)



Source: Authors' Own Plot

Despite such a declining tendency of the insurance sector in UP, it has been playing the most important role of providing social security. It is clearly evident from the number of individual new life insurance policies issues in UP as a percentage of that of at All India level for the duration 2016-07 to 2014-15. This rate is clearly rising since 2011-12. This is the indication that the people have become conscious of the social protection role of the insurance (see Figure-5).

Figure-5: No. of Individual New Life Insurance Policies (as % of All India Level)



Source: Authors' Own Plot

Table-3: Insurer-Wise Number of Individual Agents in UP, 2006-07 to 2014-15

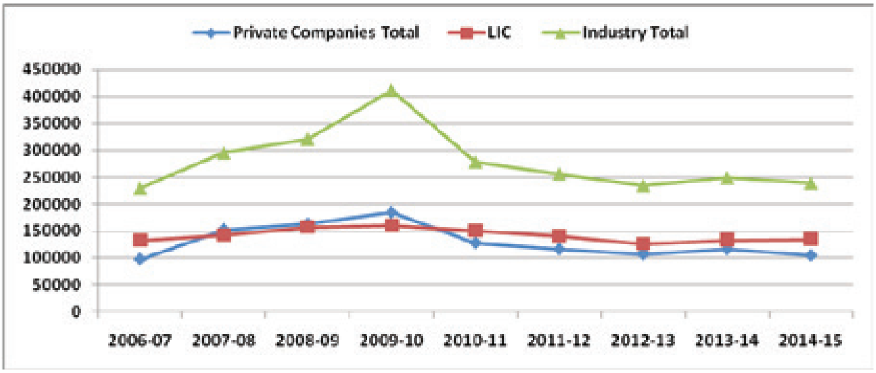
Name of Insurers	No. of Individual Agents of Life Insurers In Uttar Pradesh								
	2006-07	**2007-08**	**2008-09**	**2009-10**	**2010-11**	**2011-12**	**2012-13**	**2013-14**	**2014-15**
Aegon Religare	NA	NA	242	670	1000	763	459	846	846
Aviva	826	3074	3308	3334	2888	2146	2002	1364	1534
Bajaj Allianz	28849	33745	26593	18431	21174	20406	18181	20810	15399
Bharti AXA	133	1452	3580	3936	1830	1779	1520	2124	2338
Birla Sun Life	7067	16656	21535	17522	13387	12910	13084	10582	11973
DLF Pramerica	NA	NA	NA	27	114	179	209	117	103
Edelweiss Tokio	NA	NA	NA	NA	NA	18	338	906	1556
Future General	NA	NA	2818	4765	6436	6205	5135	6079	4210
HDFC Standard	8077	15119	21765	20340	12401	10435	7518	6270	6421
ICICI Prudential	26286	33562	26562	20858	17402	12991	14104	17368	13648
IDBI Federal	NA	22	914	943	828	719	943	1205	1587
Kotak Mahindra	1000	1691	2361	2068	1912	1432	1808	2543	2942
Max Life	1433	3087	8440	6997	4066	3272	3456	4491	4677
Met Life	542	1992	3007	3757	2361	2510	1903	1204	2113
Reliance Life	12802	28725	19093	23146	25152	24092	21886	20299	18452
Sahara	2790	3688	NA	4058	4281	4508	3675	3774	4018
SBI Life	1376	1976	4795	4453	6005	7096	8219	10152	7494
Shri ram Life	NA	1	3	14	17	36	114	34	26
Star Union DAIICHI	12	14	34	36	931	1175	NA	NA	NA
Tata AIA	841	4983	8911	10854	5929	2983	1840	2251	1977
Uttar Pradesh First	230354	296267	321419	412146	279314	257125	234957	250255	240370
Private Total	**97522**	**153325**	**163393**	**185098**	**128436**	**116397**	**108046**	**116351**	**104984**
LIC	132832	142942	158026	160697	150878	140728	126911	133904	135386
Industry Total	**230354**	**296267**	**321419**	**412146**	**279314**	**257125**	**234957**	**250255**	**240370**

Source: Handbook of Statistics, IRDA, 2014-15

Uttar Pradesh is a most populous state of India absorbing 19.98 crore people as per 2011 census. Insurance sector contributes fairly to the employment in Uttar Pradesh. Table-2 provides the details about the persons employed in the insurance sector of Uttar Pradesh during 2006-07 and 2014-15. The Figure-6 depicts the trend pattern of recruited agents by insurance companies in UP.

It is seen from Table-3 and Figure-6 that the total number of agents employed by the insurance industry as a whole increased from 2006-07 to 2009-10 and then showing a declining trend till 2014-15. The pattern of trend is also observed for the number of agents employed by private players and the LIC in UP. However, this picture does not include any insurance sector employees permanents/temporarily engaged in UP. Due to the paucity of data we are unable to give this information. Thus, it clearly gives an idea that the insurance sector is contributing to employment generation both in terms of recruitment of insurance employees and insurance agents. This has multiplier effects on investment, income, consumption, and hence, on the real economic growth of the State.

Figure-6: Number of Individual Agents in UP, 2006-07 to 2014-15



Source: Authors' Own Plot

Conclusion

In India, the implementation of economic reforms in the form of liberalization, globalization and privatization has increased the role of insurance in the country (Taneja & Narendera, 2004). Social security and empowerment through insurance sector penetration increases the access of poor people to the labour market and the productivity of workers thereby helping them break the vicious circle of poverty. In this perspective, the issue of social security has been a concern in India and its States. And, Uttar Pradesh is no exception. The State continues to be a low per capita income State in India which is reflected in the socio-economic problems such as low standards of living, deficiency in human capital formation, mass unemployment, income inequality, and poverty. In this context, insurance sector in an economy plays a crucial role in not only providing sufficient investible resources for higher productivity, but also in a very broader sense contributes to employment generation and poverty reduction by ensuring social protection. Thus, this paper examined the role of insurance sector penetration in providing a safeguard against socio-economic taboos and in contributing to the overall growth and development of India at large, and Uttar Pradesh in particular. The analysis of the data on life insurance penetration and insurance density indicates a declining penetration level as well as density in the State and at the national level. This observation is also supplemented by the observation of declining recruitment of agents by insurance companies particularly after 2009-10. This is an indication of persisting unemployment problem and consequential low income in the state and the country as well. Therefore, it is suggested that the suppliers of the insurance products should formulate and implement appropriate strategies to create public awareness for ensuring a congenial social environment where people can work, save and invest effectively and efficiently so as to reap the long-run benefits of the higher rate of economic growth and human development. Bhattacharya (2005) suggested that the banks through their large and strong networking could also provide the opportunities to tap the large potential lying in rural and semi-urban areas. Kulshrestha & Kulshrestha (2006) suggested that rural areas can provide a good opportunity for life insurance companies to expand their business. In this context, it may be said that the insurers should make every effort to take the benefits of the gold post lying at the bottom of the pyramid. On the other hand, Kumar (2005) suggested for the promotion of private companies in the insurance sector as their strategies are more flexible and give best-suited benefits to customers. However, Arora (2002) argues that private insurers are potential threats to LIC. Thus, the role of IRDA would be significant in this regard.

References

Arena, M. (2008). Does insurance market activity promote economic growth? A cross-country study for industrialized and developing countries, *Journal of Risk and Insurance*, 75(4), pp: 921-946.

Arora, R. S. (2002). Financial Reforms and Service Sector–A Study of Life Insurance Industry in India, In B.B. Tandon and A K Vashishts (Eds)., *Financial Sector Reforms–An Unpublished Agenda for Economic Development*, Deep and Deep, New Delhi, pp: 259-270

Beck, T. & Webb, I. (2002). Economic, demographic, and institutional determinants of life insurance consumption across countries, *The World Bank Economic Review*, 17(1), pp: 51-88.

Beenstock, M., Dickinson, G. & Khajuria, S. (1988). The relationship between property-liability insurance premiums and income: An international analysis, *Journal of Risk and Insurance*, 55(2), pp: 259-272.

Bhattacharya, A. (2005). Challenges before Life Insurance Industry, *Life Insurance Today*, 1(8), pp: 3-6.

Bodla, B. S. & Verma, S. R. (2007). Life Insurance Policies in Rural Areas: Understanding Buyer Behaviour, *The ICFAI Journal of Service Marketing*, 5(4), pp: 18-27

Catalan, M., Impavido, G. & Musalem, A. R. (2000). Contractual Savings or Stock Markets Development: Which Leads?, *Policy Research Paper No.2421*, Washington: World Bank.

Chang, T., Lee, C. & Chang, C. (2013). Does Insurance Activity Promote Economic Growth? Further Evidence Based on Bootstrap Panel Granger Causality Test, *The European Journal of Finance,* 20(12), pp: 1-24.

Ćurak, M., Lončar, S. & Poposki, K. (2009). Insurance sector development and economic growth in transition countries, *International Research Journal of Finance and Economics*, 34(3), pp: 29-41.

Das, U. S., Davies, N. & Podpiera, R. (2003). Insurance and Issues in Financial Soundness, *IMF Working Paper No.138*, Monetary and Exchange Affairs Department.

Ganesh, S. S. S. D. (2014). Growth of Insurance Industry in India after Privatization - Life Insurance Sector is at an Inflection Point, *Journal of Commerce*, 2(2), pp: 1-14.

Hamid, S. A., Roberts, J. & Mosley, P. (2011). Can micro health insurance reduce poverty? Evidence from Bangladesh, *Journal of Risk and Insurance*, 78(1), pp: 57-82.

Hogarth, J. M. (2006). Financial education and economic development, *Paper presented at the G8 International Conference on Improving Financial Literacy*, November, Moscow.

Holsboer, J. H. (1999). Repositioning of the Insurance Industry in the Financial Sector and its Economic Role, *The Geneva Papers on Risk and Insurance*, 24(3), pp: 243-290.

Kaur, J. (2015). Insurance Penetration and Density in India, *International Journal of Business Management*, 2(1), pp: 765-770.

Khurana, S. (2008). Customer Preferences in Life Insurance Industry in India, *ICFAI Journal of Services Marketing*, 6(3), pp: 60-68.

Kong, J. & Singh, M. M. (2005). Insurance companies in emerging markets, *IMF Working Paper No. 88,* International Capital Markets Department, [Available at: https://www.imf.org/external/pubs/ft/wp/2005/wp0588.pdf]

Kugler, M. & Ofoghi, R. (2005). Does insurance promote economic growth? Evidence from the UK. In: *Money, Macro and Finance (MMF) Research Group Conference* 2005, University of Crete, Greece.

Kulshrestha, L. R. & Kulshrestha, A. (2006). Liberalization and Rural Insurance Prospects and Challenges, *Life Insurance Today*, 1(10), pp: 9-13.

Kumar, J. (2005). Insurance: Industry on Growth Path, *Life Insurance Today*, 1(9), pp: 6-10.

Leepsa, N. M. & Digal, S. K. (2015). The Insurance Industry in India: A Comparative Analysis of the Private and Public Players, *Discussion Paper, Insurance Risk & Finance Research Conference*, The Insurance Risk and Finance Research Centre, Nanyang Business School, Nanyang Technological University, Singapore, June 25-16, 2015.

Majumdar, N. (2015). There is Business Opportunity at the Bottom of Pyramid, *IRDA Journal*, 14(6), pp: 11-14

Michael, O. (2012). Insurance Sector Development and Economic Growth in Nigeria, *African Journal of Business Management,* 6(23), pp: 7016-7023.

Mohammad, J. Y. H. (1998). The Economic Significance of the Insurance Sector in Kuwait, *Journal of Economic and Administrative Sciences*, 14, pp: 107-124

Nagaraja, B. (2015). Performance of Insurance Industry in India: A Critical Analysis, *International Journal of Multidisciplinary and Scientific Emerging Research*, 4(1), pp: 1045-1052

Prasad, E. (2009). The Insurance Solution, *The Wall Street Journal,* [Available at: https://www.wsj.com/articles/SB123669930494383169]

Ramakrishna, S. P. (2016). Growth of Insurance Sector in India, *International Journal of Commerce and Management Research*, 2(5), pp: 27-28.

Ranade, A. & Ahuja, R. (2001). Impact on saving via insurance reform. Indian Council for Research on International Economic Relations, *Working Paper No. 67*, Indian Council for Research on International Economic Relations, New Delhi.

Rao, N. & Periyasamy, S. (2014). Life Insurance Penetration in Rural Areas-Indian Perspective, *International Journal of Banking, Risk and Insurance*, 2(2), pp: 21-29.

Rule, D. (2001). Risk Transfer between Banks, Insurance Companies and Capital Markets: An Overview, *Financial Stability Review*, London: Bank of England, December, pp: 137-159.

Shukla, U. N. (2018). Enhancing Life Insurance Penetration and Density in India: Purchase Intention Modelling, *International Journal of Economics and Business Research*, 15(2), pp: 141-154.

Singh, K. & Gangal, V. K. (2011). Micro insurance-A tool for upliftment of rural India, *Excel International Journal of Multidisciplinary Management Studies*, 1(1), pp: 131-146.

Taneja, A. & Narendera, K. (2004). Insurance in India–Challenges and Opportunities, *The Insurance Times*, 24(11), pp: 34-37.

Vadlamannati, K. C. (2008). Do insurance sector growth and reforms affect economic development? Empirical evidence from India, *Margin: The Journal of Applied Economic Research*, 2(1), pp: 43-86.

Venugopal, R. (2015). Synergy between insurance company and customer, *Bimaquest,* 16(1), pp: 40-51.

Verma, A. & Bala, R. (2013). The relationship between life insurance and economic growth: evidence from India, *Global Journal of Management and Business Studies*, 3(4), pp: 413-422.

Vimala, B. & Alamelu, K. (2018). Insurance Penetration and Insurance Density in India-An Analysis, *International Journal of Research and Analytical Reviews*, 5(4), pp: 229-232.

ISSN 2249 - 9040 Volume 9, No 1, January-June 2019 pp. 47-58

Financial Inclusion and Entrepreneurial Engagement of Women Working in Unorganised Sector Vis-a-Vis Changing Dimensions of Family Management: An Empirical Analysis

Rajesh Kumar Singh[1]
Harish Kumar[2]

Abstract

One bottleneck to inclusive growth is the lack of participation of people, especially women engaged in unorganised sector, in banking/financial system and entrepreneurial engagements. That is why in recent times, the World Bank Group and financial institutions across the globe are seriously concerned with promotion of financial inclusion of women to promote their participation in entrepreneurial activities. Further, women's increased participation in entrepreneurial activities has influenced the familial decision making process too, to a considerable extent. The present paper analyses the accessibility to financial services, proficiency in handling banking transactions and entrepreneurial engagements along with observing changes in the financial and non-financial familial decision making during post entrepreneurial engagement of women working in unorganised sector. The paper suggests organising workshops and practical sessions on financial literacy, handling banking transactions, dealing with banks/financial institutions Government offices & developmental agencies for enhancement of inclusive growth.

Keywords: Banking Transactions, Entrepreneurial Engagement, Family Management, Financial Inclusion

Introduction

During recent years, the inclusive financial system is widely recognized in the policy circle and financial inclusion is seen as a policy priority in developing countries. The term financial inclusion refers to the delivery of banking services at an affordable cost to the vast sections of the disadvantaged and low-income groups (Leeladhar 2006: 73). Broadly, it includes the provision of access to payments and

1 Kathauta (Joginaka), Gopiganj, Bhadohi (UP) and can be reached at rajeshgaharwar@yahoo.com, rksinghbhadohi@gmail.com

2. Assistant Professor, School of Business and Management, Jaipur National University, Jaipur and can be reached at hk63664@gmail.com.

remittance facilities, savings, loans and insurance services by the formal financial system to those who tend to be excluded (Thorat 2006: 239). The Committee on Financial Inclusion defines financial inclusion as the process of access to financial services, timely & adequate credit needed by vulnerable groups such as weaker sections and low income groups at an affordable cost (Rangarajan 2008: 26). Thus, the definitions emphasize financial exclusion to be a manifestation of a much broader issue of social exclusion of certain societal groups such as the poor and the disadvantaged.

The common reasons experienced in India for financial exclusion included insufficient bank branches, physical distance of the bank from the people, fixed timings of the banks, low income that made it difficult to save, and above all, absence of banking culture among people. Therefore, beginning with the nationalisation of banks in 1969, efforts were taken to take the banking system closer to the people by introduction of the Lead Bank Scheme and setting up of the regional rural banks. The present focus on financial inclusion started with the annual policy statement of 2005-06 of the Reserve Bank of India (RBI), which encouraged several initiatives to enhance the financial inclusion in the country. The important initiatives were the relaxed Know Your Customer (KYC) norms for certain types of accounts, provisions for opening of "no-frills" accounts with low or minimum balances, and making account opening procedures easy etc., which accounted for improving the penetration of banking services among the excluded sections of the population. However, one bottleneck to inclusive growth is the lack of participation of people, especially women engaged in unorganised sector, in banking/financial system and entrepreneurial engagements. Available evidences show that women disproportionately face financial access barriers that prevent them from improving their livelihood engagements. That is why in recent times, the World Bank Group and financial institutions across the globe are seriously concerned with promotion of financial inclusion of women to promote their participation in entrepreneurial activities. Increasingly, women entrepreneurship is a live wire for social and economic transformation of the society due to the critical role they play both within the realms of households and the community.

Women's domestic responsibilities have been a key issue in policy debates as well as in the research literature related to women entrepreneurs, as the women entrepreneurs struggle with combining the demanding and time-consuming entrepreneurial activities with their domestic responsibilities and ambitions. However, a key characteristic with modern societies is an increase in gender equality & positive attitude towards women, on the one hand and the entry of a large number of women in decision-making bodies creating economic independence, self-reliance, self confidence, and political, social & legal awareness etc., on the other. Further, women's increased participation in entrepreneurial activities has influenced the familial decision making process too, to a considerable extent. Against this background, it was felt that a study on inclusive growth encompassing participation of unorganised sector's women in banking/financial system and entrepreneurial engagements vis a vis changing dimensions of family management would yield important clues to understanding the nature, extent and changing horizon of inclusive growth.

Review of Literature

The concept of financial inclusion is a multi-dimensional phenomenon. The review of literature available shows that a lot of investigations have been made on different aspects of financial inclusion which is summarised below:

Burgess & Pande, 2005; Clarke, Xu, & Zou, 2006; Galor & Zeira, 1993; Honohan, 2004; and Jeanneney & Kpodar, 2011 found that poverty and inequality are negatively associated with access to formal financial services, whereas Abu-Bader & Abu-Qarn, 2008; Bittencourt, 2012; Pal, 2011; and Yang & Yi, 2008 concluded that financial development and economic growth are positively associated. Beck et al. (2007) revealed that a financial system accessible to all reduces information & transaction costs, influences savings rates, investment decisions, technological innovations and long run growth. Similarly, Menon et al., (2011) argue that increased access to formal credit services augments self-employment and reduces the extent of unemployment/underemployment.

Beck & De la Torre, 2006; Chithra & Selvam, 2013; Martinez, and Hidalgo & Tuesta, 2013 recognised that demand side factors, viz; income level, educational attainment, occupational factor and household characteristics are determinants of financial inclusion. On the other hand, Burgess & Pande, 2005; Leeladhar, 2006; and Rao, 2007 found supply side factors particularly access to formal banking services as determinant of financial inclusion.

A number of studies including Cole, Sampson, & Zia, 2009; Ghosh, 2007; Gupta & Gupta, 2008; Mukhopadhyaya & Rath, 2012; Pickens, Porteous, & Rotman, 2009; Reddy, 2010; Ravichandran & Alkhathlan, 2009; and Shetty, 2008 have focussed on financial literacy, small subsidy payments, spread of mobile services and automated teller machines (ATMs), appointment of representatives or agents, mobile banking, self-help group (SHG) – Bank linkage, and microfinance institution – bank linkage programme as strategies to enhance financial inclusion. Ananth and Oncu (2013) highlighted the challenges and problems faced by people in the way of financial inclusion and emphasised on role of public sector banks and co-operative banks for betterment of financial inclusion.

In spite of a number of strategies adopted to include all sections of society in the domain of financial inclusion, Majumdar and Gupta (2013) found that households belonging to minority communities, backward classes, people who are below the poverty line, illiterate, agricultural labourers and daily wages workers remained financially excluded. Bonte and Filipiak (2012), after empirical investigation of the importance of social interaction and caste affiliation for the individual awareness of financial instruments and investment behaviour of households in India, reported a positive relationship between financial literacy and social interaction. Further, their results show that backward caste people are less aware of various financial instruments. Chavan (2007) explored the access to formal credit by rural dalits and found the increasing exclusion of rural dalits from access to formal credit from commercial banks. Bhatia and Chatterjee (2010) pointed out that non-existence of bank branches in the local area, distance of the bank from the people, fixed and limited timings of the banks, and lack of awareness as well as low income are the common reasons for financial exclusion. Chakravarty and Pal (2013) found that the level of financial inclusion is significantly influenced by the economic development of a region and its economic structure. Chakravarty & Pal 2013;

Chattopadhyay, 2011; and Sarma, 2008, computed the FII as a measurement tool of financial inclusion.

The available literature referred to above has focussed largely on the need of financial inclusion as well as the various strategies required for financial inclusion in developed and developing countries. However, no significant study has been made to find out the extent of financial inclusion, handling financial transactions & entrepreneurial activities and its impact on financial and non-financial decision making in family management. Therefore, the present study seeks to bridge the gap and intends to examine the accessibility to financial services, proficiency in handling banking transactions and entrepreneurial engagements along with observing changes in the financial and non-financial familial decision making process during post entrepreneurial engagement of women working in unorganised sector.

Objective of the Study

The specific objective of the present study is to gauge the changes discernible in modern day family management due to financial inclusion and entrepreneurial engagement of women working in unorganised sector by assessing the:

- Financial service accessibility of women,
- Women's proficiency in handling banking transactions,
- Participation of women in entrepreneurial activities, and
- Changes in the financial and non-financial familial decision making process during pre & post entrepreneurial engagement of women.

Sample Design, Data and Methodology of the Study

The scope of present study extends over three districts of eastern U.P. viz., Bhadohi, Mirzapur and Sonebhadra. The selected areas of Bhadohi district included Bhadohi city, Gopiganj & Khamariya and the selected areas of Mirzapur district consisting of Mirzapur city, Vindhyachal & Marihan, whereas the selected areas of Sonebhadra district included Robertsganj, Renukoot and Anapara. From each district one hundred women working in unorganised sector's business have been selected randomly. The selected women were working in small refreshment shops, tea shops, ladies beauty product shops, chat/burger corners and general & provision stores along with their husbands and/or other family members. Thus, a total of 300 women respondents had been selected from three districts. The primary data on various aspects of the study have been collected, using a well-structured semi-open survey schedule by a personal interview method. The survey work has been done during March-April, 2019. The data and information so collected has been tabulated, analyzed and interpreted to draw fruitful inferences fulfilling the specific objective of the study. The interpretation has been initiated with the help of relevant averages, percentages and ratios. Various journals, magazines and newspapers like Indian Journal of Commerce, Indian Journal of Economics, Finance India, Vikalpa, Times of India, Economic Times etc. have also been adhered to for the preparation of present study, besides the websites of International Labour Organisation, Microsave and several other Micro finance Institutions.

Survey Findings

General Profile of the Respondents

The distribution of the sample shows that most of the women Gram Panchayat members (77.3%) interviewed were Hindus. The caste desegregated profile of the respondents reveals that 64 percent belonged to SC/ST category, whereas, 19 percent and 17 percent of the respondents belonged to General and other backward categories. Around 88 percent of the respondents were within the age of 50 years and only around 12 percent had an age over 50 years. The distribution of sample also reveals that 94 percent of the respondents were married. Lastly, an overwhelming proportion of about 48 percent of the respondents had education up to schooling; at the same time nearly 21 percent of the respondents had education above schooling. (Table-1).

Financial Service Accessibility and Proficiency in Handling Banking Transactions

The financial service accessibility and proficiency in handling financial transactions of women respondents surveyed have been depicted in Tables 2 and 3, respectively. The analysis of accessibility to financial services finds 58.3%, 54.7%, 46.7%, and 39.7% of women respondents in the possession of saving bank account, post office saving account, mobile apps like paytm/google pay etc., and ATM/Debit cards, respectively in the surveyed area but none of the respondent possessed any credit card. Further 24.7% of the respondents had involvement with Self Help Groups/ Micro Finance Institutions. When peeped into district wise data, it is discernible that the number of holders of saving bank account, ATM/Debit Cards and mobile apps was highest in Bhadohi district. Mirzapur District had highest number of women respondents having involvement with Self Help Groups/Micro Finance Institutions and highest number of women possessing post office savings account was in Sonebhadra district.

As far as the proficiency in handling banking transactions are concerned, 18.7%, 27.3%, 16%, 14.3%, 23.7% and 41%, respectively, of the respondents reported that they are efficient and need no help in filling bank forms for opening account, cash withdrawal forms, cash deposit forms, cheque, checking pass book entries and withdrawing cash from ATM. However, an overwhelming proportion of 50.3%, 62.3%, 54.7%, 62.3%, 51% and 35.3% of the respondents reported that they need help while handling aforesaid banking transactions. Further, 14.3%, 35% and 51.3% of the respondents reported that they need help in making fund transfer through ATM, depositing cash through cash deposit machine and making & receiving payment through mobile app, respectively. However, no respondent was found efficient in transferring fund through ATM. Moreover, an overwhelming proportion of 85.7%, and 61% of the respondents reported lot of difficulty in making fund transfer through ATM and depositing cash through cash deposit machine. At the same time, 31%, 10.3%, 29.3%, 23.3%, 25.3% 23.7% and 36.3% of the respondents reported a lot of difficulty in filling bank forms for opening account, cash withdrawal forms, cash deposit forms, cheque, checking pass book entries, withdrawing cash from ATM and making & receiving payment through mobile app, respectively.

Participation of Women in Entrepreneurial Activities

Table-4 peeps into the participation of women working in unorganised sector in entrepreneurial activities in the surveyed area. The table reflects that 51.3% of the respondents are engaged in entrepreneurial activities from more than five years, 65.7% work in business for 3 to 8 hours daily and 63% did not enjoy any holiday in the week. A considerable proportion of nearly 79%, 68%, and 61%, respectively, of the respondents have been found regularly or occasionally dealing with book keeping/maintenance of accounts of business, suppliers of raw materials and other business fellows in the locality. However, the picture of women's dealing with banks/financial institutions and Government offices have not been found impressive. Only 16% and 13.7%, respectively, of the respondents reported regular dealing with banks/financial institutions and Government offices. Further, an overwhelming percentage of 64.7% and 68%, respectively, of the women working in unorganised sector in the surveyed area did not practice dealing with banks/financial institutions and Government offices at all.

Changing Dimensions of Family Management

The participation in various household decisions and control over the use of money is an important determinant of a family's management system. With the betterment of accessibility & uses of financial services and participation in entrepreneurial activities, the women are expected to play better role in general and financial management of a family. To test this hypothesis, the surveyed women respondents were asked about their role in general good and familial decision during pre-entrepreneurial engagement and post entrepreneurial engagement periods. The information was collected with regard to their participation on the issues of children's education, organising family/social functions, routine family expenditure, expenditure on children's education, expenditure on family/social functions, buying consumer durables, buying physical assets, making investment in LIC/Mutual Funds/financial instruments, taking loans and use of loans. Table-5 summarises the results of aforesaid aspects of family management. The analysis unfurls that during pre entrepreneurial engagement period only 37.3% and 28.7% of the respondents always/frequently participated in family decisions pertaining to children's education and organising family/social functions, respectively. The figure registered a considerable growth of 93.75% and 117.44%, respectively, and stepped up to 72.3% and 62.3%, respectively, during post entrepreneurial engagement period. The analysis of women's regular/frequent participation in the decisions related to routine family expenditure, expenditure on children's education & expenditure on family/social functions revealed a significant growth of 279.68%, 93.75% & 93.75%, respectively, during post entrepreneurial engagement. It has also been observed that during pre entrepreneurial engagement period only 3.7%, 7.7% and 11.3% of the respondents always/frequently participated in the familial decisions related to purchase of consumer durables, purchase of fixed assets and making investments, respectively. The participation rate of women in the familial decisions related to purchase of consumer durables, purchase of fixed assets and making investments, respectively, during post entrepreneurial period reached to commanding heights and became 61.7%, 49.3% and 65.3%, respectively. So far as the participation of women in decisions related to having loans and its use is concerned, the findings depict that only 11.3% of the respondents regularly/

frequently participated in such decisions, during pre entrepreneurial engagement. Surprisingly, during the post entrepreneurial period, a tremendous growth of 511.64% has been recorded in women's regular/frequent participation in taking & using loans. Thus, tremendous positive changes are visible in the financial and non-financial managerial dimensions of familial decision making during post entrepreneurial engagement of women. However, the study simultaneously concludes that nearly 28%, 38%, 19%, 28%, 28% 38%, 51%, 35%, 30% and 30% of women respondents did not have any saying in the familial decisions relating to children's education, organising family/social functions, routine family expenditure, expenditure on children's education, expenditure on family/social functions, buying consumer durables, buying physical assets, making investment in LIC/Mutual Funds/financial instruments, taking loans and use of loans.

Conclusion

The analysis of accessibility to financial services and proficiency in handling banking transactions revealed that a significant proportion of women working in unorganised sector in the surveyed area are in the possession of savings bank account, post office saving account, mobile apps like paytm / google pay etc., and ATM/Debit cards. When peeped into the participation of women working in unorganised sector in entrepreneurial activities in the surveyed area, 51.3% of the respondents were found engaged in entrepreneurial activities for more than five years, 65.7% work in business for 3 to 8 hours daily and 63% did not enjoy any holiday in the week. A considerable proportion of the respondents have been found regularly or occasionally dealing with book keeping/maintenance of accounts of business, suppliers of raw materials and other business fellows in the locality. Further, the analysis of participation in various household decisions and control over use of money during pre entrepreneurial engagement and post entrepreneurial engagement periods concluded tremendous positive changes in the financial and non-financial managerial dimensions of familial decision making during post entrepreneurial engagement of women.

However, the study simultaneously revealed that an overwhelming proportion of women need help in filling bank forms for opening account, cash withdrawal forms, cash deposit forms, cheque, checking pass book entries, withdrawing cash from ATM, making fund transfer through ATM, depositing cash through cash deposit machine and making & receiving payment through mobile apps. The picture of women's dealing with banks/financial institutions and Government offices has also not been found impressive. Further, nearly 28%, 38%, 19%, 28%, 28% 38%, 51%, 35%, 30% and 30% of women respondents did not have any say in the familial decisions relating to children's education, organising family/social functions, routine family expenditure, expenditure on children's education, expenditure on family/social functions, buying consumer durables, buying physical assets, making investment in LIC/Mutual Funds/financial instruments, taking loans and use of loans. Therefore, the study suggests organising workshops and practical sessions on financial literacy, handling banking transactions, dealing with banks/financial institutions Government offices & developmental agencies for enhancement of inclusive growth in the area concerned.

References

Ananth, S. & Oncu, T.S. (2013). Challenges to Financial Inclusion in India: The Case of Andhra Pradesh, *Economic & Political Weekly*, 48(7), pp: 77-83.

Bhatia, N. & Chatterjee, A. (2010). Financial Inclusion in the Slums of Mumbai, *Economic and Political Weekly*, 45(42), pp: 23-26.

Bonte,W. & Filipiak, U. (2012). Financial Literacy, Information Flows and Caste Affiliation: Empirical Evidence from India, *Journal of Banking and Finance*, 36(12), pp: 3399-3414.

Chakravarty, S.R. & Pal, R. (2013). Financial Inclusion in India: An Axiomatic Approach, *Journal of Policy Modelling*, 35(5), pp: 813-837.

Chandrasekhar, S. (2014). Reading the tea Leaves on Financial Inclusion, *Economic and Political Weekly*, 49(3), pp: 43-51.

Chattopadhyay, S.K. (2011). Financial Inclusion in India: A Case Study of West Bengal, *RBI Working Paper Series (DEPR), 8/2011*.

Chithra, N. & Selvam, M. (2013). Determinants of Financial Inclusion: An Empirical Study on the Inter-State Variations in India. [Accessed on SSRN: http://dx.doi.org/10.2139/ ssrn.2296096].

Leeladhar, V. (2006). Taking Banking Services to the Common Man - Financial Inclusion in Mumbai, Reserve Bank of India Bulletin.

Mahendra Dev, S. (2006). Financial Inclusion: Issues and Challenges, *Economic & Political Weekly*, 41(41), pp: 4310-4313.

Majumdar, C., & Gupta G. (2013). Financial Inclusion in Hooghly, *Economic & Political Weekly*, 48(21), pp: 55-60.

Martinez, C.H., Hidalgo, X.P. & Tuesta, D. (2013). Demand Factors that Influence Financial Inclusion in Mexico: Analysis of the barriers based on the ENIF survey, *Working paper No. 13/37*, BBVA, Mexico City.

Mukhopadhyaya, B. & Rath, S., (2012). Role of MFIs in Financial Inclusion, *Review of Market Integration*, 3(3), pp: 243-286.

Ramakumar, R. (2014). Mirage of Inclusion, *Frontline*, October 3, 2014.

Rao, K.G.K.S. (2007). Financial inclusion: An Introspection, *Economic and Political Weekly*, 42(5), pp: 355-360.

Ravichandran, K. & Alkhathlan, K. (2009). Financial Inclusion - A Path towards India's Future Economic Growth, [Accessed from http://ssrn.com/abstract=1353125].

Reddy, A. (2010). Rural Banking Strategies for Inclusive Growth, [Accessed from http://ssrn.com/abstract=1532226].

Sarma, M. (2008). Index of Financial Inclusion, *Working Paper No.215*, Indian Council for Research on International Economic Relations, June 2008.

Shetty, S.K. (2008). The Microfinance Promise in Financial Inclusion and Welfare of the Poor: Evidence from Karnataka, India, *Working Paper No. 205*, Institute for Social and Economic Change

Appendix

Table-1: General Profile of the Respondents

Particulars	Districts			
	Bhadohi	**Mirzapur**	**Sonebhadra**	**Total**
A. Religion				
Hindu	61	88	83	232 (77.3)
Muslim	39	12	17	68 (22,7)
Others	00	00	00	00 (0.0)
B. Caste				
General	32	11	14	57 (19.0)
OBC	26	12	13	51 (17.0)
SC/ST	42	77	73	192 (64.0)
C. Age				
Below 30	26	16	11	53 (17.6)
30-40	29	47	48	124 (41.3)
40-50	31	28	27	86 (28.7)
Above 50	14	09	14	37 (12.3)
D. Marital Status				
Married	97	93	91	281 (93.6)
Unmarried	00	02	06	08 (2.7)
Widow	03	05	03	11 (3.7)
Divorced	00	-	-	-
E. Education				
Illiterate	03	11	07	21 (7.0)
Up to Primary	12	29	31	72 (24.0)
Up to Schooling	47	51	47	145 (48.3)
Above Schooling	38	09	15	62 (20.7)
Total	**100**	**100**	**100**	**300**

Source: Primary Data

Note: Figures in brackets are respective percentages.

Table-2: District wise Financial Services Accessibility

Districts / Financial Services Accessibility	Bhadohi	Mirzapur	Sonebhadra	Total
Possession of Saving Bank account	63	54	58	175 (58.3)
Possession of Post Office Saving Account	47	55	62	164 (54.7)
Involvement with Self Help Group/ Micro Finance Institution	24	29	21	74 (24.7)
Possession of ATM/Debit Card	43	37	39	119 (39.7)
Possession of Credit Card	00	00	00	00 (0.0)
Possession of Mobile Apps like paytm, Google pay etc	53	46	41	140 (46.7)
Total	100	100	100	300

Source: Primary Data

Note: Figures in brackets are respective percentages.

Table-3: Proficiency in Handling Banking Transactions

Activities	Level of Efficiency	No.	%
a. Filling Bank Forms for Opening Account	Efficient, no difficulty	56	18.7
	Some difficulty, need help	151	50.3
	Lot of difficulty	93	31.0
b. Filling Bank's Cash withdrawal Forms	Efficient, no difficulty	82	27.3
	Some difficulty, need help	187	62.3
	Lot of difficulty	31	10.3
c. Filling Bank's cash deposit forms	Efficient, no difficulty	48	16.0
	Some difficulty, need help	164	54.7
	Lot of difficulty	88	29.3
d. Filling Cheque	Efficient, no difficulty	43	14.3
	Some difficulty, need help	187	62.3
	Lot of difficulty	70	23.3
e. Checking Pass book Entries	Efficient, no difficulty	71	23.7
	Some difficulty, need help	153	51.0
	Lot of difficulty	76	25.3
f. Withdrawing Cash From ATM	Efficient, no difficulty	123	41.0
	Some difficulty, need help	106	35.3
	Lot of difficulty	71	23.7
g. Making Fund Transfer through ATM	Efficient, no difficulty	00	0.0
	Some difficulty, need help	43	14.3
	Lot of difficulty	257	85.7
h. Depositing cash through cash deposit machines	Efficient, no difficulty	12	4.0
	Some difficulty, need help	105	35.0
	Lot of difficulty	183	61.0
i. Receiving and Making payment through Mobile App	Efficient, no difficulty	37	12.3
	Some difficulty, need help	154	51.3
	Lot of difficulty	109	36.3
Total		**300**	**100**

Source : Primary data

Table-4: Participation in Entrepreneurial Activities

Activities	Frequency	No.	%
a. Time period since engagement in business (Years)	<1	43	14.3
	1-5	103	34.3
	>5	154	51.3
b. Time spent in business per day (Hours)	<3	67	22.3
	3-8	197	65.7
	>8	36	12.0
c. Holidays enjoyed per week (Days)	0	189	63.0
	1-2	72	24.0
	>2	39	13.0
d. Deal with book keeping / maintenance of accounts of business	Yes, Regularly	131	43.7
	Yes, Occasionally	107	35.7
	No, not at all	62	20.7

Activities	Frequency	No.	%
	Yes, Regularly	94	31.3
e. Deal with suppliers of raw material	Yes, Occasionally	109	36.3
	No, not at all	97	32.3
	Yes, Regularly	48	16.0
f. Deal with banks / financial institutions	Yes, Occasionally	58	19.3
	No, not at all	194	64.7
	Yes, Regularly	41	13.7
g. Deal with Government offices	Yes, Occasionally	55	18.3
	No, not at all	204	68.0
	Yes, Regularly	79	26.3
h. Deal with other business fellows	Yes, Occasionally	103	34.3
	No, not at all	118	39.3
	Total	300	100

Source: Primary Data

Table-5: Change in Household Decisions and Control Over Use of Money

Activity	Frequency	Pre-entre-preneurial engage-ment Period		Post-entre-preneurial engage-ment Period		Change	
		N	%	N	%	N	%
a. Children's education	Always/Frequently	112	37.3	217	72.3	+105	+93.75
	Rarely	39	13.0	32	10.7	-07	-17.94
	Never	135	45.0	37	12.3	-98	-72.59
	No Response	14	4.7	14	4.7	00	00
b. Organising family/social functions	Always/Frequently	86	28.7	187	62.3	+101	+117.44
	Rarely	124	41.3	53	17.7	-71	-57.25
	Never	62	20.7	49	16.3	-13	-20.96
	No Response	28	9.3	11	3.7	-17	-60.71
c. Routine family expenditure	Always/Frequently	64	21.3	243	81.0	+179	+279.68
	Rarely	107	35.7	20	6.7	-87	-81.30
	Never	113	37.7	31	10.3	-82	-72.56
	No Response	16	5.3	06	2.0	-10	-62.50
d. Expenditure on children's education	Always/Frequently	112	37.3	217	72.3	+105	+93.75
	Rarely	152	50.7	53	17.7	-99	-65.13
	Never	17	5.7	11	3.7	-06	-35.29
	No Response	19	6.3	19	6.3	00	00
e. Expenditure on family/social functions	Always/Frequently	112	37.3	217	72.3	+105	+93.75
	Rarely	156	52.0	57	19.0	-99	-63.46
	Never	19	6.3	19	6.3	00	00
	No Response	13	4.3	07	2.3	-06	-46.15
a. Buying consumer durables	Always/Frequently	11	3.7	185	61.7	+ 174	+ 1581.81
	Rarely	49	16.3	36	12.0	-13	- 26.53
	Never	222	74.0	61	20.3	-161	- 72.52
	No Response	18	6.0	18	6.0	00	00

Activity	Frequency	Pre-entre-preneurial engage-ment Period		Post-entre-preneurial engage-ment Period		Change	
		N	%	N	%	N	%
f. Buying physical assets	Always/Frequently	23	7.7	148	49.3	+ 125	+ 543.47
	Rarely	46	15.3	43	14.3	-03	- 6.52
	Never	184	61.3	93	31.0	- 91	- 49.45
	No Response	47	15.7	16	5.3	-31	- 65.95
g. Making investment in LIC/Mutual Funds/financial instruments	Always/Frequently	34	11.3	196	65.3	+ 162	+ 476.47
	Rarely	47	15.7	26	8.7	-21	- 44.68
	Never	201	67.0	56	18.7	-145	- 72.14
	No Response	18	6.0	22	7.3	+ 04	+22.22
h. Taking Loan	Always/Frequently	34	11.3	210	70.0	+ 176	+ 517.64
	Rarely	65	21.7	62	20.7	-03	- 4.61
	Never	179	59.7	26	8.7	-153	- 85.47
	No Response	22	7.3	02	0.7	-20	- 90.90
i. Use of Loan	Always/Frequently	34	11.3	210	70.0	+176	+517.64
	Rarely	65	21.7	62	20.7	-03	-4.61
	Never	179	59.7	26	8.7	-153	-85.47
	No Response	22	7.3	02	0.7	-20	-90.90
	Total	**300**	**100**	**300**	**100**	-------	-------

Source: Primary Data

ISSN 2249 - 9040 Volume 9, No 1, January-June 2019 pp. 59-67

A Study of Exports and Imports from the Perspective of India

M. Maschendar Goud[1]
V. Usha Kiran[2]

Abstract

The Indian economy is often termed as a mixed economy, referring to a blend of public control over important areas of industrial development combined with some freedom for private enterprises. The main characteristic of India's trade regime is import substitution. Indian economy transformed with economic reforms and witnessed openness in trade and commerce which resulted in a significant increase in both exports and imports. Exports and imports of a country are related to economic variables in a non-uniform and asymmetric ways and the result has often been disequilibrium in the balance of payments of the new transition economies. From this perspective it is imperative to see whether exports and imports are interrelated. This study examines the framework between exports and imports in India. It implies a long-run equilibrium relationship between exports and imports and mainly depends upon secondary data sources. There by analysing the trends in exports and imports from the angle of commodities, services to/from different countries.

Keywords: Balance of Payments, Foreign Policy, Recession, Rupee Devaluation

Introduction to Imports and Exports

Economy of the nation and its success depends on the ability of the country in terms of management of exports and imports. Export is literally selling the home country's goods/services in a foreign country. And import refers to buying of goods and services from foreign/host country to home country. Export and import are part of international trade between nations. Export / import are the first step in international business operations. Though there are conditions about the payment for the goods so dispatched must be realized in the exporter's country, still exports is considered as vital part of country's economy. Efficient allocation of resources, better capacity utilisation, exploitation of economies of scale and technological improvement, results in competition in foreign markets.

Both export and import have implications on the home country. Export generates

1 Research Associate, Institute of Public Enterprise, Osmania University Campus, Hyderabad and can be reached at maschendargoudgoud@ipeindia.org

2 Professor at Department of Commerce, Osmania University, Hyderabad and can be reached at usha_ou@yahoo.co.in

foreign exchange earnings. Yielding better profits through improved quality. Further, export enables the access to new markets through capacity utilisation. On the other side, import leads to foreign exchange outlay. Further it makes availability of scarce/unavailable inputs. Imports will help the host countries to get equipped with technical know-how. It is one of the aid to exports to the host country. Further, regular imports will build good relations with countries.

Different people, firms and companies will approach different motivating factors which enable them to get into international trade with exports. Some of the important considerations for common motivators include proactive reactive factors. The proactive factors which encourage exports are the better profits, gaining technological edge, yield of tax incentives, managerial initiative. Exporting will help generate scale economics through innovation with information advantage being a valuable asset to the exporting nations.

The reactive measures include domestic market saturation, competitive pressures from the countries which engage in exporting of same goods/services. Further excessive export creates a problem of poor domestic response. The production often overruns and there will be an easy access to customers and ports. Positive net exports contribute to economic growth, something that is intuitively easy to understand. More exports mean more output from factories and industrial facilities, as well as a greater number of people employed to keep these factories running. The receipt of export proceeds also represents an inflow of funds into the country, which stimulates consumer spending and contributes to economic growth. Conversely, imports are considered to be a drag on the economy, as can be gauged from the GDP equation. Imports represent an outflow of funds from a country, since they are payments made by local companies (the importers) to overseas entities (the exporters). A high level of imports indicates robust domestic demand and a growing economy. It's even better if these imports are mainly of productive assets like machinery and equipment, since they will improve productivity over the long run. A healthy economy, then, is one where both exports and imports are growing, since this typically indicates economic strength and a sustainable trade surplus or deficit. If exports are growing rapidly and imports have declined significantly, it may indicate that the rest of the world is in better shape than the domestic economy. Conversely, if exports fall sharply but imports surge, this may indicate that the domestic economy is faring better than overseas markets. Proper import administration is essential for ensuring free inflow of goods and services to a home country. Tariffs, quotas, and government subsidies stand in the way of free flow of goods and services. The principal objective of import administration is to enforce proper anti-dumping measures and implement fair trade practices across borders. Competitive import trade environment helps in increasing inflow of foreign funds to a home country. It also increases competitiveness of the domestic market.

Need and Importance of the Study

The study on 'A Study on Exports and Imports from the Perspective of India' is an important issue which provides guidelines for understanding the core value provided by the exports and imports of the nation. As the exports and imports are the key eyes of the economic growth of the nation, understanding about the present exports and imports system will give a better look at the present scenario of India pertaining to exports and imports. Further, it provides a valuable input for the researchers to obtain the base for the various issues pertaining to India's exports and imports with a special focus on the recent trends. The study further provides the results on impact of foreign trade policy and the impact of recent factors like recession and rupee devaluation on the imports and exports.

Review of Literature

Through this paper, an attempt has been made to thoroughly investigate the studies made for better understanding of the exports and imports from the perspectives of India. Some of the important references are specified below.

Sinha's (1999) study, 'to the best of our knowledge is essentially a first time-series econometric exercise', to look at the relationship between export instability, investment and economic growth in 9 Asian countries. The study discovers a negative relationship between export instability and economic growth for Japan, Malaysia, Philippines and Sri Lanka and establishes a positive relationship for South Korea, Myanmar, Pakistan and Thailand. In the case of India the results are mixed because an identification problem arises with two cointegrating vectors. To address the over identifying problem Sinha's study need to impose two exactly identifying restrictions on each of the co integration relations so that a unique long-run structure can be identified.

Kishan K Kaushik et al.(2000) in their contribution on exports instability and economic growth have critically examined the impact of exports, export instability, imports and terms of tad eon economic growth in the context of a multivariate error-correction model. The empirical results show that export instability adversely affects the short-run stability and positively longer-run growth of income and the long-run estimates are statistically significant. In the long-run, the error correction term, δ, for the real GDP equation is -0.27. This indicates fairly rapid adjustment towards the long-run equilibrium level in the current period, with full adjustment taking as much as four years.

A joint paper by Laszlo Konya and Jai Pal Singh (2006) has focused on the impact of WTO on India's exports and imports. The authors have opined that with the advance to WTO, India entered into the sea of trade reforms in 1991 and has received the significant position in the world's economy. Further, the authors have viewed exports and imports jointly and individually, Graner-cause GDP (supporting the ELG and ILG hypotheses), as conformed by the Wald and M Wald tests in the bivariate and trivatiate frameworks alike. Finally, the authors have concluded that there is also evidence of GDP and exports jointly ranger-causing imports, and GDP and imports jointly Granger-causing exports, while the growth driven export/imports (GDE/GDI) hypotheses seem implausible in case of India.

Kemal et al. (2002), in his study on exports and imports implications to India has proved that, the long-run exports can have beneficial effect on the economic growth in a variety of ways. The authors have opined the impact of exports on India through four distinct stages. First, export production allows economies with narrow domestic markets to overcome size limitations and to reap economies of scale. Second, by relaxing the foreign exchange constraints, higher exports can permit higher imports of capital goods thereby strengthening the productive capacity of the economy. Third, exports lead to an improvement in economic efficiency by enhancing the degree of competition. Fourth, exports contribute to productivity gains through diffusion of technical knowledge and learning by doing.

According to the studies by Thangavelue and Rajaguru (2004), in India and in several other Asian countries imports tend to have long run 'virtuous cyclical' effect on labour productivity, more than exports. They suggest that exports and imports are both important for an outer-oriented economic strategy. Similarly, the empirical evidence reported by Lee (1995) indicates that imports have a positive effect on long-run output growth. In particular, imports could be an important vehicle and source to assess foreign technology for developing countries.

The study made by Upender M (2007) on long run equilibrium between India and exports and imports has analyzed during 1949-50 and 2004-05. The empirical results based on unit root tests, cointegration and error correction modeling exemplifies that the exports and imports are cointegrated showing existence of long run equilibrium between India's exports and imports.

The studies have proven that exports and imports growth have clearly achieved a great significance in the Indian market despite the challenges that have been taking place in the recent past. The studies clearly show that exports can boost output growth in the short-run by allowing the use of excess capacity in cases where the domestic demand requires less than full capacity production.

Objectives of the Study

The present paper mainly focuses on the following objectives.

- To present the overview of India's exports to other countries
- To present the overview of India's imports from other countries
- To analyse the exports and imports of India to other countries.

Methodology of the Study

The present article is mainly based on the secondary data sources. The references for the literature has been collected from various articles published offline from various journals, magazines, books and also through online resources. Further, the reports including RBI bulletin, EXIM bank reports, reports released by Government of India through ministry of commerce, ministry of foreign affairs. Further, the news is also collected from the various business magazines and news papers. The statistical reports have been gathered from the upgrade reports released latest by 1st February, 2014.

Overview of Exports and Imports of India

Imports and exports are the two important components of a foreign trade. Foreign trade is the exchange of goods and services between two countries, across international borders. 'Imports' imply the physical movement of goods into a country from another country in a legal manner. In India, exports and imports are regulated by the Foreign Trade (Development and Regulation) Act, 1992, which replaced the Imports and Exports (Control) Act, 1947, and gave the Government of India enormous powers to control it. Besides this Act, there are some other laws which control the export and import of goods. These include Tea Act, 1953, Coffee Act, 1942, Rubber Act, 1947. Further, several inputs have been taken from Marine Products Export Development Authority Act, 1972, Export (Quality control and Inspection) Act, 1963 and Tobacco Board Act, 1975. At the central level, the Ministry of Commerce and Industry is the most important organ concerned with the promotion and regulation of the foreign trade in India. The Ministry has an elaborate organizational set up to look after the various aspects of trade. Within the Ministry, the Department of Commerce is responsible for formulating and implementing the foreign trade policy. An attempt is made to examine the value of exports and imports made by the Indian companies.

Table-1: Exports and Imports During 2002-03 to 2012-13

Year	Exports	Year	Imports	Trade Gap	Trend
2002-03	52,719	2002-03	61,412	-8,693	100
2003-04	63,843	2003-04	78,149	-14,307	96.33
2004-05	83,536	2004-05	1,11,517	-27,981	62.33
2005-06	1,03,092	2005-06	1,49,167	-46,075	57.59
2006-07	1,26,414	2006-07	1,85,735	-59,321	62.21
2007-08	1,63,132	2007-08	2,51,654	-88,522	46.51
2008-09	1,85,295	2008-09	3,03,696	-1,18,401	31.16
2009-10	1,78,751	2009-10	2,88,374	-1,09,621	24.2
2010-11	2,51,136	2010-11	3,69,769	-1,18,633	14.7
2011-12	3,05,965	2011-12	4,89,319	-1,83,356	7.51
2012-13	3,00,402	2012-13	4,90,738	-1,90,336	4.57
Total	**17,61,563**	**Total**	**27,18,116**	**-956553**	**64.81 %**

Source: Ministry of Commerce, Data Bank as on 1st February, 2014

The above table shows that the exports and imports increased considerably from 2002-03 to 2012-13. Exports stood first in 2011-12 where the imports stood second occupied first position in the trade gap of -1, 83,355.57 with trend of 14.71% , the trend gap decreased with 7.51% when compared to previous year 2010-11. The above table shows that the India's Exports are continuously increasing and at the same time the imports are also highly increasing. Exports decreased in 2009-10 and at the same time imports also decreased equally with same decreased rate of trade gap with trend 24.20%. The overall observation shows that the imports increased highly more than 50% than exports with trade gap of -956553.15.

Table-2: Scenario of Value of Exports to Other Countries

Country	2015-16 (Value in lakh rupees)	% Share	2016-2017 (Value in lakh rupees)	% Share	% Growth
Australia	2,133,163	1.24	1,988,634	1.07	-6.78
Austria	222,763	0.13	258,144	0.14	15.88
Bangladesh PR	3,952,725	2.30	4,512,682	2.44	14.17
China P RP	5,893,274	3.43	6,841,753	3.69	16.09
France	3,032,589	1.77	3,304,192	1.78	8.96
Germany	4,645,671	2.71	4,836,538	2.61	4.11
Iran	1,817,671	1.06	1,604,563	0.87	-11.72

Country	2015-16 (Value in lakh rupees)	% Share	2016-2017 (Value in lakh rupees)	% Share	% Growth
Iraq	654,976	0.38	748,365	0.40	14.26
Japan	3,043,354	1.77	2,585,237	1.41	-15.05
Pakistan IR	1,428,631	0.83	1,228,935	0.66	-13.98
Russia	1,040,891	0.61	1,295,097	0.71	24.42
Switzerland	642,129	0.37	655,730	0.35	2.12
Syria	89,610	0.05	82,089	0.04	-8.39
Taiwan	932,864	0.54	1,469,978	0.79	57.58
United Kingdom	5,777,140	3.37	5,738,698	3.11	-0.67
U S A	26,385,928	15.37	28,380,653	15.32	7.56
India's Total Export	**171, 637, 805**		**185, 233, 966**		**7.92**

Source: Ministry of Commerce, Data Bank as on 1st February, 2014

The study on value of exports released by Ministry of Commerce for select countries are clearly showing that, 'China' is the only Asian nation, where the value of exports from India has declined during the period 2011-13. The percentage of share to China is still at a health rate of 4.49% but has recorded negative growth. When it comes to the growth of exports of the select nations, it is clearly observed that Iraq has reported highest growth rate, i.e., 88% for the exports. And, the rich countries including Japan, Switzerland UK, USA have clearly shown that, the highest growth percentage for the last two financial years is clearly for USA. Overall, the figures have clearly shown that India's exports to the select countries have shown positive with a healthy growth rate from 2011-2012 to 2012-13 period.

Table-3: Scenario of Value of Imports from Other Countries

Country	2015-16	% Share	2016-17	% Share	% Growth
Australia	5,818,067	2.34	7,486,443	2.90	28.68
Austria	542,210	0.22	608,498	0.2	12.23
Brazil	476,707	0.19	472,163	0.18	-0.95
Canada	40,404,338	16.22	41,112,50	15.95	1.75
China	2,442,014	0.98	3,826,384	1.48	56.69
France	7,909,818	3.17	7,770,424	3.01	-1.76
Iran	4,082,287	1.64	7,047,761	2.73	72.64
Iraq	7,056,430	2.83	7,847,561	3.04	11.21
Russia	6,449,315	2.59	6,542,497	2.54	1.44
South Africa	288,450	0.12	306,113	0.12	6.12
Switzerland	2,998,647	1.20	3,718,034	1.44	23.99
United Kingdom	12,607,429	5.06	11,561,929	4.49	-8.29
U S A	26,559	0.01	21,639	0.01	-18.52
India's Total Imports	2,192,053	0.88	2,107,630	0.82	-3.85

Source: Ministry of Commerce, Data Bank as on 1st February, 2014

The above table clearly shows that the value of imports have lowered down lower from the period 2011-2012 to 2012-2013 for the select countries. The highest negative has shown for South Africa, where the value of imports got declined completely. Further, Brazil and USA have shown highest among the nations which have shown highest positive among the select nations. Further, the lowest positive growth in imports is shown for United Kingdom. The total value of India's total import including 235 nations has shown 234,546324.45 lakh rupees for 2011-2012 period and it has increased to 266,916195.69 by achieving a positive growth rate of 13.8%. Overall, the statistics have clearly shown that despite the negative growth for majority of the select nations, yet India has been able to achieve considerable in all the countries where it imports.

Exports and Imports Regulation in India: Framework

In India, the regulation on exports comes under Commerce Ministry and governed by the Director General of Foreign Trade which governs exports and imports. Further, the ministry announces the Foreign trade Policy which is also called as Exports and Imports Policy (EXIM policy) for certain periods from time to time. The guidelines for all international trade transactions in India are made through the guidelines of foreign trade policy.

The present foreign trade policy came into effect from 27th August, 2009 and remained upto 31st March, 2014. The central government reserves the right I public interest to make any amendments by notification to this policy in exercise of powers conferred by Section 5 of FT (D & R) Act.

The Foreign trade policy governed by the central government works for the objectives which include acceleration of the economy from low level of economic activities to high level of economic activities by making it a globally oriented vibrant economy and to derive maximum benefits from expanding global market opportunities. Further the policy targets to stimulate sustained economic growth by providing access to essential raw materials, intermediaries, components, consumables and capital goods required for augmenting production and also to enhance techno local strength and efficiency with new employments. The foreign trade policy has been crated to enhance the opportunities and encourage the attainment of international accepted standards of quality.

Conclusions & Suggestions

Imports and exports are very crucial for economic relations between two countries on which the development of these countries depends and it plays a significant role in the development of the country. From the observations on imports and exports, it is clear that government of India has made a strong foundation and regulation for the flow of imports and exports in India. With reference to recent scenario of exports, it is clearly understood that the exports to developed countries like USA, UK, Switzerland, the value of exports is increasing which is a positive sign due to the value of return and exchange rate of currency. But, the development of exports to neighbouring countries like China is negative and this shows the lack of resources for exports. Despite value of exports to USA is high, the value of imports from USA is also shown high and this shows the equilibrium stage to exports and imports. Further, the value of imports is shown extremely high than compared to value of exports. Overall, the scenario of flow of imports and exports made clear picture of domination of imports.

With reference to regulatory framework, the present Exports and Imports policy has shown to end up by 2014 and the present experience of actual imports and exports perspective of India has shown that the policy created for exports and

A Study on Exports and Imports from the Perspective of India 66 imports are achieving the desired results so expected. Still, the rising gap between imports and exports value shows that India need to achieve a lot in matching the value of imports with exports value.

With reference to influencing factors for exports and imports, the affect of economic crisis has largely affected India's exports and imports but larger impact was eight year beginning from 2008 to 2016. Due to domestic driven nature of India's businesses, the sub prime turmoil has made less impact on the value of exports and imports.

The policy factor of the government of India is altogether responsible to increase such kind of pathetic environment and situation. The declining value of Indian rupee has been significant with the predictions showing worse for the next 6 months due to lower growth rate in all sectors and worrying concerns of global economic growth. The short term measures from RBI and statements of ruling government will temporarily restrict the decline. Due to short term strategies and actions, the long term survival of Indian rupee is still on the cards. The lessening value of denomination especially in comparison with US dollar, British pound sterling and Euro currency, the sectors depending on foreign projects will have to face a deep crisis in coming days. The rising inflation due to the devaluation of rupee will show its verse effects on the purchasing capacity of the people and in turn the production and GDP rate will further decline. Effective planning and implementation of both short term and long term policies and practices by RBI, government and the awareness of the people with reference to limited consumption of gold and other imports will help the rupee to regain the strength in comparison to other countries' value of currency.

Stronger organizational risk culture both by regulatory and the government would help improving risk management Liberalized decision implementation of FDI inflows, enhanced FII limits in government and corporate bonds will be the available options to make remedial measures for improving Indian economy by better exports and imports pattern.

References

Devika Johri & Mark Miler (2008). Devaluation of the Rupee: Tale of Two Years, 1966 and 1991, State, Market & Economy, Centre for Oil Society.

Chaturvedi et al. (2005). *Managing Global business, A strategic perspective*, Excel Books.

Sinha, D. (1999). Export Instability, Investment and Economic Growth in Asian Countries: A Time Series Analysis, *Discussion Paper No. 799*, Economic Growth Center, Yale University.

Kishan K Kaushik & Kur K Klein (2003). "Does exports instability depress economic growth ? Evidence from error-correction models", paper submitted to University of Lethbridge, Lethbridge ABT1K3M4, [Available at: www.hss.iitb.ac.in/ties07/paper/ts3/psD/1.doc]

Laszlo Konya & Jai Pal Singh (2006). Exports, imports and economic growth in India, *Discussion paper No.A06.06*, submitted to La Trobe University, Melbourne, Australia, December.

Kemal, A.R. & Colombage, S. S. (2002). Export and Economic Growth in South Asia, South Asia network of Economic Research Institutes, [Available at:http://www.saneinetwork.net/]

Thangavelu, S.M. & Rajaguru, G.(2004). Is there an export of import-led productivity growth in rapidly developing asian countries? A Multivariate V AR analysis, *Applied Economics*, Vol.36, pp:1083-93.

Upender, M. (2007). Long run Equilibrium between India's exports and imports during 1949-50 to 2004-05, *Applied Econometrics and International Development*, 7(1).

Mridul Purohit, Declining rupee, *The Hindu*, 29th June, 2013..

Reports

Report of World Bank on growth indicators of India, for the period 2011-12, and 2012-13.

Central Statistics Office report on Sectoral share in GDP % for the period 2005 to 2013 (as on 30th August, 2013).

Report of RBI with reference to Inflation in India as on 14th July, 2013.

RBI report on Foreign exchange rates for the period 2007-2013

RBI report on Foreign exchange reserves for the period 2008-2013..

Websites

http://www.livemint.com/Home-Page/1vJJst0nIVokiAisZ91zpI/Rupees-record-slide-brings-pain-and-gain-for-India.html

http://commerce.nic.in/eidb/icnt.asp

http://www.managein.net/bk_issue/abst_5_4.htm

http://business.gov.in/legal_aspects/import_export.php

http://commerce.nic.in/ftpa/default.asp

http://www.ccs.in/ccsindia/policy/money/studies/wp0028.pdf

www.hss.iitb.ac.in/ties07/paper/ts3/psD/1.doc

http://www.saneinetwork.net/

ISSN 2249 - 9040 Volume 9, No 1, January-June 2019 pp. 68-84

Shared Leadership in Teams and Its Impact on Team Effectiveness: Moderating Effects of Variables

Sunita Mehta[1]
Suryakant Sharma[2]

Abstract

Purpose

This paper investigates the relationship between shared leadership behaviours and team effectiveness, also analyses how other team constructs like team size, member proximity and team diversity moderate the relationship between shared leadership and team effectiveness.

Design / Methodology

Primary data has been collected from employees working in IT companies who work in teams only. The hypothesis formulated for the study was tested using Pearson's correlation and hierarchical regression.

Findings

The major findings indicate that there is a significantly positive relationship between shared leadership behaviours, team effectiveness and the relationship is moderated significantly by team constructs like team diversity and member proximity, however, not by team size.

Practical Implications

The practical implications of the study is that while working in teams, managers should encourage shared leadership behaviours among team members by emphasizing on collaborative behaviours.

Keywords: Leadership, Member Proximity, Shared Leadership, Team Diversity Team Effectiveness, Team Size

Introduction

The current times which require the organizations to be agile, adaptive and resilient to the changing environment, have brought out significant changes in the way the organizations operate. The organizations have become flatter and the hierarchical structures have been broken down to make way for employee involvement,

1 Researcher, Indian School of Business, Hyderabad and can be reached at:sunitamehtasks@yahoo.com

2. Research Scholar, XLRI, Jamshedpur and can be reached at: suryakantsharma@yahoo.com

decentralization and collaboration. Many tall and hierarchical organizations have metamorphosed into teams which are involved in various critical activities of the organizations. These teams no longer have professionals from the same functional area but have members from diverse areas. The team structures have made the organizations flexible and responsive which is necessary to stay competitive in their business. The team members have authority and autonomy to make decisions, the implications of which are that work processes do not have a traditional hierarchy but have evolved towards the teamwork (Sennett, 1998).

The importance of leadership in teams cannot be undermined because without leadership, team members are unlikely to identify with team objectives. However, the leadership of these organizations has also undergone a revolutionary change. The traditional models of leadership which were dependent on the wisdom and competence of a single leader have become irrelevant. In fact, team structures tend to reduce the dependence on conventional leadership figures. Also, the growing volatility, complexity, ambiguity and uncertainty of the business environments have made the actions and decisions of a sole leader not viable and require highly competent and empowered expert teams in which leadership emerges from the team itself (Day, Gronn & Salas, 2004). It is imperative for today's organizations to decentralize decision making and not push it to the top as it would handicap the organizations and would make them vulnerable. Instead, Pearce, Manz & Sims (2009) suggested that leadership needs to be more evenly shared across the organization to ensure faster response times for environmental demands.

As organizations de-layer and restructure into teams, there is a need to understand what constitutes collective or shared leadership and how does it emerge in teams. How can "shared leadership" within and between organizational boundaries be effectively developed? There are various team constructs like team size, team cohesiveness and team diversity which have an impact on shared leadership and how does it further impact team effectiveness. This paper attempts to provide answers to above questions and also build a model to understand the impact of shared leadership in teams on team effectiveness and analyse some of the moderating variables in the relationship.

Shared Leadership

Most of the leadership research till the last decade focused on individual characteristics, traits, behaviours and styles, and as opposed to group characteristics (Miller, Walmsley, & Williams, 2007; Yukl, 2006). The idea of sharing leadership among individuals in organizations or in teams is not new, as Sally (2002) brought out that shared leadership had existed since ancient times in Republican Rome which had a successful system of co-leadership that lasted for over four centuries. This structure of co-leadership was so effective that it extended from the lower levels to the very top position. A study conducted by O'Toole et al. (2002) in current organizations found several instances wherein leadership was shared at the top levels and also displayed high levels of team effectiveness.

In the Indian context also there are ample examples of shared leadership at top levels as given below:

- Wipro made two CEOs Girish Paranjpe and Suresh Vaswani in 2008. Azim

Premji the chairman of Wipro opined that, given the size of business and the ambitions that the company has for the business, a two-man team would be stronger than one man at the top. However, the model did not reap the desired results and TK Kurien took over as CEO in 2011.

- When Merck, a US based pharmaceutical company acquired Schering-plough in 2009, it decided to have two managing directors (MD) for the merged entity instead of one. Naveen A Rao continued to head Merck's subsidiary MSD Pharmaceuticals in India and K G Ananthakrishnan retained his position as MD of Schering-Plough's subsidiary Fulford India. This was explained by Merk as the 'Power of Two'.
- In 2009, Tata Steel also appointed Kirby Adams and H M Nerurkar as MDs after the high-profile B Muthuraman retired and was appointed vice-chairman.

At pharmaceutical giant Cipla, Amar Lulla and M K Hamied were joint MDs for many years, though Chairman and Managing Director Y K Hamied led the company, till Amar Lulla passed away in 2011.

The e-commerce giant Flipkart co-founders Sachin and Binny Bansal are another good example of shared leadership who started the venture together. They strongly believed that having a cofounder helped them get through the ups and downs of starting up.

What is Shared Leadership?

Conger and Pearce (2003) defined shared leadership as "A dynamic, interactive influence process among individuals in groups for which the objective is to lead one another to achieve group or organizational goals or both". Shared leadership is called by different names: distributed leadership (Gronn, 2000), collective leadership (Denis et al. 2001), co-leadership (Heenan and Bennis 1999), collaborative leadership (Rosenthal 1998) and emergent leadership (Beck 1981). Shared leadership emerges in a team mainly due to the distribution of leadership influence across multiple team members and is entrenched in the interactions among the team members. Thus, "leadership is, therefore, not determined by positions and authority but rather by an individual's capacity to influence peers and by the needs of the team in any given moment" (Pearce & Conger, 2003).

The new perspective of shared leadership emphasizes on the process of shared influence between and among individuals. Unlike traditional models of leadership, wherein only one individual projects influence downward on others, shared leadership influence may be lateral, upward or downward (Pearce & Sims, 2000). A shared leadership approach shifts focus from an individual perspective to a group perspective (Avolio et al., 2003; Fletcher & Käufer, 2003). In fact, power in shared leadership is decentralized and is broadly distributed among a set of individuals instead of being centralized in the hands of a single individual who acts in the role of a superior (Pearce & Conger, 2003). In shared leadership models, it is imperative for employees to share information and communicate regularly, acknowledge the competencies of others and be accountable for the various team goals, where as hierarchical leadership requires a single person to actively instil such behaviours in others.

The essence of shared leadership appears to be in its informal, dynamic and emergent nature, which allows leadership to develop and change amongst group members according to task requirements, providing high levels of autonomy, participation and cooperation (Gibb, 1954; Pearce, Manz, & Sims, 2009; Yukl, 1989).

Benefits of Shared Leadership

The research on shared leadership is still at its infancy, however, notable benefits have been realized by organizations. The shared leadership model stimulates a flat organization instead of a hierarchically structured company which becomes more responsive, agile and resilient and it also provides its leaders the opportunity to focus on the areas in which they are most talented and to hire team members who are experts in their specific domains. This also provides individuals an opportunity to show proficiency in their areas of expertise. O'Toole et al. (2002) opined that in current times the challenges faced by an organization are so complex and ambiguous that they require a broad set of skills which are difficult to be possessed by any one individual, therefore, two or more leaders are better than one. This was also supported by Waldersee and Eagleson (2002) who conducted a study in a hotel and found that during times of change and reorientation, shared leadership between two leaders, one being task-oriented and other behaviour-oriented, would result in greater success than leadership by one person alone who would probably be able to display a single style of leadership.

A study by Miller et al. (2007) found shared leadership in teams increased empowerment, collaboration, decision-making, accountability, improved client outcomes, strengthened sense of purpose and overall effectiveness. Additional positive outcomes of shared leadership are increased job satisfaction, better communication (Walker, 2001) and reduced attrition (Henderson-Loney, 1996). Koschzeck (2009) during his two year experience with a self-directed work team found that shared leadership resulted in a higher degree of engagement, responsibility and enthusiasm. Similarly, Wheatley (2006) stated that people worked for what they create and there would be more buy-in to the goals, visions, and working processes of an organization if people felt included.

Shared leadership has been found to be especially relevant to some work contexts like the creative industries (Pearce, 2004). Creativity and innovation require a climate of collaboration and autonomy amongst group members of diverse backgrounds for idea generation. Shared leadership is also appropriate in teams where members have highly specialized skills or roles and communication and collaboration between members is critical (Carson, Tesluk, & Marrone, 2007), such as the pharmaceutical, electronics, chemicals, software, and fast-moving consumer goods industries (Pearce & Manz, 2005). Kocolowski (2010) opined that shared leadership was particularly pertinent and imperative in the development and growth of new ventures. This has been seen in companies like Flipkart, Snapdeal, Excel Entertainment which are new ventures and have shown tremendous growth in recent times using the concept of shared leadership.

Pitfalls of Shared Leadership

The old adage that two heads are better than one could be used to highlight the benefits of shared leadership. Similarly too many cooks spoil the broth stresses that there are some negatives to shared leadership. Kouzes & Posner (2002) opined that ineffective shared leadership may result in inability or avoidance of critical decision making due to over reliance on collaboration and also people who are not capable or ready might be given too much responsibility. Koschzeck (2009) found team members lacking trust could result in individual groups, or cliques being formed pursuing their own personal agendas and goals which are detrimental to teams having shared leadership. Also, shared leadership required leaders to disperse power, authority and decision making which is not always the easiest thing for the leaders to do. Steinert et al. (2006) brought out in their research that most organizations gave few incentives to take on leadership positions, and also found that there were concerns that having more leadership positions might even lead to a greater bureaucracy.

Though there are positives and negatives of shared leadership, however it is imperative to recognize that a leader is not able to exercise greater influence than other members unless that suits the group. Therefore, an individual leadership vis-à-vis shared leadership depends upon the context and what is more effective is dependent on the followers and the situation. However, for taking advantage of the benefits of shared leadership, members must communicate regularly, recognize the special expertise of others and share responsibility for group processes and outcomes.

Shared Leadership and Its Impact on Team Effectiveness with Moderating Variables

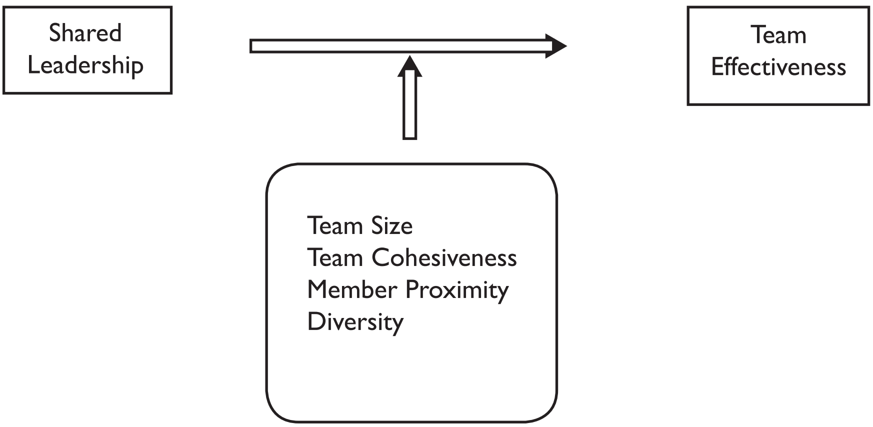
There are many studies which have examined the relationship between shared leadership and team effectiveness (Bergman et al., 2012; Boies et al., 2010; Ensley et al., 2006; Pearce & Sims, 2002; Wang et al., 2014). However, very few studies have examined the antecedent variables that influence shared leadership and its impact on team effectiveness (Carson et al., 2007; Hoch et al., 2010; Small & Rentsch, 2010). As shared leadership is considered more as a team process, an empirical analysis of the antecedent variables would provide a richer understanding of the nature of shared leadership and its impact on team effectiveness. McGrath (1964) proposed a number of antecedent variables like individual level factors (skills, attitudes, personality characteristics), group level factors (group structure, level of cohesiveness, and group size), and environmental level factors (task characteristics, reward structure, and environmental stress) that influence team processes and outcomes, to understand shared leadership's association with team effectiveness.

Pearce (2004) identified three variables from the task perspective which can impact shared leadership, namely interdependence; creativity; and complexity. Tesluk et al. (1997) found that the more interdependent the tasks are, the greater is the importance of team cohesion and collaboration. Creativity requires ideas from numerous people and confirming the same, Leana (1985) in a study found that teams having participative leaders generated more ideas compared to teams having directive leaders, suggesting that creative tasks requires involvement of team members and a participative style of leadership. In another study by Yang et al. (2011), it was found that projects with high levels of complexity were more likely to be successful if there was a high level of communication, collaboration and cohesiveness within the team. Shared leadership can be considered to be more effective than vertical leadership in tasks which are complex, require creativity and are interdependent (Day, Gronn, & Salas, 2004).

Other factors which can have an influence on shared leadership are team size, team member competencies and team cohesiveness. Team size is an important variable for shared leadership to thrive and team members should only be included if their competencies can add value to goal accomplishment. Kerr (1989) found larger teams experience greater dysfunction than smaller teams and can be an impediment to shared leadership. Team cohesiveness builds in trust due to strong inter-personal ties (Thambain, 2004) which in turn is likely to enable shared leadership.

Other factors which can have an impact on the effectiveness of shared leadership and needed to be tested are proximity of members and diversity of team members. The proximity of the team members would enhance communication flows amongst the members enabling building trust. Similarly, diversity of team members would result in team members having different values, beliefs and perceptions. This would reduce trust amongst the members and would be an impediment to shared leadership. Keeping all the antecedent variables in mind as proposed by various researchers, the model for proposed relationships is shown in Figure-1.

Figure-1: Theoretical Model of Shared Leadership and Team Effectiveness with moderating variables



Source: Authors' analysis

Having defined and identified the various benefits and pitfalls of shared leadership, it is also important to understand its relationship with team constructs such as team size, team cohesiveness, proximity of members, diversity of members, members' ability and also task characteristics like task complexity, task interdependence and creativity. This paper attempts to conduct an empirical study to ascertain the impact of the factors on shared leadership and its association with team effectiveness.

Hypotheses

The various hypotheses which would be tested in this study are as given below:

Various studies (Miller et al., 2007; Walker, 2001; Henderson-Loney, 1996) found that shared leadership in teams' increases collaboration, results in effective decision-making, heightens accountability, improves client outcomes, strengthens sense of purpose, increases job satisfaction and communication and enhances overall team effectiveness. Therefore, it is important to examine relationship between shared leadership and team effectiveness in teams.

H_{01}: There is no relationship between shared leadership and team effectiveness.

H_{a1}: There is a relationship between shared leadership and team effectiveness.

Having a right team size is very important for shared leadership to thrive. Mueller (2012) found that team size negatively impacts team performance. Therefore, it is imperative to examine how the relationship between shared leadership and team effectiveness is moderated by team size.

H_{02}: The relationship between shared leadership and team effectiveness is not moderated by team size.

H_{a2}: The relationship between shared leadership and team effectiveness is moderated by team size.

The proximity of team members in a team enhances communication flows amongst the members and helps in building trust and enables a collaborative approach in problem solving which is of utmost importance for enabling shared leadership behaviours. Therefore, it is imperative to examine how the relationship between shared leadership and team effectiveness is moderated by member in proximity.

H_{03}: The relationship between shared leadership and team effectiveness is not moderated by proximity in team members.

H_{a3}: The relationship between shared leadership and team effectiveness is moderated by proximity in team members.

There are various studies which have found that team diversity variables like age, gender, culture impact team performance (Mathieu et al., 2008; Williams & O'Reilly, 1998). Also, a study by Hoch (2014) found that shared leadership was more strongly associated with team performance in more diverse teams and less in less diverse team. Therefore it is imperative to examine how the relationship between shared leadership and team effectiveness is moderated by team diversity.

H_{04}: The relationship between shared leadership and team effectiveness is not moderated by team diversity.

H_{a4}: The relationship between shared leadership and team effectiveness is moderated by team diversity.

The other moderating variables like ability of team members, task interdependence, task complexity and creativity are not tested as they are beyond the scope of this paper. However, these variables also need to be tested and are suggested as future scope of research.

Research Design

A quantitative methodology was adopted to establish relationship between the variables: shared leadership behaviours, team effectiveness and moderating variables like team size, proximity of team members and team diversity. A survey was conducted by means of a questionnaire. The questionnaire included Section-I which had six items to collect the demographic information of the employees in different organizations. Section-II of the questionnaire contained three items to collect information on team size, member proximity, team diversity.

Section-III of the questionnaire contained 11 items to collect information on shared leadership behaviours. Section-IV contained 14 items which deal with team effectiveness. A 5-point Likert scale was used for Section-III and IV having responses from Strongly Disagree to Strongly Agree.

Data Collection

The IT companies work in teams and the competency of team members depend on the project requirements. These teams work together till the time project continues and are disbanded once the project is completed. The data is collected from employees of IT companies who work in teams for various projects. The samples are from selected IT companies. The convenient and judgmental sampling method was used as it was important to include only those employees who work in teams. The sample size is 102.

60.8 percent of the respondents were male and 39.2 percent of the respondents were females. 45.3 percent of the respondents were below the age of 30, 42.9 percent of the respondents were between 31-35 years and 11.8 percent of the respondents were above the age of 35 years.

Data Analysis

Assessment of Reliability

To ensure reliability of the research, the results from the questionnaire were tested using Cronbach's Alpha. The Cronbach's alpha coefficient was calculated to determine the reliability and internal consistency of the items. The reliability for the variables Shared Leadership and Team Effectiveness was found to be 0.906 and 0.857 respectively. Therefore, the questionnaires for variables Shared Leadership and Team Effectiveness are considered to be reliable.

Frequency Statistics

7.8 percent of the respondents were working in teams having 4-6 members, 34.3 percent of the respondents were working in teams having 7-10 members, 41.2 percent of the respondents were working in teams having 10-13 members and 16.7 percent of the respondents were working in teams having more than 14 members. 52 percent of the respondents stated that they had high member proximity and 9.8 percent of the respondents stated that they had low member proximity. 34.3 percent of the respondents stated that they had high team diversity, 23.5 percent of the respondents stated that they had low team diversity.

Factor Analysis

Factor analysis was used for data reduction to identify a small number of factors that explain most of the variance observed in a much larger number of variables. The factors should have an eigenvalue of 1.00 or greater, for the factor relationship to be considered worth analysis. Before doing factor analysis, Bartlett's test was used to assess whether the correlation matrix is an identity matrix and KMO (Kaiser-Meyer-Olkin) was also used to measure the sampling adequacy.

The factor analysis of the variables: Shared Leadership and Team Effectiveness are as given below:

Variable 1: Shared Leadership

The Bartlett's Test of Sphericity was done and the value of p = 0.000 which is highly significant, shows appropriateness for Factor Analysis. The value of KMO for the variable Shared Leadership is 0.870, thus there is sample adequacy.

Table-1 shows the three factors extractable from the analysis along with their eigenvalues, the percentage of variance attributable to each factor, and the cumulative variance of the factor and the previous factors.

Table-1: Total Variance for Variable 'Shared Leadership'

Total Variance Explained									
Com-ponent	Initial Eigenvalues			Extraction Sums of Squared Loadings			Rotation Sums of Squared Loadings		
	Total	Percent-age of Variance	Cumu-lative percent-age	Total	Percent-age of Variance	Cumu-lative percent-age	Total	Percent-age of Variance	Cumu-lative Percent-age
1	6.374	45.530	45.530	6.374	45.530	45.530	3.394	24.242	24.242
2	1.277	9.124	54.654	1.277	9.124	54.654	2.893	20.666	44.908
3	1.055	7.537	62.191	1.055	7.537	62.191	2.420	17.283	62.191

Extraction Method: Principal Component Analysis.

The Rotated Component Matrix for variable 'Shared Leadership' is shown in Table-2.

Naming the factors: The three factors extracted are named as given below:

Factor 1: Open Communication

Factor 2: Collaborative Decision Making

Factor 3: Member contribution valued

Table-2: Rotated Component Matrix for variable 'Shared Leadership'

Rotated Component Matrix[a]	Component		
	1	2	3
Meetings Productive with clear outcomes	.780		
Sharing exp and expertise to enhance performance	.746		
Open Communication between members	.734		
Procedure to guide Team	.686		
Work constructively on issues	.617		
Meeting objectives Clear	.482		
Clear agreements on roles		.758	
Agreement on Team Goals		.747	
Agreement on decision making		.665	
Evaluation of process and Productivity		.639	
Member Contribution valued			.709
Each Member valued			.707
Differences in style valued			.677
Member contribution recognized			.576

Extraction Method: Principal Component Analysis.
Rotation Method: Varimax with Kaiser Normalization.

a. Rotation converged in 8 iterations.

Variable 2: Team Effectiveness

The Bartlett's Test of Sphericity was done and the value of p = 0.000 which is highly significant, shows appropriateness for Factor Analysis. The value of KMO for the variable Team Effectiveness is 0.739, thus there is sample adequacy.

Table-3 shows the three factors extractable from the analysis along with their eigenvalues, the percentage of variance attributable to each factor, and the cumulative variance of the factor and the previous factors.

Table-3: Total Variance for Variable 'Team Effectiveness'

Total Variance Explained									
Component	Initial Eigenvalues			Extraction Sums of Squared Loadings			Rotation Sums of Squared Loadings		
	Total	Percentage of Variance	Cumulative percentage	Total	Percentage of Variance	Cumulative percentage	Total	Percentage of Variance	Cumulative Percentage
1	4.605	41.867	41.867	4.605	41.867	41.867	2.591	23.556	23.556
2	1.181	10.734	52.601	1.181	10.734	52.601	2.227	20.249	43.805
3	1.110	10.089	62.690	1.110	10.089	62.690	2.077	18.885	62.690

Extraction Method: Principal Component Analysis.

The Rotated Component Matrix for variable 'Team Effectiveness' is shown in Table-4.

Table-4: Rotated Component Matrix for variable 'Team Effectiveness'.

Rotated Component Matrix[a]

	Component 1	2	3
Objectives Met	.792		
Collaboration in decision making	.763		
No pecking order	.688		
Member chips in to achieve goals	.526		
Sharing Information	.485		
Members encourage one another in difficult times		.903	
Members support others in Handling conflicts		.715	
sharing in best course of action		.589	
sharing in goal establishment			.793
Sharing in decision on resource allocation			.755
Opinion of member counts			.554

Extraction Method: Principal Component Analysis.
Rotation Method: Varimax with Kaiser Normalization.

a. Rotation converged in 7 iterations.

Naming the factors: The three factors extracted are named as given below:

- Factor 1: Meeting Objectives
- Factor 2: Positive Relationships
- Factor 3: Sharing Goals

Control Variables: This study controlled for three team constructs (Team size, Member proximity and team diversity that could impact the role of shared leadership in team effectiveness. The team size item offered five responses on a range from 1(less than 3) to 5 (more than 14). Team proximity and team diversity offered 5 responses from very low to very high.

Relationship Between Shared Leadership and Team Effectiveness

The correlation between Shared Leadership and Team Effectiveness is shown in Table-5. All the factors of Shared Leadership (Open Communication; Collaborative Decision Making; Member Contribution Valued) and Team Effectiveness (Meeting Objectives; Positive Relationships; Sharing Goals) were tested for significance of the correlation. As the p-value is less than 0.05 for most of the cases, it is found that relationship between all the factors of Shared Leadership and Team Effectiveness are statistically significant. Thus, the alternate hypothesis that there is a relationship between 'Shared Leadership' and 'Team Effectiveness' is accepted.

Table-5: Mean, SD, Correlation among the study variables (N=102)

	Mean	SD	1A	1B	1C	2	3	4	5	6
1A. Team Size	3.67	0.848	---	---	---	---	---	---	---	---
1B. Member proximity	3.68	0.822	-0.99	---	---	---	---	---	---	---
1C. Team Diversity	3.44	1.03	.374**	-.473**	---	---	---	---	---	---
2. Shared Leadership-Open Communication	0E-7	1.00	-.287**	.322**	-.396**	---	---	---	---	---
3. Shared Leadership - Collaborative Decision Making	0E-7	1.00	-.254**	.308**	-.382**	.000	---	---	---	---
4. Shared Leadership-Member contribution valued	0E-7	1.00	-.135	.143	-.225*	.000	.000	---	---	---
5. Team Effectiveness-Meeting Objectives	0E-7	1.00	-.182	.120	-.169	.142*	.366**	.058	---	---
6. Team Effectiveness-Positive Relationships	0E-7	1.00	-.228*	.079	-.284**	.418**	-.021*	.394**	.000	---
7. Team Effectiveness-Sharing Goals	0E-7	1.00	.001	.459**	-.304**	.272**	.311**	.178*	.000	.000

**. Correlation is significant at the 0.01 level (2-tailed).

*. Correlation is significant at the 0.05 level (2-tailed).

Table-5 also gives correlation of the moderating variables (Team Size, Member Proximity and Team Diversity) with Shared Leadership and Team Effectiveness. It is found that there is a significant negative correlation between Team size and Shared Leadership, however not a significant correlation between Team Size and Team Effectiveness. There is significant negative correlation between Team Diversity and Shared leadership and also a significant negative correlation between

Team Diversity and Team Effectiveness. There is significant positive correlation between Member Proximity and Shared leadership, however not a significant correlation between Member Proximity and all factors of Team Effectiveness. To test the hypothesis 2,3,4 and to analyze the strength of relationship between the variables it is imperative to do a hierarchical regression analysis.

Moderating Variable: Team Size

It was hypothesized that Team Size moderates the relationship between Shared Leadership and Team Effectiveness. A two-step regression analysis with all factors of Shared Leadership and all factors of Team Effectiveness was conducted with Team Size as a moderator. As shown in Table-6, in Step 2 when Team Size is moderated with Shared Leadership factors (TS*OC*CD*MC) there is no significant change in R square for all the factors of Team Effectiveness (Meeting Objectives, Positive Relationships, Sharing Goals). This shows that Team Size is not a significant moderating variable between Shared Leadership and Team Effectiveness.

Table-6: Hierarchical Regression Results for Team Effectiveness and Shared Leadership Team with Team Size (N = 102)

Variables	Meeting Objectives β	Positive Relationships β	Sharing Goals β
Step 1			
Open Communication (OC)	.128	.398**	.335**
Collaborative Decision Making (CD)	.353**	-.039	.367**
Member Contribution Valued (MC)	.052	.384**	.208*
Team Size (TS)	-.048	-.072	.218*
R^2	0.159**	.335**	.243**
Step 2			
Open Communication	.149	.422**	.289**
Collaborative Decision Making	.357**	-.035	.359**
Member Contribution Valued	.041	.372**	.230**
Team Size	-.056	-.081	.236**
TS*OC*CD*MC	-.071	-.082	.157
ΔR^2	.004	.006	.021

**P<0.01 *p<0.05

Moderating Variable: Member Proximity

It was hypothesized that Member Proximity moderates the relationship between Shared Leadership and Team Effectiveness. A two-step regression analysis with all factors of Shared Leadership and all factors of Team Effectiveness was conducted with Member Proximity as a moderator. As shown in Table-7, in Step 2 when Member Proximity is moderated with Shared Leadership factors (MP*OC*CD*MC) there is a significant change in R square for two factors of Team Effectiveness (Meeting Objectives β=-.211**, Sharing Goals β=-.333**). This shows that Member Proximity is a significant moderating variable between Shared Leadership and Team Effectiveness.

Table-7: Hierarchical Regression Results for Team Effectiveness and Shared Leadership Team with Member Proximity (N = 102)

Variables	Meeting Objectives β	Positive Relationships β	Sharing Goals β
Step 1			
Open Communication (OC)	.260**	.462**	.169
Collaborative Decision Making (CD)	.478**	.020	.213*
Member Contribution Valued (MC)	.111	.413**	.132
Member Proximity (MP)	.367**	.135	.320**
R^2	0.262**	.345**	.283**
Step 2			
Open Communication	.220**	.475**	.105
Collaborative Decision Making	.474**	.022	.207**
Member Contribution Valued	.175*	.393**	.234**
Member Proximity	.420**	.119	.236**
MP*OC*CD*MC	.211**	.065	.333**
ΔR^2	.031**	.003	.088**

Moderating Variable: Team Diversity

It was hypothesized that Team Diversity moderates the relationship between Shared Leadership and Team Effectiveness. A two-step regression analysis with all factors of Shared Leadership and all factors of Team Effectiveness was conducted with Team Diversity as a moderator. As shown in Table-8, in Step 2 when Member Proximity is moderated with Shared Leadership factors (TD*OC*CD*MC) there is a significant change in R square for two factors of Team Effectiveness (Meeting Objectives β = -.147*, Sharing Goals β = -.378**). This shows that Team Diversity is a significant moderating variable between Shared Leadership and Team Effectiveness.

Table-8: Hierarchical Regression Results for Team Effectiveness and Shared Leadership Team with Team Diversity (N = 102)

Variables	Meeting Objectives β	Positive Relationships β	Sharing Goals β
Step 1			
Open Communication (OC)	.167	.395**	.250**
Collaborative Decision Making (CD)	.389**	-.043	.289**
Member Contribution Valued (MC)	.072	.381**	.165
Team Diversity (TD)	.062	-.058	-.058
R^2	0.160**	.333**	.205**
Step 2			
Open Communication	.176	.423**	.175
Collaborative Decision Making	.395**	-.026	.243**
Member Contribution Valued	.056	.333**	.294**
Team Diversity	.060	-.064	-.042
TD*OC*CD*MC	-.147*	-.138	.378**
ΔR^2	.032*	.016	.118**

Findings

This study examined the causal relationship between Shared Leadership and Team Effectiveness among teams in IT companies. In addition, an attempt was made to analyze the moderating effect of Team Size, Member proximity and Team Diversity. It was found there is a significant positive relationship between most of the factors of Shared Leadership and factors of Team Effectiveness. Thus, the positive outcomes of Team Effectiveness can be attributed to Shared Leadership behaviours in teams wherein the concept of Shared Leadership is used. Secondly, Team Size did not show a significant impact on the relationship between Shared Leadership and Team Effectiveness. Thirdly, Member Proximity showed a significant positive impact on the relationship between Shared Leadership and Team Effectiveness. Finally, Team Diversity showed a significant negative impact on the relationship.

Managerial Implications

This study contributes to the existing literature by proving the significant impact of shared leadership on team effectiveness. Shared Leadership should be encouraged among team members and managers must emphasize collaborative behaviours amongst team members. Though Kerr (1989) study found larger teams experience greater dysfunction than smaller teams which can be an impediment to shared leadership, this study shows that the size of the team does not have an impact on shared leadership and team effectiveness. The member proximity and team diversity have a significant impact. Member proximity is important for communication, building trust and collaboration between the members. Therefore, if team members work in different locations then managers need to encourage use of information and communication technology for bringing people virtually together. Team Diversity though is expected to enhance team effectiveness, however, diversity needs to be managed and team members need to be made sensitive to difference in values, beliefs, opinions and culture of other people. Then only it would enhance opportunity for shared leadership and in turn improve team effectiveness.

Suggestions for Future Research

Future research could consist of determining the impact of other moderating variables like team cohesiveness, member ability, task interdependence, task complexity and task creativity on the relationship between shared leadership and team effectiveness. Team members working on projects which exhibit greater complexity, ambiguity in project goals, ongoing time pressures, could be studied to understand the contribution of shared leadership to successful project outcomes. Also, study carried out in different industries/sectors wherein teams are employed, to validate the relationship between shared leadership and team effectiveness in different contexts.

Conclusion

It has become increasingly clear in recent years that the conceptualization of leadership must be broadened beyond the traditional top–down leadership. When team members offer their leadership to others and to the mission or purpose of their team, they experience higher commitment, bringing in greater personal and organizational resources to bear on complex tasks, and share more information. When team members share ideas and collaborate and support each other in challenging times, they develop trust and respect for others which in turn becomes an additional resource for improving team process and performance. This study clearly establishes the relationship between shared leadership and team effectiveness and it is moderated by other variables like member proximity and team diversity.

References

Avolio, B. J. et al. (2003). Assessing shared leadership: Development and preliminary validation of a team multifactor leadership questionnaire. In: C. L. Pearce & J. A. Conger (Eds.), *Shared leadership: Reframing the hows and whys of leadership*, pp:143-172.Thousand Oaks, CA: Sage.

Alexander, M. (1985). The Team Effectiveness Critique, in The Annual: Developing Human Resources, L. D. Goodstein and J. W. Pfeiffer, (Eds). University Associates: San Diego, CA, pp:101-106.

Beck, A. P. (1981). A study of group phase development and emergent leadership Group, 5(4), pp:48-54.

Bergman, J. Z. et al. (2012). The shared leadership process in decision-making teams, *The Journal of Social Psychology*, 152 (1), pp:17-42.

Boies, K., Lvina, E. & Martens, M. L. (2010). Shared leadership and team performance in a business strategy simulation, *Journal of Personnel Psychology*, 9(4), pp:195-202.

Carson, J.B., Tesluk, P.E. & Marrone, J.A. (2007). Shared leadership in teams: An investigation of antecedent conditions and performance, *Academy of Management Journal,* 50 (5), pp:1217-1234.

Day, D.V., Gronn, P. & Salas, E. (2004). Leadership capacity in teams, *The Leadership Quarterly*, 15, pp:857-880.

Denis, J. L., Lamothe, L. & Langley, A. (2001). The dynamics of collective leadership and strategic change in pluralistic organizations, *Academy of Management Journal*, 44(4), pp:809-837.

Ensley, M. D., Hmieleski, K. M. & Pearce, C. L. (2006). The importance of vertical and shared leadership within new venture top management teams: Implications for the performance of startups, *The Leadership Quarterly*, 17(3), pp: 217-231.

Fletcher, J. K. & Kaufer, K. (2003). Shared leadership. In: C. L. Pearce & J. A. Conger (Eds.), Shared leadership: Reframing the hows and whys of leadership, 21-47, Thousand Oaks, CA: Sage.

Follett, M. P. (1924). *Creative experience*. New York: Longmans Green

Gibb, C.A. (1954). Leadership. In: G. Lindzey (ed.), Handbook of social psychology, vol. 2 (877-917). Reading, MA: Addison-Wesley.

Gronn, P. (2000). Distributed properties: a new architecture for leadership, *Educational Management Administration & Leadership*, 28, pp:317–338.

Heenan, D. & Bennis, W. (1999). *Co-Leaders: The Power of Great Partnerships*. Hoboken, NJ: Wiley.

Henderson-Loney, J. (1996). Tuckman and tears: developing teams during profound organizational change, *Supervision*, 57(3), P. 5.

Hoch, J. E., Pearce, C. L. & Welzel, L. (2010). Is the most effective team leadership shared? The impact of shared leadership, age diversity, and coordination on team performance, *Journal of Personnel Psychology*, 9(3), pp:105-116.

Hoch, J.E. (2014). Shared Leadership, diversity and information sharing in teams, *Journal of Managerial Psychology*, 29(5), pp:541-564.

Kerr, N. L. (1989). Illusions of efficacy: The effects of group size on perceived efficacy in social dilemmas, *Journal of Experimental and Social Psychology*, 25, pp: 374-403

Kocolowski, M. (2010). Shared leadership: Is it time for a change? Emerging Leadership Journeys, School of Global Leadership & Entrepreneurship, Regent University, 3(1), pp: 22-32.

Koschzeck, K. (2009). You are the most important leader in your organization: Towards a shared leadership model, A thesis submitted in partial fulfillment of the requirements for the degree, Royal Roads University.

Kouzes, J. M. & Posner, B. J. (2002). Leadership challenge (3rd ed.), San Francisco: Jossey-Bass.

Leana, C. R. (1985). A partial test of Janis' groupthink model: Effects of group cohesiveness and leader behaviour on defective decision making, *Journal of Management*, 11, pp: 5-17.

Lewin, K. (1947). *A Dynamic Theory of Personality*. *Selected Papers*. London: McGraw-Hill.

Liang, T. P. et al. (2007). Effect of team diversity on software project performance, *Industrial Management & Data Systems*, 107(5), pp:636-653.

Manz, C.C., Shipper, F. & Stewart, G.L. (2009), Shared Influence at W. L. Gore & Associates, *Organizational Dynamics*, 38(3), pp: 239-244.

Mathieu, J., Maynard, M. T., Rapp, T., & Gilson, L. (2008). Team effectiveness 1997-2007: A review of recent advancements and a glimpse into the future. *Journal of Management*, 34(3), 410-476.

McGrath, J. E. (1964). Social psychology: A brief introduction. Canada: Holt, Rinehart and Winston.

Miller, K., Walmsley, J, Williams, S. (2007). Shared Leadership: An Idea Whose Time has Come in Healthcare?, *International Journal of Leadership in Public Services*, 3(4), pp:24-37.

Mueller, J. S. (2012). Why individuals in larger teams perform worse, *Organizational behaviour and human decision processes*, 117(1), pp: 111-124.

O'Toole, J., Galbraith, J. and Lawler, E.E. (2002). When Two (or More) Heads Are Better than One: The Promise and Pitfalls of Shared Leadership, Center for Effective Organizations, University of Southern California, Los Angeles, CA.

Pearce, C.L. (2004). The future of leadership: Combining vertical and shared leadership to transform knowledge work, *Academy of Management Executive*,18 (1), pp:47-57.

Pearce, C. L. & Conger, J. A. (2003). A landscape of opportunities: Future research on shared leadership. In: C. L. Pearce & J. A. Conger (Eds.), Shared leadership: Reframing the hows and whys of leadership (285-303). Thousand Oaks, CA: Sage.

Pearce, C. L. & Sims, H. P., Jr. (2000). Shared leadership: Toward a multi-level theory of leadership, *Advances in Interdisciplinary Studies of Work Teams*, 7, pp:115-139.

Pearce, C. L. & Sims, H. P. (2002). Vertical versus shared leadership as predictors of the effectiveness of change management teams: An examination of aversive, directive, transactional, transformational, and empowering leader behaviours, *Group Dynamics: Theory, Research, and Practice*, 6 (2), pp:172-197.

Pearce, C.L. & Manz, C.C. (2005). The importance of self and shared leadership in knowledge work, *Organizational Dynamics*, 34(2), pp:130-40.

Pearce, C.L. et al. (2009). Where do we go From Here?: Is Shared Leadership the Key to Team Success?, *Organizational Dynamics*, 38(3), pp: 234-238, Elsevier Inc.

Rosenthal, C.S. (1998). Determinants of collaborative leadership: civic engagement, gender or organizational norms?, *Political Research Quarterly*, 51, pp: 847-868.

Sally, D. (2002). Co-leadership: Lessons from Republican Rome, *California Management Review*, 44(4), pp: 84-99.

Sennett, R. (1998). The corrosion of character: the personal consequences of work in the new capitalism. W. W. Norton, London, UK.

Sivasubramaniam, N. et al., (2002). A longitudinal model of the effects of team leadership and group potency on group performance outcomes, *Group and Organization Management*, Vol. 27, pp: 66-96.

Small, E. E. (2007). Shared leadership: A social network analysis.

Small, E. E. & Rentsch, J. R. (2010). Shared leadership in teams: A matter of distribution, *Journal of Personnel Psychology*, 9 (4), pp:203-211

Steinert, T., Goebel, R. & Rieger, W. (2006). A nurse-physician co-leadership model in psychiatric hospitals: Results of a survey among leading staff members in three sites, *International Journal of Mental Health Nursing*, 15(4), pp:251-258.

Tesluk, P., et al., (1997). Task and aggregation issues in the analysis and assessment of team performance, In: Brannick, M.T., Salas, E. and Prince, C. (Eds), *Team Performance Assessment and Measurement: Theory, Methods and Application*, Erlbaum, Mahwah, NJ, pp: 197-224.

Thambain, H.J. (2004). Team leadership effectiveness in technology-based project environments, *Project Management Journal*, 35(4), pp:35-46.

Waldersee, R. & Eagleson, G. (2002). Shared leadership in the implementation of reorientations, *Leadership & Organization Development Journal*, 23(7), pp:400-407.

Walker, J. (2001). Developing a shared leadership model at the unit level, *Journal of Perinatal & Neonatal Nursing*, 15(1), pp:26-39.

Wang, D., Waldman, D. A. & Zhang, Z. (2014). A meta-analysis of shared leadership and team effectiveness, *Journal of Applied Psychology*, 99(2), pp:181-198.

Wheatley, M. (2006). Leadership and the new science: Discovering order in a chaotic world (3rd ed.). San Francisco: Berrett-Koehler.

Wild, N.M. (2015). Antecedent Conditions of Shared Leadership: An Examination of Team Personality, Composition, Shared Leadership and Team Effectiveness, A thesis submitted to the University of Tennessee at Chattanoog.

Williams, K. Y. & O'Reilly, C. A. (1998). Demography and diversity in organizations: A review of 40 years of research, *Research in Organizational Behaviour*, 20, pp:77-140.

Yang, L.R., Huang, C.F. & Wu, H. S. (2011). The association among project manager's leadership style, teamwork and project success, *International Journal of Project Management*, 29(3), pp: 258-67.

Yukl, G. (1989). *Leadership in Organizations*. Englewood Cliffs, NJ: Prentice Hall.

Yukl, G. (1998). *Leadership in Organizations*. Upper Saddle River, NJ: Prentice Hall.

Yukl, G. (2006). *Leadership in Organizations* (6th ed.). Upper Saddle River, NJ: Pearson-Prentice Hall.

IPE Journal of Management

ISSN 2249 - 9040 Volume 9, No 1, January-June 2019 pp. 85-94

Impact of CSR on Firms' Financial Performance – A Study of Select Indian IT Companies

M. Chandra Shekar[1]
R. Kumaran[2]

Abstract

The Corporate Social Responsibility (CSR) has become part of the companies day to day work, especially after the implementation of section 135 in the New Companies Act 2013. The listed Indian companies are implementing CSR activities either as it is mandated by the regulator or due to the genuine concern for social development. This study is to examine the impact of CSR spending on the financial performance of the top three Indian Information Technology Companies. The sample chosen was big three IT companies; the duration of the study is from 2013 to 2018. The regression model is being used in order to conduct statistical analysis. The results revealed that return on equity (ROE) and net income (NI) has a significant impact on the firms, which are favouring Corporate Social Responsibility spending. Whereas there is no statistical significance among the return on assets (ROA), earnings per share (EPS) and CSR spending. Based on these findings, we conclude that that CSR spending is an essential tool to capture growth and improve the financial performance of the Indian IT companies.

Keywords: Corporate Social Responsibility, Earnings Per Share, Financial Performance, Net Income, Return on Assets, Return on Equity

Introduction

Businesses are carried out by large companies within social environments. Their day to day operations and activities are dealt with an interaction between the company and the surroundings in which they operate. Such companies must be financially healthy, with trained human capital, along with sufficient amount of

Acknowledgements

The author is grateful to Prof. R.K. Mishra, Director, IPE for providing guidance and valuable inputs in completing the article.

1 Research Scholar – Faculty of Commerce, Osmania University; Assistant Professor – Institute of Public Enterprise, Hyderabad and can be reached at m.chandrashekar@ipeindia.org

2 Associate Credit Manager, IDFC First Bank, Chennai and can be reached at kumaran2108@gmail.com

sustainable resources, and it should be able to incorporate the regulatory changes by the government within a short duration. Such companies must be prepared to compete effectively among their industry peers.

Moreover, such companies must be socially responsible. Also, they must create a friendly business environment by venturing into social activities such as monetary donations to NGOs or grants for non-profit organisations and communities. These social activities are extended to healthcare, education, women empowerment, and adopting villages et al. referred to as Corporate Social Responsibility (CSR) activities. Such activities build brand image and goodwill among industry peers. However, it leads to achieve the targeted profits and result in shareholder wealth maximisation.

The Indian economy has been growing very fast over the past two decades with significant contributions from the Information Technology (IT) and Information and Technology Enabled Services (ITES) sector. The rise in economic growth began from economic liberation in India.

After that a few major Indian companies such as Wipro Ltd., Infosys Ltd., TCS Ltd., HCL Ltd., Tech Mahindra Ltd., and et al. established themselves on the global stage as a crucial players in the IT & ITES segments by offering the best services to their client companies from developed nations across the world. Therefore, the role of the IT sector played in India has been spearheading the economic development process. Within about two decades, the Indian IT industry emerged as one of the critical drivers of the Indian economy. At the same time Indian companies are spending funds on CSR activities due to their growing economy. Such CSR spendings will improve the financial performance indicators indirectly as mentioned in their business analyst report. This activity has become a part of the company's strategic management tool now. The CSR activity expenditure has been grown exponentially in developed nations. All the stakeholders are forcing the companies to engage in some CSR programs. Most of the firms are now focusing on CSR to continuously improve their social, environmental, economic, and financial performance. According to Lea (2002), socially responsible firms do all things in favour of stakeholders. Not only IT industry fulfils their core objective, but also they are focusing on the social activities like Infosys has adopted a village, WIPRO chairman Premji has been contributing significant amount through his foundation, and it has been increasing year by year. As said earlier this is not only bringing an excellent impression on public but also, directly and indirectly, resulting in increasing the financial performance of the companies, and we can see its impact in a financial statement like Profit and Loss, Balance sheet, Cash flow statement et al.

CSR has become an integral part of business core competencies not only on an international level but also on a local and domestic level. Kotler (2005) explains that CSR leaves its impact on the financial worth of the company. The firm reduces their employee turnover by giving incentives, cash bonuses, a safe work environment with the protection of health and life for customer, the fast charge reasonable rate and this regular price induce the customer to say something in favour of the company.

Regulations and companies have since a longtime working on Corporate Social Responsibility. In the late 1770s, Adam Smith introduced the expression of the invisible hand 'to demonstrate how capitalists inadvertently brought about national economic prosperity even though their real intentions were the pursuit of self-interest. Smith argued that the metaphorical hand 'helps produce benefits to society even when the capitalists did not plan for such social benefits. The invisible hand produces outcomes that may not be consciously planned. To Smith, social welfare is a by-product of capitalist's activities. The impact of CSR activity has been debated for a long time now. Despite the numerous discussions, still, many people are sceptical about what the CSR means?

As Kitchin (2002) stated, one moment, CSR seems to mean the engagement of nongovernmental organisations (NGOs), the next it is all about charitable donations, and 5 minutes later it seems to mean the ethical treatment of employees. One minute the NGOs are calling the shots; the next the accountants are in on the act selling reputation assurance. Different authors seem to have different explanations as to what CSR is. Some people argue that marketers should use the CSR since it is an excellent tool for marketing the firm and promoting the brands while others say it should be socially responsible.

The major issue prevailing around the world is to reduce poverty and to promote achieving sustainable development. Though it is the work of a government, it is not possible to achieve it alone. Private players should also contribute significantly. That is why policymakers are paying attention to those who are making a significant contribution. As the issue of sustainable development becomes more critical, CSR becomes an element that addresses these issues and therefore, it becomes more vital in the daily operations of a financial institution in the IT industry.

The Relationship Between CSR and Firm Performance

This study on the relationship between CSR and financial performance can be established by using various methods. Predominantly by using some of the financial measures of profitability ratios.

Though the relation between CSR and financial performance has been inconclusive in most of the studies which have been carried out across the world it has established positive relations. It suggests the alignment of social goal with the business goal where CSR is considered as a strategic tool to promote the economic objective of the firm. Managers foresee significant value additions in firm performance due to strengthened stakeholder relations. Management theorists argue that by improving CSR towards stakeholders, firm performance is augmented.

Statement of the Problem

A lot of corporate financial institutions exist without much impact on society on the ground that it does not have a positive impact on their financial performance. Studies which have been carried out mainly focused on developed countries and minimal work has been done for analysing and measuring the effect of CSR on financial performance in developing countries like India. In the developing and less developed countries, still, many companies do not have enough awareness on the importance of CSR as few companies do not pay much attention to it. In this internet era, people are aware of what and how the companies working for the welfare of the society. So it very much essential to study the relationship between CSR and financial performance of the companies which will affect the economy.

IT industry contribution is significantly high in the country's GDP. The same IT industry is focusing on CSR, and thus, this study is going to depict the impact of CSR on the financial performance of those firms.

Objectives of the Study

Many businesses over the years have focused on profits, and have cared less about the welfare of the society in which they are operating. This has led to a myth that the sole purpose of any business is to make profit and growth. Taking this into consideration, the study intends explicitly -

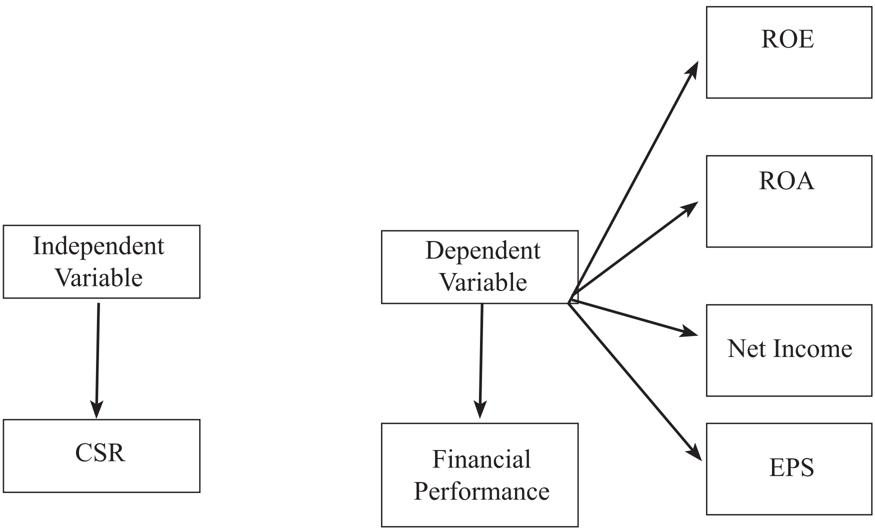
- To identify whether CSR spending influences the IT industry's financial performance in terms of profitability.
- To identify whether CSR influences the earnings per share of the IT industry.

Research Hypotheses

The following null hypothesis to be tested in order to study the objectives.

H_{01}: There is no impact of corporate social responsibility on return on equity.
H_{02}: There is no impact of corporate social responsibility on return on assets.
H_{03}: There is no impact of corporate social responsibility on earnings per share.
H_{04}: There is no impact of corporate social responsibility on net income.

Proposed Theoretical Framework



Review of Literature

- *Mishra and Suar (2010)* studied the CSR regarding six measurements clients, representatives, nature's turf, groups and suppliers and effect of this connection on budgetary and non-fiscal execution of firm. One hundred fifty assembling organisations were chosen showing the 18 separate classifications of firms in 2003-2006. Survey and auxiliary information from the sites of organisations were utilised to discover the results. The legitimacy and consistent quality are tried by affirming component dissection (CFA). It incorporates the elucidating facts, relapse weights, Goodness of Fit Index (GFI), Comparative Fit Index (CFI) and Normed Fit Index (NFI). Firms' monetary execution is dictated by the ROA degree. They likewise adjusted the 12-thing scale for measuring the non-money related execution of the firm. The CSR has been autonomous, Financial Performance and Non-Financial Performance have been considered as a reliant variable. The proprietorship sort and firms' size is taken as the control variable. Plain facts and Pearson connection measures are utilised to investigate the information. The result demonstrates that the propitious CSR has a positive effect on firms' fiscal and non-monetary execution.

- *Khanifaret al. (2012)* proposed two connections. 1) Concurrent and consequent financial execution with connection to CSR. 2) Past monetary execution. They considered that there is a negative relationship in the middle of CSR and Corporate Financial Planning (CFP) regarding a few pointers, for example, stock value progressions and EPS gauges. They distinguished the positive relationship between corporate social execution and corporate fiscal relationship as far as expense sparing is concerned, expand the corporate picture and help in seeking the administrative bodies which can bring about more significant expense to associations. They likewise talked that there is no critical relationship in the middle of CSR and CFP. In the end, they abridged it a sure relationship between corporate social obligation and budgetary execution. Even though it acquired expense to a firm yet, it gave high benefit in future results of the firm.
- *Classon and Dahlstrom (2006)* carried out a study on corporate social responsibility and how it can affect company performance in Sweden using survey data, observing that CSR can influence customer perceptions on a product or service offering and in the end affect company performance. Among all the studies reviewed above, it appears that none of the authors used time series data that covered years with correlation technique to assess if environmental maintenance, personnel welfare and social responsibility are statistically relevant to the financial performance of organisations in Nigeria.

Research Design

Research design is a blueprint of carrying out a research study (Kothari, 2008). The study is under relational research design. Also, the study has been carried out over a specific period i.e. 2013-2018. The choice of this design is the premise on the fact that the study will involve participants drawn from an array of IT industry. Also, the study will be carried out over a specific period. This study is focused on the effect of CSR activities on the IT industry's in financial perspective at a specific time.

Sample Size

The companies were selected based on their consistent appearance in the list of top 10 performing IT companies in India established on India Brand Equity Foundation (IBEF). The top 5 companies selected as sample are Infosys Ltd, TCS Ltd, Tech Mahindra, Wipro Ltd and HCL technologies.

Sampling Method

In the case of choosing the sampling method here, the priority has been given to the purposive sampling method. Purposive sampling, is also known as judgmental, selective or subjective sampling, is a type of non-probability sampling technique. Non-probability sampling focuses on sampling techniques where the units are investigated based on the judgment.

Source of Data

This study exclusively relies upon secondary data. The data is obtained from official financial statements of the IT industry's participating in the study for a period of five years from 2013-18. The mentioned data was accessed from the websites of the IT above industry's since they are mandated to publish their financial statements and financial reports at the end of every financial year. The other secondary sources include different web sites, books, journals, annual report and published research works, etc.

Analytical Techniques

The relationship of the proposed model and the properties of the scale were analysed using Regression Analysis. Usage of the statistical techniques was according to commonly accepted research assumptions where appropriate. The test includes correlation; multiple regression techniques are used to trace causal relationships between several factors. The collected data has been processed, tabulated and analysed logically.

Limitation of the Study

There is no exact source of collecting necessary data due to the lack of Research and Development Department in IT sector as well as CSR activities. The study findings also are based on the IT industry; hence, the findings may not apply to other sectors in India. Also, the study was carried out in India; hence; the findings are limited within the Indian context.

Data Analysis and Findings

Regression Analysis

Table-1: Summary for ROE & CSR

Multiple R	R Square	Adjusted R Square	Standard Error
0.894928	0.800896167	0.203584668	0.050620939

Source: Calculated From Secondary Data

The R^2 value indicates how much of the total variation in the dependent variable, ROE, can be explained by the independent variable, CSR. In this case, R^2 designates that change in ROE can be explained by the change in CSR data. The adjusted R-value of .203 implied that the model is 20.3% goodness fit. A unit change in the CSR activities leads to about .800 unit change or 80.08% changes in ROE of the IT industry.

Table-2: ANOVA for ROE & CSR

	df	SS	MS	F	Significance F
Regression	3	0.010308	0.003436	1.340835006	**0.038672508**
Residual	1	0.002562	0.002562		
Total	4	0.01287			

Source: Calculated From Secondary Data.

From Table-2, it can be seen that the relation between CSR and ROE is significant (.038), the value is less than .05, suggesting that the regression model significantly predicts the outcome of the variable, CSR as far as its impact on ROE exists, So, rejecting the null hypotheses 1.

Table-3: Summary for ROA & CSR

Multiple R	R Square	Adjusted R Square	Standard Error
0.954081649	0.910271794	0.641087176	0.031548914

Source: Calculated From Secondary Data.

Table-3 depicts that R^2 designates only 91.1% change in ROA can be explained by a change in CSR data. The adjusted R-value of .64 implied that the model states the goodness of fit.

Table-4: ANOVA for ROA& CSR

	df	SS	MS	F	Significance F
Regression	3	0.010097	0.003366	3.381589	**0.375612**
Residual	1	0.000995	0.000995		
Total	4	0.011093			

Source: Calculated From Secondary Data

From Table-4, it can be seen that the relation between CSR and ROE is not significant (.375) that the value is not less than .05 suggesting that regression model significantly predict the outcome of the variable, CSR has no impact on ROA. So, accepting null hypotheses 2.

Table-5: Summary of Net Income & CSR

Multiple R	R Square	Adjusted R Square	Standard Error
0.943058	0.889357	0.55743	19186.62

Source: Calculated From Secondary Data.

Table-5 demonstrates that R^2 designates that 88.9% change in EPS can be explained by the change in CSR data. The adjusted R-value of .554 implied that the model is 55.4% goodness fit. A unit change in the CSR activities leads to about .889 unit change or 88.9% changes in Net income of the IT industry.

Table-6: ANOVA for Net Income & CSR

	df	SS	MS	F	Significance F
Regression	3	2959042417	9.86E+08	2.679373	0.041572
Residual	1	368126271.3	3.68E+08		
Total	4	3327168688			

Source: Calculated From Secondary Data

Table-8 manifests that the relation between Net Income & CSR is significant (.041) and the value is less than .05, suggesting that the regression model significantly predict the outcome of the variable. CSR, as far as its impact on net income is significant. So, rejecting null hypotheses 4.

Table-7: Summary of EPS & CSR

Multiple R	R Square	Adjusted R Square	Standard Error
.217[a]	.047	-.048	3.87843

Source: Calculated From Secondary Data.

Table-7 shows that R^2 designates that only 4.7% change in EPS can be explained by the change in CSR data. The adjusted R-value of -.048 implied that the model could not state the better fit.

Table-8: ANOVA for EPS & CSR

	df	SS	MS	F	Significance F
Regression	1	7.444	7.444	.495	.498
Residual	10	150.4222	15.042		
Total	11	150.866			

Source: Calculated From Secondary Data.

From Table-8, it can be seen that the relation between EPS & CSR is not significant (.498) that the value is higher than .05 suggesting that the regression model does not significantly predict the outcome of the variable, CSR as far as its impact on EPS is not significant. So, accepting null hypothesis 3.

Recommendations

Competitiveness of the financial sector has increased manifold, and the issue of CSR has become an indispensable concern parallel to the concentrating on profit. The managers and board of directors should encourage the IT industries to involve themselves more on these social activities as an action plan mechanism to improve their financial performance. They should also be fully informed by using disclosures on the progress and finances used in such activities. This will enable them to make decisions on how much finances to be used and establish its impact on their industries' performance.

Every IT company should be able to have corporate social responsibility policies that guide them on how to be part of the society they engage with such activities. This policy should also be revised promptly with the societal changes that happen.

CSR has become a universal phenomenon with rising acceptability among all stakeholders. Business units are now considered social units; they have to serve stakeholders and tend to execute CSR on priority basis and subsequent disclosure as well. According to McWilliams and Siegel (2001), CSR practices are not forced by law, yet produce optimistic output, and positive impact on profitability needs to be included among strategic business policies for long-run success.

Unhealthy CSR policies may cause externalities resulting in an injury to stakeholders' interests/benefits and disappointed stakeholders may turn around as relinquished customer as well as a source of declining earnings. Furthermore, policymakers are suggested to make sure that CSR related disclosure will not only yield profitability but also it will magnify the market value of shares of that unit, ultimately the accumulation of numerous social and economic benefits.

Also, based upon key findings, this study postulates that CSR phenomenon is an essential growth element and FP-boosting tool. Eventually, the mainstream of the studies on CSR is in the context of well-established companies and nations. However, developing nations are least emphasised, thus the findings of this study significantly contribute to the body of knowledge as well as offer pivotal implications for policy makers and governance of the financial sector.

CSR helps develop companies reputation by creating a positive image in the mind of customers, suppliers etc.. Government may by way of tax incentive motivate IT industries to actively embark on corporate social responsibility as it will impact on their successes and reduce the burden on government in terms of provision of amenities for the society, communities and nation at large.

Research studies should be encouraged in the field of corporate social responsibility as this will help to create awareness for corporate institutions on CSR.

Implications for Practice

CSR can be considered as a strategy which brings business related profits to the firm. The practical implication of this research consists of an outlining of the nature of the relationship between CSR and financial performance of selected IT companies belonging to IT industries during 2013- 2018. Since the results of this research indicate a recurring statistically significant relationship between CSR and financial performance, it can offer insight to the management of IT companies regarding what investments in CSR can be expected to yield in terms of ROE, ROA, EPS and Net Income.

Conclusion

For any country to achieve rapid economic development, it is essential to have industrial growth. The CSR term has become more and more common in business and consumers are also started expecting their companies to be socially responsible. Though many imitative might not work, still companies are attempting to satisfy their stakeholders. People who recognise the companies CSR engagement can benefit the company in the medium term. Meanwhile, some IT firms, mainly from industries where legitimacy is threatened, have at least partly recognised the high importance of these issues.

Two different groups of studies exist regarding the effect of CSR on financial performance. While few support the argument stating that they have a considerable impact on EPS, ROE, ROA, stock price, etc., while others say they do not have any impact. This study has been focused on finding the significance of CSR impact on firms performance, and it finds that CSR has a significant impact on Net Income and ROE of IT Industry and has no impact on ROA and EPS. Null Hypotheses 1 and 4 have been rejected and concluded that they have an impact on the financial performance of the company where as a null hypothesis 2 & 3 have been accepted stating that they do not have significant impact on the financial performance.

The findings suggest that, in India, CSR activity is still considered a new dimension as a growth factor. However, as literature highlights that despite the popularity of annual reports in testing data, there is no way to determine empirically whether the social performance data revealed by corporations are under-reported or over-reported, the results found under this study may be subject to management bias.

References

Boesso, G., Kumar K. & Michelon, G. (2013). Descriptive, Instrumental and Strategic Approaches to Corporate Social Responsibility Do they Drive the Financial Performance of Companies Differently?, *Accounting, Auditing & Accountability Journal,* 26(3), pp: 399-422.

Batra, G, Kaur, N & Dangwal, R C (2007). "Corporate Governance Disclosure Practices of Indian Companies", presented in the 9th South Asian Governance Forum, North South University, Dhaka, Bangladesh, February 24-25.

Carroll, A. B. (1979). A three dimensional model of corporate performance, *Academy of Management Review*, 4, pp: 497-505.

Cellier, A. & Chollet, P. (2010). The impact of corporate social responsibility on stock prices: An event study of Vigeo rating announcement. France, April 30, 2010.

Choi, J., Kwak, Y. & Choe, C. (2010). Corporate social responsibility and corporate financial performance: Evidence from Korea, *Australian Journal of Management*, 35 (3), pp: 291-311.

Babalola, Y. A. (2012). The impact of corporate social responsibility on firms' profitability in Nigeria, *European Journal of Economics, Finance and Administrative Sciences*, 45, pp: 39-50.

Classon J. & Dahlstrom J. (2006). *How can CSR affect Company Performance? A qualitative study of CSR and its effects*.

David, J. H. & R. A. Goldberg (1957). *A Concept of Agribusiness*.

Fu, Y. J. & Shen, J. Q. (2015). Correlation analysis between corporate social responsibility and financial performance of Chinese food-processing enterprises, *Advance Journal of Food Science and Technology,* 7 (11), pp:850-856.

ISSN 2249 - 9040 Volume 9, No 1, January-June 2019 pp. 95-107

IKEA, Furnishing the Indian Homes: The Challenges of Culture, Competition and Channel

R K Mishra[1]
A Sridhar Raj[2]
Meher Karuna[3]

Abstract

The case study 'IKEA, Furnishing the Indian Homes: The Challenges of Culture, Competition and Channel' provides details about the challenges of IKEA into the home décor market in India from three perspectives – competition, channel and culture. Given the established players in the Indian market, the challenge for IKEA is to lure the customers to its fold. However, given the culture of the Indian society, where the customers prefer value for money products, the challenge for IKEA is to provide quality products at Indian prices. The case study also focuses on the channel, where IKEA intends to have a physical presence as the world moves towards online market.

Keywords: Culture, Competition, Channel, India and Home Furnishing

Introduction

9th August 2018 the day on which IKEA opened its first store in India at Hyderabad, all the roads practically led towards it, since the police had issued a traffic advisory to avoid roads adjacent to the store. People thronged the store in hordes and the number continued to swell as the dusk and rain engulfed Hyderabad.

Jesper Brodin, the IKEA Global CEO must have got ecstatic looking at the people and the traffic making beeline into the IKEA store in Hyderabad. This must have given Brodin some insights into how customers would receive them in other cities like Mumbai, where IKEA is set to open its next store. Further more, it must have also given Brodin a positive feedback that IKEA store would become a Landmark center for all customers and visitors of the city of Hyderabad. Standing

1 Director, Institute of Public Enterprise, Hyderabad and can be reached at rkmishra@ipeindia.org

2 Assistant Professor, Institute of Public Enterprise, Hyderabad, India and can be reached at sridharraj@ipeindia.org

3 Assistant Professor, Institute of Public Enterprise, Hyderabad, India and can be reached at meherkaruna@ipeindia.org

tall and large, the IKEA store in Hyderabad is conspicuous amidst the other global companies like Microsoft, Google, Deloitte, Amazon, etc. IKEA's blue coloured dome spread on a huge land mass stands distinct as the people looked at the store with awe.

The Beginning of IKEA's Journey in India

Peter Betzel, the IKEA Head of India would be sure that IKEA could make its mark in India as the customers greeted them with a thundering welcome. The estimated crowd that entered the IKEA store on 9th August was reported approximately around 40,000, which was unbelievable for IKEA. Peter Betzel became CEO IKEA India in March 2018. The timing of Betzel becoming the CEO was crucial as the retail giant was just a couple of months away from opening of its first retail store in Hyderabad.

> *Peter Betzel said that, "India is a vibrant, multi-cultural, multi-faceted and a really exciting market for Ikea. As I start my new role, I look forward to establishing the company as a meaningful, loved and trusted brand."*[1]

This challenge for Betzel was as big as the demographic size and diversity of India. India is a multi-cultural and multi-demographic mosaic with people spread over different geographies over a vast subcontinent. According to the latest census 2011, the population of India stood at 1210 million compared to the population of Europe which stood at 740 million in the year 2010. 550 million people speak Hindi as the main language in India followed by Bengali (91 million), Telugu (85 million), Marathi (84 million However, a study conducted by World Bank projected the growth story of Indian furniture markets as 20% per annum over the next few years and is expected to reach US$ 32 billion by 2019.) and Tamil (66 million). The other major languages include Urdu, Kannada, Gujarati, Malayalam, etc. There are hundreds of dialects in India which are limited to specific regions.

The challenge for Betzel did not stop here given the presence of online and offline players who know the taste of the customers. Godrej Interio was the most trusted furniture brand in India with its online and offline presence all over the country. Peppefry too has online and offline presence with 28 stores in the country and planning to open another 50 in the days to come. Urban Ladder has also ramped up its presence in different parts of the country. The furniture market was quite unorganized in India with numerous players taking their share of pie.

The market has been meaty for IKEA. But due to the diverse culture and competition from the national players, not knowing the pulse of the Indian customer, the obvious question was how IKEA would become the customer's choice for home decoration and furniture. Will local sourcing help IKEA to adopt competitive pricing? Will it be easy to push the customers for *Do It Yourself* strategy? Why would customers opt for IKEA when national players were doing well? Does it need to redesign its products for Indian customers? The odds were many. But Peter Betzel was confident.

> *"I will be working with the local teams to bring in a unique global shopping experience offering good quality and affordable home furnishing products to a diverse set of consumers across the country." Peter Betzel.*[2]

IKEA – The Global Home Décor

IKEA was started in the year by 1943 Ingvar Kamprad with a small store in Almhult in Sweden. The name IKEA comes from the first letters of its founder's name Ingvar Kamprad and his home's name Elmtaryd, Agunnaryd. Right from the inception, IKEA has been oriented towards simple and affordable furniture for everyone. The focus was on helping people to get stylish and modern furniture at a low cost.

The lifestyle of Ingvar Kamprad exemplifying simple living and economy class travel led IKEA on a firm path of affordable costs for the furniture buyers all over the world. As it started expanding its stores across the world in major markets, affordable and modern furniture remained the focal point. In its journey of growth, IKEA established just more than 400 furniture stores in around 50 countries. IKEA thus proved that with low cost operations, local sourcing coupled with simple designs and affordable prices, even a small retailer could become a global giant in selling furniture and home décor.

The philosophy of IKEA has been simple – suppliers, simple designs, mass production, warehousing, pick & pay and Do-It-Yourself (DIY). The suppliers were chosen carefully who could assure supplies of furniture as designed by IKEA. They formed a critical link in IKEA's operations and they were barred from selling their supplies to other companies. But they were assured of the orders from IKEA. The designs deliberately kept simple as IKEA wanted the customers to assemble the products on their own as a part of Do-It-Yourself (DIY). In fact, the DIY strategy helped it to focus attention on redesigning the products from time to time and also helped it to give the customers a new experience in buying home furniture.

IKEA stocks its products in a large warehouse, preferably located in a large area with ample space for parking and an attached restaurant which served exquisite Swedish cuisine. The customers could walk into any IKEA store, look at the range of products displayed andexperience the furniture as they were using at home. This *feel furniture* experience helped the customers to gauge the utility of the furniture if they really bought the same. This "*feel furniture* experience" also provided the customers the idea of assembling the furniture as how they could be assembled once they bought the same and Do-It-Yourself (DIY), where the customers would pick up the pack from the warehouse and assemble the entire product at their home. That was simple. In fact, warehousing and *feel furniture* experience has made IKEA a unique furniture retailer in the world.

Home Décor Market in India

India is a young and attractive market for furniture. With growing urbanization the middle class families are also increasing in number. By 2025, 70% of households will be classified as middle income group.[3] Disposable income is increasing;

Overall consumer expenditure was US $0.22tn in the year 2000 and it reached US$ 1.3tn in 2015.[4] It is expected to grow seven times in the next 15 years to reach US $7.3tn in 2030. Retail and distribution business avenues are multiplying, investments in healthcare and hospitality sector are rising. The youth today has distinct and unique preferences as far as furnishing is concerned with increasing trend towards nuclear family set up.

Political and economic support for construction sector adding sheen to the furniture in India, the average age of furniture at home has decreased from 40 years to 27 years. Revenue in the "Furniture and Home-ware" segment amounts to US$ 1399 m in 2018 and is expected show an annual growth rate of 17.2% resulting in a market volume of $2636 m in 2022.[5] User penetration is at 5.2% in 2018 and going to hit 7.8% by 2022.

IKEA Entry Level Challenges in India – Culture

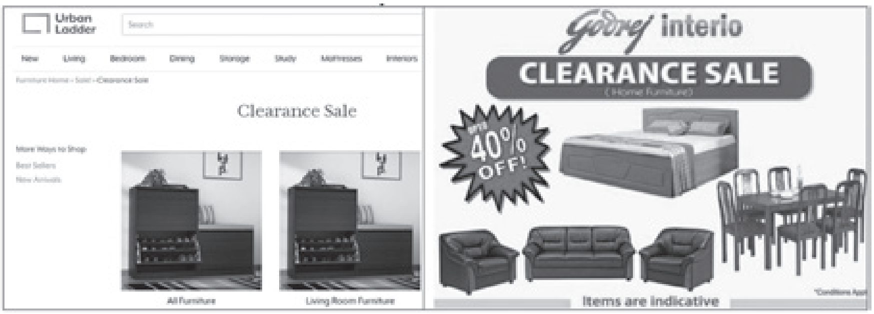
'Nobody heard about the brand'. Despite the fact that IKEA depends upon Indian suppliers, nobody heard about IKEA. The first challenge is to create a brand in the minds of the people, followed by trust and then sell the products. The home décor and furniture market is already full of organized and unorganized players. The furniture market is under the control of unorganized players who's proximity to the actual customers is close to 90% as compared to organized sector. Furniture and home décor shops are conveniently placed in the locality or the neighborhood for Indians. This has been the buying behavior of Indians. The problem becomes bigger when the customers are not very keen about the brand in home decors and furniture. This is where the challenge for IKEA lies.

'Value for money' is another big challenge for IKEA as the customers are more concerned about the price than quality of the furniture. The customers are more interested in discounts, coupons and other freebies which are offered by many retailers. (Exhibit No. 1) Festival season discounts, off-season discounts, buy one-get one, etc., which are all offered by almost all the retailers in India, irrespective of the products and services. In fact, there are many people who buy home decors and furniture during festive season which offers them freebies. Given this freebie culture and discount mania, the focus on value for money is high for Indian customers. Less brand focused and more oriented towards value for money has made things difficult for many brands in India.

> *"One of the biggest challenges is pricing. We want to be affordable to many people and that's going to be struggle in India. But we see it as a c challenge. If we are affordable in India then we will be even more affordable in the rest of the world. It will be a learning experience for us. Marcus Engman, Global Design Head, IKEA[6]"*

The challenge of pricing and value for money is one of the biggest expectations for Indian customers. The problem of pricing becomes all the more challenging due to spread of the unorganized furniture makers who can provide the products at throwaway prices compared to IKEA. IKEA needs to overcome the *'value for money' for* the Indian customers as most of them are price sensitive.

Exhibit No. 1: Clearance Sale by the Home Decors in India[7]



'Home furnishing is not a priority for Indians.' This is a bleak statement for IKEA. Indians are more *casual type*; they are comfortable with whatever they have rather than long for furnishing their homes. Since frugality is a part of Indian culture, where the children are encouraged for a rainy day, people are not very much interested in spending their money on furnishing or decorating their homes with costly furniture and decorations. The frugality or frugal culture has played a big way in keeping away the Indians from spending on expensive items and goods. Although, the younger generation has an inclination towards the home decors and furnishings in a big way, there is still a large chunk of the Indian customer, who is less oriented towards spending money on home furnishing and furniture.

Do-It-Yourself (DIY), I don't. Home décor and furnishing has been one area where women play a larger role than men and probably this could be one of the reasons why DIY is not in tune with India's culture. The customer wants to buy a product which is complete in all aspects and ready to use rather than *bringing the boxes, opening them up, reading the manual, taking out the tools, assembling the product and finally using the same.* Again coming to the Indian culture, one needs to understand that DIY is alien to the customer as the Indians are accustomed to buying a finished product not a semi-finished or unfinished product. The completely finished product is brought home and then puja is done *(a religious activity where the buying of the product is celebrated by worshipping with flowers, coconut and lighting.)* This happens for every new product.

> *"I know you usually go to a carpenter to assemble furniture. We will probably do a bit of both in India – DIY as well as provide help. We are not going to force you to do it yourself. Plus, we are trying to make our DIY furniture easier to assemble. Marcus Engman, Global Design Head, IKEA[8]"*

This could be another challenging task for IKEA as the customers are dependent on carpenters and the lack of DIY culture in India. As rightly stated by Engeman, the depending on the customer is high and DIY is considered an anathema by the Indians. This cultural block among the Indians could be a big dampener for IKEA which needs to be addressed at an initial stage.

No aesthetic sense and carvings in furniture. Indians are crazy about carvings in all facets of their living – kitchen, table, book, dress, doors, buildings, etc. The IKEA designs are more flat footed and plain without any carvings. The IKEA products are not attractive in aesthetic sense – carvings, colours, designs, etc, and hence have less customer appeal. The customers crave for a colorful textiles and curtains than plain vanillas, hence, IKEA needs to address the aesthetic sense of Indians.

> *Mia Olsson, the Country Com&In Manager, IKEA India said. "India has taught us a lot of what of what we know about textiles, so we thought it only fitting to pay tribute. You could say that our whole approach to textiles is a tribute to India. However, to really show our gratitude, we've collaborated with local designers to create a collection for the Indian market."*[9]

Indian customers are spread over a large geographic area and demographic range. Every 100 miles, one can find a different cultural milieu with people preferring different colours, designs, carvings, patterns, etc. Catering to such diverse culture in terms of aesthetics may prove a difficult challenge for IKEA.

Copycat, copycat, where are you? IKEA faced a big challenge in China. Its designs were copied by other competitors and due to weak intellectual property rights milieu, it was tough for IKEA to stop the competitors from copying their designs. Due to the 90% of unorganized home décor and furniture market, IKEA can face copycats of its designs made at a lesser price to the Indian customer. This could be a big challenge for IKEA as the furniture could be tweaked here and there to circumvent the issue of design copying. A rigorous implementation of the Intellectual Property Rights too may not restrict others from copying IKEA designs completely.

IKEA Entry Level Challenges in India – Competition

Pepperfry was found in the year 2012 by Ambareesh Murthy and Ashish Shah to establish a marketplace business model and thereby provide a platform for the buyer and the seller. Supported by some angel investors, Pepperfry started its aggressive growth in major cities in India. Pepperfry established warehouses in those cities where they have access to suppliers of traditional and modern pieces of furniture. They have made Jodhpur a sourcing center where exquisite items of furniture and home décor are collected from the state of Rajasthan. The state of Rajasthan is famous for carvings, paintings and designs which are very traditional in nature and difficult to replicate by others.

In a bid to give a big boost, Pepperfry built its 2,85,000 square feet Fulfillment Center in Mumbai where all the products from different parts of the country are stored. The Fulfillment Center serves as the nerve center for the storage of the furniture on a massive scale. The Center is designed strategically so that the delivery trucks can reach inside the Center for loading the products, which can cut down the delivery time for the customers. Parking bays are clearly demarcated for different cities enabling Pepperfry to sort out the products easily for the delivery. The Center has recorded an accuracy level of 99.95% in inventory stock and operations. Pepperfry has access to more than 3000 merchants across the country and product deliveries is made to more than 500 cities in the country.

Pepperfry did not stop with online presence only but has created experience centers for the customers which showcased the range of products and also provide the customers a unique experience of its aesthetic prowess. *Pepperfry Studio, as it is known*(Exhibit No. 2) is designed to provide a product feel for the customers. With around 14 studios spread over the country, Pepperfry has a plan to increase the number to 50 in next couple of years. Pepperfry wants to enhance its brand visibility through *Pepperfry Studio* and thereby enhance the brand recall among the prospective customers.

Exhibit No. 2: Pepperfry Studio[10]

Pepperfry claimed around 2,500 orders per day with an average value of Rs. 18,000 which has helped it to garner more than 50% of the market share in home décor and home furniture. With its big ticket expansion through different mixes – franchisee model and company owned studios; Pepperfry has donned the role of a potential player in Indian home décor and furniture market. While speaking about the impending competition from IKEA, Ambareesh Murthy, the Co-Founder and CEO, Pepperfry said,

> *"I am future positive. More choices for us Indian customers will result in greater interest in the furniture category and benefit the entire ecosystem."*[11]

Urban Ladder too made its foray in the year 2012 as an online home décor and home furniture seller in the city of Bangalore in India. Urban Ladder was founded by Ashish Goel and Rajiv Srivastava to get a share in the unexplored home décor and furniture market, dominated by unorganized sectors. Urban Ladder (UL) presently offers more than 4000 products across different furniture categories and has been on the prowl to increase its footprint in more categories. UL, which started its operations in online mode has also entered into offline mode and intends to expand to 15-20 stores across the country by FY 2019.

These centers are expected to give a boost to its offline presence and also act as an experience and retail centers. Given the increasing presence of Pepperfry and Godrej Interio, UL did not want to lag behind in its expansion spree across the country. Urban Ladder is one of the competitors for Godrej Interio and Pepperfry as well given the rapidity with which it has scaled up its operations in the last couple of years.

Godrej Interio is one of the subsidiaries of Godrej Group which is equated with *trust, quality and reliability* for most of the Indians. Godrej is a household name for the Indians as most of them have come across the name of *'Godrej'* at least once in their life time through one product or the other. This is a challenge for IKEA as the customers are more familiar with Godrej home décor and furniture Godrej Interio. Godrej Interio is the largest furniture brand in India. Godrej Interio (GI) has around 250 exclusive showrooms and 800 dealers spread across 650 cities across India. GI has readied its war chest with Rs. 6 billion for its expansion plan along with going digital. The strength of GI lies in its 5 manufacturing plants and 85 major suppliers. They are relentlessly pushing GI to the newer markets both in India and abroad.

With competition getting intense from the new entrepreneurs along with IKEA's entry, GI is on expansion spree with more and more outlets being opened in Tier 2 and Tier 3 cities. Given the credibility and brand image, GI intends to capture the market before other players like Pepperfry, Urban Ladder or IKEA can lay their hands on these cities. GI is also making its presence felt in rural markets by introducing products which are more amenable to rural population. This is where GI is ahead of its competitors. There is an increase in the number of manufacturing plants coupled with introduction of new technologies, to face the competitive landscape and customer expectations.

In a span of ten years, GI has brought down its supplier base to 85 from 600 and also increased the procurement value of each supplier by ten times. To integrate the back end operations, GI has also initiated measures to counter the competitors wherein a flagship retail outlet was opened in Bangalore in the year 2018. This outlet is akin to IKEA's retail store and Pepperfry's studio. Bangalore is considered as one of the primary markets for the new age entrepreneurs and aspiring middle class segment of the Indian society. Unlike IKEA, GI's strategy is to build an extensive network of dealers and franchises across the country to reach out to a large number of customers.

> *"We foresee market consolidation in favour of the organised players. Our focus will be to cater customers with 'Made to Order' products and overcome local unorganised segment," Vice President, Godrej Interio*[12]

The expectation of GI about consolidation with the entry of IKEA may hold good for the market but the local players including Pepperfry, Urban Ladder, etc., may garner a major share till IKEA consolidates its position in the market. That apart, almost all the players are in the mode of aggressive expansion in metro cities, Tier 2 and Tier 3 cities as well indicating a tough competition in the days to come.

IKEA Entry Level Challenges in India – Omni Channel

However, the world over, people are going online and IKEA too has adopted the online mode apart from the offline mode. During the year 2015, 1.5 billion people all over the world visited its websites compared to 716 million people who visited the IKEA store. The former IKEA CEO Peter Agnefjail saw the change happening as more customers thronged IKEA website. In a statement, he said, IKEA "*will now focus on online sales as well as plans on evolving traditional retail". He further said "the company will have to go multi-channel since its clients are constantly walking across channels"*.

The growth story of IKEA so far has been to establish large stores spread over a few thousand square meters and showcase different home décor and furniture to the customers. The IKEA philosophy had been to provide the customers a firsthand experience of the furniture at its stores. The stores are not just stores to display IKEA products but provide a feel about IKEA's designs and depth of its knowledge about the products and the customers. IKEA wants the customers to know how much they care about their family moments at home and how their relationships are woven around furniture of all kinds. Therefore, IKEA had believed in customers' experiencing the home décor and furniture at stores in real life conditions. Any IKEA store is not just about showcasing the IKEA products but a landmark in any city it is located due to its immense size and the variety of the products offered to the customers.

IKEA is keen to stick to its core competency of large stores showcasing a variety of products to the customers, where the customers can practically experience the products by touching, sitting, sleeping, total use of sensory organs as well. However, it is also keen on providing a seamless experience about the IKEA products to the customers in online mode. Although, the plan is to open an IKEA store first and go online next, the trend in India has been a different one for the home decors and furniture sellers.

Pepperfry and Urban Ladder both started as online sellers first and then started creating offline experience with their studios and stores. In fact, the online model has been successful for both these companies. The customers have accepted the same ethos as well. Although, the same may differ in the case of Godrej Interio, which initially started with offline mode, was able to stretch its arms far and wide due to its Godrej lineage.

> *"We realized last year that the rate of growth for online customers was stagnating. A lot of that was driven by fundamental macroeconomic shifts, driven by an orientation that the companies had to improve their financial architecture. Hence, spends on top line were lower last year. At that time, it was our duty as a business to create multiple other interfaces to connect with the business," Ambareesh Murty, CEO, Pepperfry.*[13]

Pepperfry, is planning an omni channel strategy to reach out to the customers in Tier 2 and Tier 3 cities and also strengthening their presence in metro cities in India. In a country like India, where one finds the emergence of a new breed of customers – oriented towards online – has emerged, online has become an important strategy to garner a larger pie in the market. Similar, is the strategy of Urban Ladder which has come out with its 'experience center' to widen its offline base, which has been considered crucial for growth. Urban Ladder has also moved towards omni channel mode of expanding which is vital in a country like India. In fact, the omni channel is considered as more profitable than a single channel in

India given its cultural diversity and geographic spread. Omni channel is one of the key decisions taken by Urban Ladder to move towards profitability during the FY 2018-19.

Pepperfry has also plans to expand through franchise mode and also Pepperfry studio mode which essentially means, it is going on the Godrej Interio model of growth. Godrej Interio too has its own exclusive outlets coupled with franchisee stores which have helped it to spread the GI network.

> *As part of our plans for 2018, we are also looking to expand our omnichannel network to cities beyond the metros; we are already in 12 cities today and will expand to many more through a mix of franchisee and company-owned studios in the years to come.”*[14]
> *Ambareesh Murty, CEO, Pepperfry*[15]

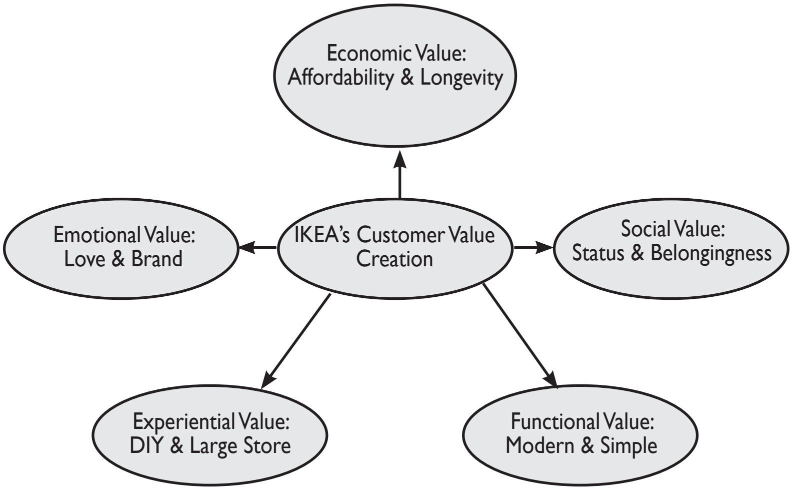
Godrej Interio has come out with its own online platform to serve the young customers across the country. Despite its strong offline presence, GI found it necessary to have a strong online presence to boost its sales. According to Mr. Anil Mathur, COO, Godrej Interio, “Bringing digital to real and linking both of them will continue to be extremely essential for us moving ahead. A good integration of both, online and offline shall continue to be our marketing strategy.”

With different home decors and furniture sellers focusing on different channels and channel mixes, how far IKEA can depend upon its IKEA stores. IKEA has reaped the benefits of online stores in other countries like China where the customers have flooded their online stores more than the offline stores. The indication is very clear for IKEA that online has more number of customers. But how will it reconcile to the fact that it grew on the strength of its offline store design, layout and furniture placed in such stores. Now the question is to what extent, IKEA will be able to shift to Omni channel to ward off competition in India.

IKEA’s Strategy and Strength

Creating customer value to capture the Indian home décor market is a challenge for IKEA, a Swedish giant. Betzel is confident on Indian market with a sense of pride emanated from his experience in understanding the Indian consumer. Amazing combination of the value types assured to Indians will be the success mantra to IKEA.

Indian consumers buy products when they get economic savings on their purchases calling it economic value maximization. IKEA incorporates affordability in its value proposition. Not to leave the minority segment of customers who values durability, longevity is also assured along with the affordability. Features are also important for customers who are modern and simple, functional value maximizing. IKEA is promising a wide range of simple and modern designs to capture the group of customers who look at functional value maximization. Being a Swedish giant, IKEA knows the importance of emotion and love towards a brand which is an intangible value to both the company and the customer.



Ingvard, a charismatic leader, could foresee the importance of emotional attachment, rooted his strongly held values and beliefs in IKEA's culture that has saved IKEA during its crisis in Indian rug market.

Customers respect products from IKEA before purchasing. Apart from Economic, Social, Functional and Emotional value, Indian customers look for experiential value during their purchase. IKEA capturing this tendency ensured a thrilling experience with its large store and variety of display. On top of it DIY (Do It Yourself) concept is new and awaited experience to the Indian customers which will attract more customers towards IKEA.

Will IKEA Become the First Choice?

Given the challenges – culture, competition and channel, the obvious question is whether IKEA will be able to penetrate the Indian market. Given the diversity of Indian populace, culture and languages, all of which change at every one hundred miles distance. In the words of IKEA, India, CEO,

> *We have big plans for India. Telangana is one of our first identified priority markets, besides Delhi NCR, Maharashtra and Karnataka. We will open a store in Mumbai in 2019, with a multichannel multi-format approach, followed by Bengaluru and Gurgaon. In the next phase, we will expand to Ahmedabad, Surat, Pune, Chennai and Kolkata. We have about 1,500 co-workers (or employees) today. We will have 50 per cent women in the workforce at all levels. In the coming years, we will have close to 15,000 coworkers.*[16]

Given the huge expectations of IKEA on one hand and with 'less planning and more learning' for IKEA, it remains a question whether IKEA will be able to break the clutter of both the organized and unorganized players in a diverse country like India.

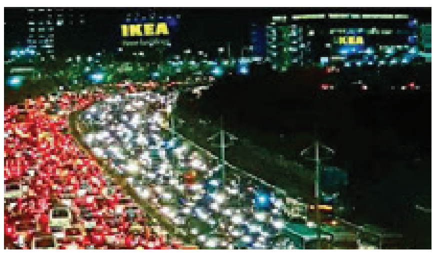
Nevertheless, the CEO of IKEA, India, Peter Betzel would have been thrilled with confidence by looking at the initial crowd thronging the IKEA store even before its formal launch. Will the crowd continue to surge into the IKEA store in the days to come or would it remain an initial euphoria? It is a question to ponder on.

The Home Décor Market in India – A Competitive Profile

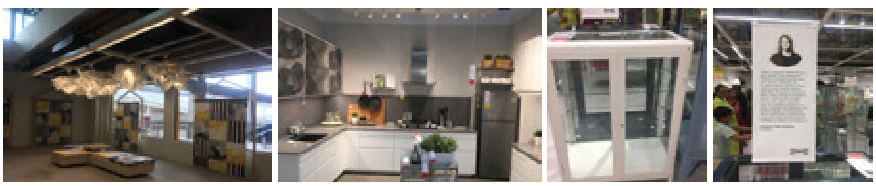
	IKEA	Pepperfry	Urban Ladder	Godrej Interio
Brand recall of the company	××	√	√	√√
Online retailing channel	××	√√	√√	√
Experience Stores for customers	√	√√	√	√
Suppliers/back end network	√√	√√	√√	√√
Franchise network for selling products	×	××	×	√√
Exclusive Business Outlets	××	××	√	√√
Multi Business Outlets	××	××	×	√√
Dealership network across the country	××	××	×	√√
Manufacturing plants	××	××	×	√√
Capability of scaling operations	√√	√	√	√√
Huge investment capacities	√√	×	×	√√
Culture knowhow of the place	××	√√	√√	√√
Knowhow of customer needs	××	√√	√√	√√
Store locations	√√	√√	√√	√√
Store size	√√	××	××	××
Range of products	√√	√	√	√
Global experience	√√	××	××	××
Global supply chain	√√	××	××	××
Global network	√√	××	××	××

√√ - *Highly favorable,* √ - *Favorable,* ×× - *Highly unfavorable,* × - *Unfavorable*

Interacting with IKEA people at Hyderabad



The traffic jam at IKEA showroom in Hyderabad



Inside the IKEA store in Hyderabad

Endnotes

1 Ikea India appoints Peter Betzel as new CEO, 12th March 2018, The Economic Times

2 Peter Betzel appointed Ikea India CEO at a crucial phase, 13th March 2018, Livemint

3 https://home.kpmg.com/xx/en/home/insights/2017/01/india-the-last-great-untapped-opportunity.html

4 https://home.kpmg.com/uk/en/home/insights/2017/01/india-the-last-great-untapped-opportunity.html

5 https://www.statista.com/outlook/255/119/furniture-homeware/india

6 For IKEA, pricing is No. 1 challenge here' , 22nd June 2018, The Times of India

7 Urban Ladder and http://www.zeri.us/godrej-office-chairs-price-in-kolkata

8 For IKEA, pricing is No. 1 challenge here' , 22nd June 2018, The Times of India

9 https://www.ikea.com/gb/en/this-is-ikea/ikea-highlights/on-the-verge-of-something-big/

10 https://www.pepperfry.com/studio-pepperfry-products-gurgaon.html

11 https://yourstory.com/2018/01/great-people-working-together-can-achieve-great-things-says-pepperfry-ceo-ambareesh-murty/

12 Ikea foray: Godrej Interio lines up Rs 6 bn investment to expand capacity, 15th June 2018, Business Standard

13 Pepperfry to expand offline presence as online sales slow, 24th February 2018, Livemint

14 https://yourstory.com/2018/01/great-people-working-together-can-achieve-great-things-says-pepperfry-ceo-ambareesh-murty/

15 https://yourstory.com/2018/01/great-people-working-together-can-achieve-great-things-says-pepperfry-ceo-ambareesh-murty/

16 India is going to be about less planning, more learning: Peter Betzel, CEO, Ikea India, 30th June 2018, The Economic Times

IPE Journal of Management

GUIDELINES TO AUTHORS

General Framework

- Abstract should contain in brief – focus, methodology, findings and conclusion with 5 to 6 key words.
- The author(s) present position, other affiliations, complete mailing address(es) (both postal and e-mail), mobile numbers should be provided.
- Any special circumstance concerning the article such as its earlier presentation at a meeting, seminar, workshop or conference should be mentioned.
- The article should be professionally proof-read in terms of clarity, grammar, spellings, punctuation and consistency of references to minimize editorial changes.
- Submit the articles in an e-mail attachment to ijm@ipeindia.org
- Papers will be acknowledged via e-mail upon receipt.
- IPE reserves the right to reject any article as it may deem unsuitable for publication, without assigning reasons.
- Articles can be processed speedily if they conform to the style and format listed hereunder.
- Editors have the right to edit the text to improve its clarity and make it conform to the journal style.
- Author(s) will receive one complimentary copy of the journal.

Format

- Limit the levels of heading within an article to two or at the most three.
- Every sub-heading should be bold and other matter should be typed in double space.

Quotations and Acronyms

- All quotations should be checked carefully for accuracy and should be unaltered except for ellipses and bracketed insertions.
- Acronyms should be spelt out on first occurrence. Capitalization should be unaltered except for ellipses and bracketed insertions.
- However, where two forms are widely in use such as liberalise / liberalize, consistency should be maintained in terms of usage throughout the article.
- The word per cent, not the symbol % should be used in the text.
- Figures below 10 should be spelt out in words, eleven and above in figures, unless the reference is to percentages 3 percent, distance 6 kms or age 9 years old.

Tables and Figures

- Table and figures should have captions and numbers.
- Tables, charts, illustrations, quotations should be numbered, cited and referenced properly.

Notes and References

- All notes and references should be at the end of the paper – first 'Notes' and then 'References'.
- Notes should be serially numbered in the text using superscript and the corresponding notes should be listed out separately at the end of the article.
- Please ensure the every reference list and vice versa.
- References listed at the end should be arranged alphabetically by the names of the authors.

For example:

Reference		**Format Outline**
Book	Book with Single Author	Surname, Initials (year), Title, Place of Publication: Publisher
Book	Book with more than two Authors	Surname, Initials & Surname Initials, (year) Title, Place of Publication: Publisher
Book	Chapter in an credited Book	Surname, Initials (year) Chapter, Title in Surname, Initials (Eds) Title, Place of Publication: Publisher
Books	Books (with no Author)	Corporate / Govt. / Dept. Name (year) Title, Place of Publication: Publisher
Journal Articles	Author	Surname, Initials (year) Title of the Paper, Journal Name, Volume Number, Issue Number
Economic & Business Dailies	Author	Surname, Initials (year) Title of the Paper, Newspaper's Name, Month, Day
Business Magazines	Author	Surname, initials (year), Title of the Paper, Business Magazine's name, Volume Number, Issue Number

All the manuscripts have to be sent to The Editor, IPE Journal of Management, Osmania University Campus, Hyderabad-500007. The manuscript can also be submitted by email at ijm@ipeindia.org; kiranmai@ipeindia.org

COMMON SUBSCRIPTION FORM

To
The Publications Division,
Institute of Public Enterprise,
OU Campus, Hyderabad - 500 007
Telangana, India.

Dear Sir / Madam,

I/We wish to subscribe for the following Journal(s) for ________________ year(s) from ________________ to ________________.

S. No.	Journal Title	Annual Subscription Rates				Put a Tick (√) for Selection
		For India			For other countries	
		Indi-viduals ₹	Academic Libraries ₹	Corpo-rates ₹	Foreign Subscribers (US$)	
1	The Journal of Institute of Public Enterprise	1500/-	2000/-	3000/-	200	
2	Journal of Economic Policy & Research	1500/-	2000/-	3000/-	200	
3	Journal of International Economics	1500/-	2000/-	3000/-	200	
4	Journal of Marketing Vistas	1500/-	2000/-	3000/-	200	
5	IPE Journal of Management	1500/-	2000/-	3000/-	200	
6	Journal of Governance & Public Policy	1500/-	2000/-	3000/-	200	

Please find enclosed herewith a Demand Draft / Cheque, bearing No. ____________ drawn on Bank __________________________________ dated ________________ for Rs/US$. ____________________ (In words) __________________________________ drawn in favour of '**Institute of Public Enterprise**', payable at Hyderabad. Please effect the subscription from next issue onwards.

Names of the Journals for which subscription is sent:

1. ________________________________ 2. ____________________________
3. ________________________________ 4. ____________________________
5. ________________________________ 6. ____________________________

Journal Dispatch Address:

Name of the Individual / Organization ______________________________________
Address ____
City ______________________________ Pin ____________ Country ____________
Ph. No. ______________________________ Mobile No. ______________________
E-mail Address ____

Signature: **Office Seal:**

Institute of Public Enterprise

Institute of Public Enterprise (IPE), Hyderabad, is a non-profit educational society devoted to Education, Training, Research and Consultancy for business enterprises in public and private sectors. IPE is a premier B-School and is recognised as a 'Centre of Excellence' by the Indian Council of Social Science Research (ICSSR), Ministry of HRD, Government of India, for doctoral studies. It is also recognised by nine universities for guidance of PhD scholars. It has developed strong links with industry and academic institutions and is the founder member of the Association of Indian Management Schools (AIMS).

IPE strongly believes that HR development including education is crucial for economic growth. As part of its long-term education programme, the Institute runs an AICTE-approved PG Diploma in Business Management, which is also recognised as equivalent to MBA by the Association of Indian Universities (AIU). Added to it, the Institute offers MBA in Public Enterprise for practicing managers in collaboration with Osmania University. With the changing needs of the industry, the Institute also runs sector-specific PGDM programmes in Retail & Marketing, Banking, Insurance and Financial Services, Biotechnology and International Business, as well as an Executive PGDM programme.

The Institute has a strong research wing with a number of research scholars, sponsored by ICSSR and IPE, working on topics of current interest. Its PhD programme is one of the largest in social sciences. Research, both basic and applied, is the forte of the Institute and helps it in its training and educational activities. IPE's research studies are extensively used by the Committee on Public Undertakings (COPU), other Legislative and Government Committees, the Economic Advisory Council to the Prime Minister, several Ministries of the Government of India, Planning Commission, Standing Committee on Public Enterprises (SCOPE) and several Finance & Pay Commissions.

Apart from IPE Journal of Management, IPE also publishes six other journals titled:

- The Journal of Institute of Public Enterprise
- Journal of Economic Policy and Research
- Journal of Marketing Vistas
- Journal of Governance & Public Policy
- Indian Journal of Corporate Governance
- Journal of International Economics

We thank Indian Council of Social Science Research (ICSSR) for Financial Assistance for Publication of the Journal.

INSTITUTE OF PUBLIC ENTERPRISE

ICSSR (MHRD, GoI) Recognized Centre for Excellence

Shamirpet Campus, Hyderabad - 500101.
Phone: +91-40-234 90 900 Fax: +91-40-234 90 999
www.ipeindia.org E-mail: editorgpp@ipeindia.org Website: www.ipeindia.org

Registered with the Registrar of Newspapers in India under Serial No. APENG/2011/44822