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Notes for Contributors

Papers based on application oriented research or field studies in the areas of industry, commerce, business studies and management are invited. The length of a paper including tables, diagrams, illustrations, etc., should not exceed 20 double space pages. Short communications (not more than 5 double spaced pages) relating to review articles, report of conferences, summary/views on various governments reports, debatable issues, etc., are also published. Book reviews and summary of Ph.D. dissertations not exceeding two double spaced pages, are welcome. Manuscripts sent for publication in this journal should not have been published or sent for publications elsewhere. All correspondence will be held with the senior (first) author only.

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Interlinkages of India's Stock Market with China, Hong Kong and United States

D.P. WARNE AND SUMAN

Abstract: The paper studies the integration of Indian stock market with China, Hong Kong and United States. Augmented Dickey Fuller Test, Granger Causality test, Vector Auto Regression Model, Variance Decomposition Analysis and Impulse Response Function are used for the purpose of analysis. The findings show that there is no long run equilibrium relationship between the markets under study but Indian stock market was found integrated with Hong Kong and United States in short run. So, there may be benefits of portfolio diversification for international investors in countries under the study.

Key words: Portfolio Diversification, Vector Auto Regression, Variance Decomposition, Impulse response.

Introduction

The globalization of capital flows has led to the growing relevance of capital markets. India is one of the countries with an expanding capital market that is increasingly attracting funds from foreign countries which increase integration. Integration is a process by which markets become open and unified so that participants in one market have an unrestricted access to another market. Financial market integration implies that in the absence of administrative and informational barriers, risk adjusted returns on assets of the same tenure in each segment of the market should be comparable to one another. Financial integration can be classified in two parts, direct and indirect financial integration. Direct financial integration is also known as capital market integrated with one another. Indirect financial integration refers to a situation in which the return on an investment in one country is indirectly linked to return on investments in other countries.

Stock market integration refers to a status where investors of one country can buy and sell equities (without limits) that are issued in another country and as a result, identical securities are issued and traded at the same price across markets after modification for foreign exchange rates. It plays an essential role in development of stock market as well as economy of the country. It affects the macroeconomic policies and market effectiveness, so it is important for

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academicians and policy makers. For international investors, stock market integration helps in portfolio diversification. They can maximize their returns and minimize risk with the help of portfolio diversification. There are two types of risk, one is systematic and other is unsystematic. The systematic risk can be caused by inflation, interest rates, recessions, wars etc. The systematic risk cannot be eliminated. The unsystematic risk is linked only to specific assets and stems from financial leverage, managerial inefficiency, technological change in production process etc. and it can be managed by portfolio diversification. Returns represent the equity market. The risk and return always have a positive relationship. According to modern portfolio diversification theory, if the stock markets are integrated then benefits of portfolio diversification might be limited and vice-versa. In other words, if integration exists then the strategy of portfolio diversification may no longer apply. As economies opened up and become more liberalized, integration of global economies become unavoidable.

Review of Literature

Wong, Aggarwal and Du (2004) found that Indian stock market was co integrated with stock markets of United States, United Kingdom and Japan. There was unidirectional causality run from both US stock market and Japan stock market but not from the UK stock market to the stock market of India and there was no causality run from the Indian stock market to any of the market from the US, UK or Japan. Venkata (2006) found that Indian stock market get influenced by most of the developed country's stock markets and also by most of the developing stock markets. Mukherjee and Bose (2008) found that U.S. market lead to all Asian markets and observe the linkages between Indian market and other Asian and developed markets. Indian stock market has been led by major stock index returns in U.S., Japan and other Asian markets such as Hong Kong, South Korea and Singapore. Dhal (2009) found that within Asia, Singapore and Hong Kong markets had a significant influence, while the Japanese market had a weak influence on the Indian Market. Dhanraj, Gopalaswamy and Suresh (2013) revealed the dominance of US stock market on Asian markets and the other important finding was that major crisis events can influence the relationship among stock markets Tripathi, Seth and Kumar (2013) indicated high correlation, stationary data, bidirectional relationship and long run relationship between Indian and other selected stock markets.

Objectives of the Study

- 1) To find out the cause and effect relationship between Indian and selected stock markets.
- 2) To examine the long run equilibrium relationship between the stock markets of India, Hong Kong, China and United States.
- To determine the short term linkages between Indian and other selected stock markets.

Hypotheses

 H_{01} = There is no cause and effect relationship among the selected stock markets

- H_{02} = There is no long run equilibrium relationship between different markets.
- H_{03} = There is no short term linkages between the returns of Indian and selected stock markets.

Research Methodology

Database

Daily closing prices of selected stock market indices for the period from 1st Jan. 2001 to 31st Dec. 2015 have been collected from Yahoo finance. Following stock market indices are taken for study: S & P 500 as an indicator for the US stock prices (New York Stock Exchange), HSI for Hong Kong (Hong Kong Stock Exchange), SSE composite Index for China (Shanghai Stock Exchange) and BSE SENSEX as an indicator for Indian stock prices (Bombay Stock Exchange). The missing values in the data of some of the stock exchanges for some days have been filled-up by taking the average of the two nearest cases. Natural log of the selected series gives the daily return of the given indices under the study. The formula of calculating the natural log of indices/closing prices is given as follows:

$$R_{t} = \ln (P_{t} / P_{t-1})$$

Where:

 R_t = Return on day 't', P_t =Index closing value on day 't', P_{t-1} = Index closing value on day 't-1', ln= Natural log

Econometric Techniques

Augmented Dickey Fuller Test

The analysis of econometrics can be performed on a series of stationary nature. We use the Augmented Dickey Fuller Test to confirm whether or not the series are stationary or not. A process is said to be stationary if its mean and variance remain unchanged over time. To test the unit root problem, the most widely used test is ADF. The general form of ADF test can be written at level and first difference are as follows:

$$\Delta Y_{t} = \alpha + \beta t + \delta Y_{t-1} + \sum_{t=1}^{k} \gamma i \Delta Y \quad \gamma_{i} + \mu_{t} \quad (1)$$

$$\Delta \Delta Y_{t} = \alpha + \beta t + \delta \Delta Y_{t-1} + \sum_{t=1}^{k} \gamma i \Delta \Delta Y t - 1 \quad + \mu_{t} \quad (2)$$

If $\delta = 0$, then the series is said to have a unit root and is non-stationary. Hence, if the hypothesis, $\delta = 0$ is rejected for the above equations then it can be concluded that the time series does not have a unit root and is integrated of order zero I(0) i.e. it has stationary properties.

Granger Causality Test

After the stationarity of series, we perform the Granger's causality model in order to observe whether the return at Indian stock exchange granger causes the return at the stock exchanges of Hong Kong, China and United States or vice versa. The Granger (1969) approach to the question of whether x causes y is to see how much of the current y can be explained by past values of y and then to see whether adding lagged values of x can improve the explanation. y is said to be Granger-caused by x if x helps in the prediction of y , or equivalently if the coefficients on the lagged x 's are statistically significant. It is pertinent to note that two-way causation is frequently the case; x Granger causes y and y Granger causes x. In Granger's Causality, there are bi variate regressions of the under-mentioned form:

$$Y_{t} = \alpha_{0} + \alpha_{1}Y_{t-1} + \dots + \alpha Y_{t-1} + X_{t-1} + \dots + \beta X_{t-1} + \varepsilon_{t}$$
(3)

for all possible pairs of (X, Y) series in the group. Where a_t and μ_t are two white noise random disturbance terms.

Johansen's Cointegration Test

The Johansen (1988, 1991, 1995) procedure tests the presence of long run relationship between the variables and to perform the cointegration analysis. E Views supports VAR-based cointegration tests using the methodology developed in Johansen (1991, 1995) performed using a Group object or an estimated Var object.

Consider a VAR of order:

$$Y_{t} = A_{1}y_{t+1} + \dots + A_{p}y_{t+p} + Bx_{t} + \varepsilon_{t}$$
(5)

where y_t is a k-vector of non-stationary I(1) variables, x_t is a d-vector of deterministic variables, and a_t is a vector of innovations. We may rewrite this VAR as,

$$\Delta y_t = \Pi y_{t-1} + \sum_{i=1}^{p-1} \Gamma_i \Delta y_{t-i} + Bx_t + \epsilon_t$$

where

$$\Pi = \sum_{i=1}^{p} A_{i} - I, \qquad \Gamma_{i} = -\sum_{j=i+1}^{p} A_{j}$$

Vector Auto Regression (VAR) Model

If there is no cointegration between Indian and other selected stock markets then Vector Auto Regression is capable to discover the short run relationships. The vector autoregression (VAR) is commonly used for forecasting systems of interrelated time series and for analyzing the dynamic impact of random disturbances on the system of variables. The mathematical representation of a VAR is:

$$Y_{t} = A_{1}Y_{t-1} + \dots + A_{p}Y_{t-p} + BX_{t} + \varepsilon_{t}$$
(6)

where Y_t is a k vector of endogenous variables, X_t is a d vector of exogenous variables, A_1 ,, A_p and B are matrices of coefficients to be estimated, and a_t is a vector of innovations that may be contemporaneously correlated but are uncorrelated with their own lagged values and uncorrelated with all of the right-hand side variables.

Variance Decomposition Analysis

The variance decomposition analysis has applied to quantify the extent up to which the selected indices one influenced by each other. We can also examine the short run dynamic relationship by variance decomposition. While impulse response functions trace the effects of a shock to one endogenous variable in the VAR, variance decomposition separates the variation in an endogenous variable in to the component shocks to the VAR.

Impulse Response

Impulse responses have been applied to trace out the responsiveness of the dependent variables in the VAR to shocks to each of the variables. So, for each variable from each equation separately, a unit shock is applied to the error, and the effects upon the VAR system over time are noted.

Analysis and Results

Augmented Dickey Fuller Test

The Augmented dickey fuller test is applied to confirm that the series are stationary or not. This method is applied on closing prices of selected indices. In the Table 1 and 2, we show the results of ADF on closing prices at level and Ist difference to see the stationarity of series, which are as follows:

	8		81	
	Intercept	Tren	d	None
India	-0.5152(-3.4318)	-2.874(-3.	9603)	1.2479(-2.5655)
Hong Kong	-1.6073(-3.4318)	-2.8681(-3	.9603)	-0.035(2.5655)
China	-1.5051(-3.4318)	-1.958(-3.	9603)	-0.1690(-2.5655)
U.S.	-0.3119(-3.4318)	-1.9081(-3	.9603)	0.8110(-2.5655)
		Intercept	Trend	None
Level of significance	1%	-3.4318	-3.9603	-2.565
	5%	-2.8620	-3.41095	-1.9409
	10%	-2.5671	-3.1272	-1.6160

Table 1: Augmented Dickey Fuller Test on closing prices at level

	Intercept	Trend	None
India	-59.036(-3.4318)	-59.0313(-3.9603)	-58.9967(-2.5655)
Hong Kong	-64.6504(-3.4318)	-64.642(-3.9603)	-64.655(2.5655)
China	-28.333(-3.4318)	-28.335(-3.9603)	-28.332(-2.5655)
U.S.	-67.661(-3.4318)	-67.684(-3.9603)	-67.6563(-2.5655)

Source: Computed

		Intercept	Trend	None
Level of significance	1%	-3.4318	-3.9603	-2.565
	5%	-2.8620	-3.41095	-1.9409
	10%	-2.5671	-3.1272	-1.6160

The results of Table 1 show that the series are non stationary in nature but in table 2, at the first difference in all the cases t-statistics is more than the test critical value (irrespective of sign), this implies that the null hypotheses is rejected and the variable does not have a unit root, which confirms that the series are stationary after differencing one.

Granger Causality Test

The granger causality test conducted to see whether India stock market cause other markets and vice versa in short run. Table 3 present the findings of granger's causality test for the stock exchanges under study.

	Table 3:	Pair	Wise	Granger	Causality	Test
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Lags: 2

Null Hypothesis:	Obs	F-Statistic	Prob.	
H.K. does not Granger Cause India	3911	4.57668	0.0103	
India does not Granger Cause H.K.		40.4116	4.00E-18	
CHINA does not Granger Cause India	3911	3.11814	0.0443	
India does not Granger Cause CHINA		7.3452	0.0007	
U.S. does not Granger Cause India	3911	104.528	6.00E-45	
India does not Granger Cause U.S.		0.46236	0.6298	

Source: Computed

Level of significance 5%

The Table 3 presents the results about the application of Granger's causality model to the selected stock markets. From the Probability values of the Granger causality test, the acceptance and rejection decision for the null hypothesis can be taken. While we support the null hypothesis for the cases with probability value above 0.05, we reject the ones with lesser than 0.05 probability value. Going by this rule, we fail to reject the following null hypothesis-

R India does not granger causes R U.S.

But we support the under mentioned alternate hypothesis:

- 1. R H.K. granger causes R India
- 2. R India granger causes R H.K.
- 3. R China granger causes R India
- 4. R India granger causes R China
- 5. R U.S. granger causes R India

The bidirectional causal relationship is found between Indian stock market and the stock market of Hong Kong and China. Also, there exists unidirectional relationship between India and US.

Johansen's Co-Integration Analysis

Cointegration of two or more time series suggests that there is a long run equilibrium relationship between them. In Johansen's approach, we applied Johansen's cointegration test to see whether Indian stock market is co integrated with other stock markets under the study. It must be noted that the closing prices (which are non stationary in nature) of the selected indices are used to test the cointegration among the markets not the return series. The results of Johansen's cointegration test are as follows:

Hypothesized				
No. of CE(s)	Eigenvalue	Trace Statistic	0.05 Critical Value	Prob.**
None	0.003793	32.98893	47.85613	0.5574
At most 1	0.003626	18.1342	29.79707	0.5562
At most 2	0.000895	3.933184	15.49471	0.9088
At most 3	0.00011	0.431646	3.841466	0.5112

Table 4: Unrestricted Cointegration Rank Test (Trace)

Source: ComputedTrace test indicates no cointegration at the 0.05 level

* denotes rejection of the hypothesis at the 0.05 level

**MacKinnon-Haug-Michelis (1999) p-values

Table 5: Unrestricted Cointegration	Rank Test (Maximum	Eigen Value)
-------------------------------------	--------------------	--------------

Hypothesized No. of CE(s)	Eigenvalue	Max- Eigen Statistic	0.05 Critical Value	Prob.**
None	0.003793	14.85473	27.58434	0.7596
At most 1	0.003626	14.20102	21.13162	0.3488
At most 2	0.000895	3.501538	14.2646	0.9078
At most 3	0.00011	0.431646	3.841466	0.5112

Source: ComputedMax-eigenvalue test indicates no cointegration at the 0.05 level

* denotes rejection of the hypothesis at the 0.05 level

**MacKinnon-Haug-Michelis (1999) p-values

Table 4 and 5 show that there is no cointegrating equation at the 0.05 level in trace statistics and maximum eigen value. So, the results of Johansen's cointegration said that there is no cointegration or no long run equilibrium relationship between India and the stock markets of Hong Kong, China and United States.

In our study, there is no cointegration between Indian and other selected stock markets so, Vector Auto regression is capable to discover the short run relationships of India stock market with other selected stock markets.

Vector Auto Regression Analysis

The table 6 presents the results of VAR model at selected stock markets to see the short run relationship between India and other selected stock markets (applied on return series). By the application of the VAR model, we observe that the

integration of a stock exchange with the other can be established if the t-value is more than 1.96 (irrespective of sign). The integration of the stock exchange with the other is tested at the lag of 1 and 2. The return at lag 0 is taken in the column wise the returns at all the stock exchanges at lag 1 and lag 2 are taken in the rows. The results of VAR model are as follows:

	India	H.K.	China	U.S.
India(-1)	0.004565	0.085992	0.047899	0.011389
	-0.01816	-0.01667	-0.02039	-0.01573
	[0.25137]	[5.15813]	[2.34878]	[0.72392]
India(-2)	-0.04577	0.017513	0.013015	0.011016
	-0.0182	-0.01671	-0.02044	-0.01577
	[-2.51441]	[1.04797]	[0.63667]	[0.69854]
H.K.(-1)	-0.06922	-0.21621	-0.05596	0.00566
	-0.02113	-0.0194	-0.02373	-0.01831
	[-3.27581]	[-11.1450]	[-2.35816]	[0.30915]
H.K.(-2)	0.033254	-0.01155	-0.02555	-0.01535
	-0.01939	-0.01781	-0.02178	-0.0168
	[1.71458]	[-0.64841]	[-1.17298]	[-0.91370]
CHINA(-1)	-0.02356	-0.03962	0.013844	-0.00421
	-0.01535	-0.0141	-0.01724	-0.0133
	[-1.53428]	[-2.81052]	[0.80285]	[-0.31619]
CHINA(-2)	0.00631	-0.00391	-0.01898	-0.00815
	-0.01534	-0.01408	-0.01723	-0.01329
	[0.41132]	[-0.27733]	[-1.10184]	[-0.61302]
U.S.(-1)	0.277549	0.542615	0.178906	-0.10156
	-	0.01946	-	0.01787
	-0.02186		-0.01686	
	[14.2618]	[30.3712]	[8.18598]	[-6.02384]
U.S.(-2)	0.152335	0.163077	0.062363	-0.04102
	-0.02144	-0.01968	-0.02408	-0.01857
	[7.10492]	[8.28491]	[2.59002]	[-2.20823]
С	0.00045	-2.00E-06	8.15E-05	0.000116
	-0.00023	-0.00021	-0.00025	-0.0002
	[1.99662]	[-0.00968]	[0.32186]	[0.59170]

Table 6: Vector Auto Regression estimates

Source: Computed

Standard errors in () & t-statistics in []

The Table 6 shows that the returns at India, at the lag of 0 is influenced by the return at H.K. at lag 1, returns at US at the lag 1 and 2. The returns in H.K. at lag 0 are influenced by the returns in India at lag 1, returns in H.K. at lag 1, returns in China at lag 1 and returns at U.S. at lag 1 and 2. Returns in China at lag 0 are influenced by the returns in India at lag 1, returns in H.K. at the lag 1, returns in U.S. at lag 1 and 2. Returns in H.K. at the lag 1, returns in U.S. at lag 1 and 2. Returns in U.S. at lag 0 moves independently and is not influenced by any other variable. The study of the VAR model leads us to the conclusion that in short run India is influenced by Hong Kong and U.S. and influence to Hong Kong and China.

Variance Decomposition Analysis

The Variance decomposition is also used to see the short run dynamic relationship between India and other selected stock markets. The variance decomposition analysis of the selected stock exchanges is presented by the Tables from 7 to10. The following Tables decompose the returns at the selected stock exchanges for a period ranging from 1 to 10:

Table 7: Variance decomposition of India

Period	S.E.	India	H.K.	China	U.S.
1	0.014078	100	0	0	0
2	0.014455	94.9745	0.037171	0.108475	4.879855
3	0.01451	94.2543	0.353383	0.109982	5.282333
4	0.014513	94.22422	0.366965	0.110384	5.298433
5	0.014513	94.2222	0.36766	0.110466	5.299677
6	0.014513	94.22213	0.367726	0.110474	5.299672
7	0.014513	94.22211	0.367729	0.110474	5.29969
8	0.014513	94.22211	0.36773	0.110474	5.29969
9	0.014513	94.22211	0.36773	0.110474	5.29969
10	0.014513	94.22211	0.36773	0.110474	5.29969

Source: Computed

Table 8: Variance decomposition of H.K.

Period	S.E.	India	H.K.	China	U.S.
1	0.012924	20.97992	79.02008	0	0
2	0.014539	17.81309	63.42035	0.330798	18.43576
3	0.014548	17.82835	63.42429	0.330418	18.41694
4	0.014553	17.8247	63.39291	0.331002	18.45139
5	0.014554	17.82457	63.39265	0.331001	18.45178
6	0.014554	17.82457	63.39265	0.33101	18.45178
7	0.014554	17.82457	63.39265	0.33101	18.45178
8	0.014554	17.82457	63.39265	0.33101	18.45178
9	0.014554	17.82457	63.39265	0.33101	18.45178
10	0.014554	17.82457	63.39265	0.33101	18.45178

Source: Computed

			1		
Period	S.E.	India	H.K.	China	U.S.
1	0.01581	2.54202	11.23656	86.22142	0
2	0.015973	2.85623	11.01671	84.46672	1.660346
3	0.015982	2.858058	11.02444	84.41343	1.704077
4	0.015984	2.860733	11.02177	84.3921	1.725403
5	0.015984	2.860783	11.02176	84.39204	1.725421
6	0.015984	2.860787	11.02177	84.392	1.72545
7	0.015984	2.860787	11.02177	84.392	1.72545
8	0.015984	2.860787	11.02177	84.392	1.72545
9	0.015984	2.860787	11.02177	84.392	1.72545
10	0.015984	2.860787	11.02177	84.392	1.72545

Table 9: Variance decomposition of CHINA

Source: Computed

Table 10: Variance decomposition of U.S.

Period	S.E.	India	H.K.	China	U.S.
1	0.012196	7.276365	3.590645	0.148055	88.98493
2	0.012254	7.222477	3.581114	0.146782	89.04963
3	0.012262	7.215986	3.638575	0.154577	88.99086
4	0.012262	7.215842	3.641858	0.154845	88.98746
5	0.012262	7.215834	3.641881	0.154862	88.98742
6	0.012262	7.215842	3.641885	0.154862	88.98741
7	0.012262	7.215842	3.641885	0.154862	88.98741
8	0.012262	7.215842	3.641885	0.154862	88.98741
9	0.012262	7.215842	3.641885	0.154862	88.98741
10	0.012262	7.215842	3.641885	0.154862	88.98741

Source: Computed

Table 7 reveals that in case of Indian stock market, there is some visible impact of United States for the period from 2 to 10. Table 8 shows that the returns of Hong Kong stock exchange is composed by the returns of BSE for the period from 1 to 10 and returns of United States for the period from 2 to 10. Table 9 shows that the returns at Shanghai stock exchange are influenced by returns at BSE and Hong Kong stock exchange for the period from 1 to 10 and also influenced by returns at New York stock exchange for the period from 2 to 10. Table 10 shows that the returns at BSE and Hong Kong stock exchange for the period from 2 to 10. Table 10 shows that the returns at BSE and Hong Kong stock exchange have some visible impact on returns at New York stock exchange for the period from 1 to 10.

Impulse Response

The impulse response analysis investigates the influence of random shock on the markets. Impulse responses of returns in various markets to a shock in their own

and other market innovations are also examined. Impulse response show the effect of shocks for different days separately the cumulative effect of shocks the variance decomposition of the stock indices is based on the analysis of responses of the variables to shocks. Figure 1 presents the impulse response functions for series India (ser01), H.K.(ser02), China (ser03), US(ser04).



Figure: 1 Impulse response function

The results of Figure 1 depict the impulse response of the stock market of India on the other stock markets (Hong Kong, China and U.S.). The Figure shows the number of days on X-axis, and the shock response on Y-axis. The Figure exhibits in about how many days the shock at the other stock exchange cools down. However, only the stock market of U.S. exerting some impact on Indian stock market.

Conclusion

The ADF test shows that all series are stationary at first difference. The results of granger causality test conclude the unidirectional causal relationship between India and U.S. but there were found the bidirectional causal relationship between Indian stock market and the stock market of Hong Kong and China. The result of Johansen's cointegration test shows no cointegrating vector at trace and maximum eigen value which indicate that there is no long run equilibrium relationship between Indian stock market with other selected stock markets. The results of VAR show that Indian stock market get influenced by US and Hong Kong and influence to Hong Kong and China. But variance decomposition showed that only stock market of US has some visible impact on Indian stock market in short run. Impulse response also proves this result. Indian stock market was not found integrated in long run with other selected markets and short run relationship is also not confirmed by all the models. So portfolio diversification benefits are available for international investors in different selected stock markets under the study in long run as well as in short run.

Interlinkages of India's Stock Market

REFERENCES

- Bhunia A. 2013. Cointegration and causal relationship among crude price, domestic gold price and financial variable: an evidence of BSE and NSE, *Journal of Contemporary Issues in Business Research*, Vol.2, No.1, pp 1-10.
- Chancharat, S. 2009. Stock market integration- An overview, NIDA Economic Review, Vol. 4, No. 2, Dec. 2009, pp 23-35.
- Dhal S., 2009. Global crises and the integration of India's stock market, *Journal* of *Economic Integration*, Vol. 24, No. 4, pp 778-805.
- Dhanraj S., Gopalaswamy A.K. and Suresh B.M. 2013. Dynamic interdependence between US and Asian market: An empirical study, *Journal of Financial Economy Policy*, Vol. 5, Issue 2, pp. 220-237.
- Gujrati, 2010. Basic Econometrics, pp 849.
- Mukherjee, P. and Bose, S. 2008. Does the stock market in India move with Asia? A multivariate co integration- Vector auto regression approach, *Emerging Markets Finance & Trade*, Sep.-Oct.2008, Vol. 44, No. 5 pp. 5-22.
- Pandian P., Security Analysis and Portfolio Management, 2nd edition, pp 127.
- Rajwani S. and Mukherjee T. 2013. Is the Indian stock market co integrated with other Asian markets?, *Management Research Review*, Emrald Publishing Group, Vol. 36, No.9, pp. 899-918.
- Rao K.M. 2014. Interrelationship among stock market of India and selected stock price indices of the Asia pecific region, *The Indian Journal of Commerce*, July- September 2014, Vol. 67, No. 3, pp. 13-20.
- Seth N and Sharma A K 2015. International stock market efficiency and integration: Evidence from Asian and US markets, *Journal of Advances in Management Research*, Emrald Group Publishing ltd., Vol. 12, Issue 2, pp 88-106.
- Sharma G. D. and Bodla, 2011. Interlinkages among stock markets of South Asia, *Asia Pacific Journal of Business Administration*, Vol. 3, No. 2, pp 136.
- Sharma G D and Mahendru M. 2013. Are the stock exchanges of emerging economies inter-linked: Evidence from BRICS, *Indian Journal of Finance*, Vol. 7, Issue 1, pp 1-25.
- Suman 2016. Interlinkages of Indian stock market with Hong Kong stock market, Asian Journal of Management Applications and Research, Vol.6(1), pp 58-63.
- Suman and Warne D.P. 2013. Global stock market integration: A Review, Asia Pacific Journal of Research in Business Management, 4(8-9), 18-28.
- Suman and Warne D.P. 2015. Interlinkages between Indian and United States stock market indices, *International Journal of Information & Futuristic Research*, Vol. 2 (9), pp 3190-3195.
- Surat S. 2011. Causality between total expenditure on education and economic growth: A case study of Haryana, *Indian Journal of Economics*, Vol. XIIC, Part 1, Issue 364, pp 1-8.
- Surat S. 2013. Public expenditure and economic growth, Indian Journal of Commerce, Vol. 66, No. 1, pp 15-22.
- Tai, C. S. 2007. Market integration and contagion: Evidence from Asian emerging stock and foreign exchange markets, *Emerging Markets Review*, Vol. 8, No.4, pp. 264-283

- Tripathi V., Seth R. and Kumar M. 2013. Inter linkages, co integration and global financial crisis: India's experience and preparedness, *The Indian Journal of Commerce*, July-Sept. 2013, Vol. 66, No. 3, pp. 173-188.
- Valdkhani A. and Chancharat S. 2008. Dynamic linkages between Thai and international stock markets, *Journal of Economic Studies*, Vol. 35, No. 5, Emrald group publishing Ltd. pp 425-441.
- Vardhan H., Sinha P. and Vij M. 2015. Behavior of Indian sectoral stock price indices in the post subprime crises period, *Journal of Advances in Management Research*, Vol. 12, No.1, pp 15-29 (17).
- Venkata S.S. 2006. Indian capital market integration with select developed and developing countries, 1997-2006, Applied Econometrics and International Development, Vol. 6, No.2, pp 227-248.
- Wong, W.K., Aggarwal A. and Du J. 2004. Financial integration for Indian stock market: A fractional co- integration approach, *Finance India*, Vol. 18, No. 4, pp 1581-1604.

A Study of Foreign Institutional Investors (FIIs) and Mutual Funds (MF) flows in Indian Equity and Debt Market

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Abstract: FIIs and MF are the major institutional investors that play a vital role in Indian stock market. This paper lays down the analytical framework to empirically test relationship of FIIs flows, and Mutual Funds flows in equity and debt market segments of Indian stock market separately. Correlation, Unit Root Test, and Granger Causality Test are applied to monthly data of FIIs and MF Gross Purchase and Gross Sales in equity and debt market is found to be significant and positive.Granger causality test revealed that FIIs and MF gross purchase in debt instigates gross purchase in equity market. Same results are noticed in case of gross sales in debt market determine flows of equity market to a large extent in case of both FIIs and Mutual Funds.

Keywords: FIIs, MF, Equity and Debt Market, Unit Root Test and Granger Causality Test

Introduction

Economic crisis of 1991 in India originated due to several factors such as inability to repay huge external debts, balance of payments crisis, etc. India introduced a series of several reforms to overcome the crisis which can collectively be termed as liberalisation. Some of the leading reforms include shift from fixed rate regime to floating interest rate regime with a view towards better price discovery and efficient allocation of resources, abolition of licensing system, allowing foreign investment, automatic approval of foreign direct investment (FDI) in many sectors, etc. India opened its stock markets to foreign investors in September 1992, and since then foreigners pumped in huge amount of investment in the form of Foreign Institutional Investor's (FII) investment in equities and debt has been flowing in India.

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Investment Pattern of FIIs and MF in Indian Equity and Debt Market

FIIs are well known for a greater appetite for equity than debt in their asset structure. The possible reason for such preference can be attributed to the fact that FIIs are more interested in short-term gains which they try to earn by increasing volatility of the market. They are also referred to as hot money which flows in a market during a boom period and flushes out in case they suspect chances of stress in the market.Whereas Mutual funds investment are regarded as a safe investment option as they are more concerned about long-term gain be it capital appreciation, moderate income growth or safety of capital invested. Mutual funds invest their funds in a vast diversified portfolio of stock and other securities to minimize risk. Thus, FIIs operate on the principle of higher the risk, higher the return while MF follows less risk and less return principle.

Initially, FIIs were more inclined to equity,but 2003-04 witnessed a substantial growth of FIIs investment in the debt market. The financial year 2014-15 was the year in which investment in debt market by FIIs surpassed investment in equity market. Increase in the investment cap of government securities market as well as of corporate bond market lead to rise of FIIs investment in the debt market.

In case of mutual funds, from the very beginning, they were inclined to debt only and kept on investing in debt at a growing rate till 2014-15. In 2007-08, mutual funds investment in equity almost gets doubled as compared to the previous year 2006-07, but from 2009-10 to 2013-14 a reversal was seen when they started disinvesting in equity at an alarming rate. However, 2014-15 onwards mutual funds again reversed their strategy with high investment in equity market and sale in debt market.

At the time of global crisis of 2008, FIIs withdrew huge funds from equity market whereas they still invested in debt market. After crisis of 2008, they aggressively invested in debt market. Same pattern has been observed in case of mutual funds also during pre and post crisis period.

Hence, this shift in investment strategy of FIIs from equity to debt and mutual funds continuous disinvestment in equity and investment in debt invoked few questions and lead to motivation of the present study. Firstly, Is there an association between flows of FIIs in equity and debt market? Secondly, is there any cause and effect relationship between FIIs flows in debt market to FIIs flows in equity market and vice-versa? Similarly, is there an association between flows of mutual funds in equity and debt market? Also, is there any cause and effect relationship between mutual funds flows in debt market to mutual funds flows in equity market and vice-versa?

Review of Literature

Several studies have been conducted in past to establish relationship between FIIs, DIIs, Mutual funds and their impact on Indian stock market.

Arora (2016) found a significant contemporaneous negative correlation (-0.48) between net investment of FIIs and DIIs. This indicates that their investment strategies totally differ from each other. DIIs sell when FIIs buy and DIIs buy when FIIs sell. The research supports the opposite investment behaviour of DIIs and FIIs as it is only 31 percent of the time during the sample period that the DIIs and FIIs have been on the same side (buy or sell) of the trade. Hence, both of them were either net buyer or net seller on the same date. This finding is in confirmation with earlier studies of Bose (2012) and Thiripalraju and Acharya (2011).

Further, a positive contemporaneous correlation was found between FII net investment and stock returns and negative correlation between DII net investment and stock returns. This evidence is in line with the hypothesis that FII behave as momentum investors and DIIs behave as contrarian investors. Also, while previous studies fail to find any strong evidence regarding the association between MF investments and future stock returns, the study finds that DII investment has a significant positive relation with future stock returns. In the case of FII, there is a weak evidence of a negative relation between FII investment and future stock returns.

Showed a moderate but significant negative correlation between net investment flows of FIIs and MF is revealed. Domestic mutual funds investment flows are found to be influenced by their own previous investment, FII investment and the market return. While, FIIs investment sometimes overweighs the impact of BSE return in determining mutual fund investment flows especially when data for five-day moving average is used in place of daily data. This means that FIIs net investment plays a crucial role in determining MF net inflows. Whereas, MF flows do not have significant role in determining FIIs net investment.

Jalota (2017) revealed that FIIs movement effects DIIs movement and due to negative correlation such effect is caused in opposite direction i.e. both of them were either net buyer or net seller on the same date. Mishra & Debasish (2017) concluded that FIIs appear to be very short-term momentum buyer in their purchase trade while DIIs showed indistinct buying pattern at the aggregate level. Murthy & Singh (2013) showed that among the three players, only FIIs were able to establish bi way causality with stock market. There is a positive and bi-way causality between buying pattern of FIIs and Nifty Turnover. Naik & Padhi (2015) concluded that net equity investment of foreign institutional investors (FIIs) and mutual funds jointly influence stock market. While FII's net equity investment has a negative impact on market volatility, the domestic mutual funds net equity investment impacts it positively. Tripathi & Maggo (2015) found a positive and significant correlation between FIIs purchases in debt and equity market. Similar results are evident for FII sales in both the market as well. Impulse response analysis revealed that FII flows to debt market are significantly responsive to a shock in FII flows to equity market and vice-versa. Venkataraman & Chandramouli (2017) found relationship among the three variables and MF and FIIs influences market the most. FII drives Indian stock market with a greater force as compared to mutual funds.

A large number of researches have been conducted in the past to analyse the relationship between the major two institutional investors of the stock market i.e. FIIs and Mutual funds. But there are very few empirical tests which study the behaviour of FIIs and MF fund flows in equity and debt market segments.

Data and Methodology

The study uses monthly data on flows of FIIs and Mutual funds in equity and debt market segments. FIIs and MF gross purchase and gross sales figures in equity and debt market are collected. The data has been taken from April 2001 to March 2017. The data has been taken from the site of SEBI and moneycontrol.com. Microsoft Excel has been used for processing the data which has been further analysed by using Eviews (Version 9.0).

Karl Pearson Correlation analysis has been performed to test the relationship between FIIs flows and mutual funds flows in equity and debt market.Following formula is used to calculate correlation,

$$r = \frac{\sum \overline{x - (x)y - (y)}}{\sqrt{\sum \overline{x - (x)^2 \sum \overline{y - (y)^2}}}}$$

To examine the direction of causation between FIIs flows and mutual funds flows in equity and debt market, Granger causality test has been applied. Application of Granger causality test causality test includes two steps: Testing of Unit Root Test and Granger causality Test.

The Unit Root presence is tested through the Augmented Dickey–Fuller (ADF).

Objectives

- To examine whether there is any relationship between FIIs flows in equity and debt market in India
- To assess whether there is any cause and effect relationship between the FIIs flows in equity and debt market in India
- To examine whether there is any relationship between mutual funds flows in equity and debt market in India.
- To assess whether there is any cause and effect relationship between the mutual funds flows in equity and debt market in India

Hypotheses

• H₁ There is no significant relationship between FIIs purchases/sales in equity market and FIIs purchases/sales in debt market

- $\rm H_{2}$ There is no causal relationship between FIIs flows in equity and debt market in India
- H₃ There is no significant relationship between mutual funds purchases/sales in equity market and mutual funds purchases/ sales in debt market.
- ${\rm H_4}\,$ There is no causal relationship between mutual funds flows in equity and debt market in India.

Analysis and Discussion

Table 1 shows a positive and significant correlation between FIIs gross purchase in equity and debt market. A similar relationship is noticed between FIIs gross sale in equity and debt market. A strong positive association between FIIs gross purchase in equity and gross sale in debt market is also observed. Lastly, FIIs gross sales in equity are highly correlated with gross purchase in debt market.

	FIIDEPUR	FIIDESALE	FIIEQPUR	FIIEQSALE
FIIDEPUR	1			
FIIDESALE	0.819*	1		
FIIEQPUR	0.714*	0.649*	1	
FIIEQSALE	0.674*	0.663*	0.966*	1

Table 1: Correlation matrix (FIIs)

* significant at 1% level of significance(two tailed)

From the above analysis, two possibilities are evident. First, FIIs are investing in both the market simultaneously and a same strategy is adopted at the time of sale/disinvestment also. Second, FIIs are investing either in debt or equity market at a time. The above two scenarios are absolutely different from each other and depend upon the state of the market. During boom period, FIIs invest in both the markets with equity forming greater part of their investment. Whereas at the time of recession, FIIs prefer debts and sell their investment in equity. But during recovery period FIIs infuse funds in both the markets with more preference to debt over equity.

Table 2: Correlation matrix (MF)

	FIIDEPUR	FIIDESALE	FIIEQPUR	FIIEQSALE
MFDEPUR	1			
MFDESALE	0.949*	1		
MFEQPUR	0.575*	0.633*	1	
MFEQSALE	0.615*	0.653*	0.933*	1

* significant at 1% level of significance

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From Table 2, it is observed that, mutual funds gross purchase in equity and debt market has a positive and significant relationship with each other. Mutual funds gross sale inequity and debt market are also moving in same direction having significant association between them. A strong and positive correlation between mutual funds gross purchase in equity and gross sale in debt market is also observed. Lastly, mutual funds gross sales in equity are highly correlated with mutual funds gross purchase in debt market.

Hence, results of mutual funds are to some extent similar to FIIs only with a lower level of significance and thus same interpretation can be drawn with respect to mutual funds investment strategy during different market conditions i.e. boom, recession and crisis. Our study covers all three phases, year 2006-08 was a boom period followed by economic crisis of 2008-09 and then recovery period started from 2009-10 onwards. Hence, the results of our research are in confirmation with the relative theory.

Results of Granger Causality Test

Table 3, depicts results of Unit Root Test. Firstly, Unit Root test is applied to check stationarity of time series data. It is observed that all the variables are non-stationary at levels and hence cannot be used for further statistical analysis. Hence, Unit Root is again tested at first level difference when all the series are found stationary and fit to apply the Causality Test.

After making the data stationary, Pairwise Granger causality test has been applied first between flows of FIIs in debt and equity market and then between flows of Mutual funds in both the market segments at lag order two.

Variables	ADF TEST (at Level)		ADF TEST (at fir	est difference)
	t-statistics	probability	t-statistics	probability
FIIDEPUR	-0.970152	0.7635	-11.238730	0.0000*
FIIDESALE	-0.529082	0.8814	-9.647415	0.0000*
FIIEQPUR	-1.516644	0.5232	-12.355570	0.0000*
FIIEQSALE	-1.167541	0.6882	-15.213930	0.0000*
MFDEPUR	0.157149	0.9691	-9.213798	0.0000*
MFDESALE	-1.070922	0.7270	-16.315170	0.0000*
MFEQPUR	-0.187110	0.9366	0.936600	0.0000*
MFEQSALE	-0.106869	0.9459	-21.461500	0.0000*

Table 3: Result of Unit root test (FIIs & MF)

* significant at 5% significance level

Table 4 contains results of Granger causality test of FIIs flows. Test results lead to following conclusion, FIIs gross purchase in equity is influenced by gross purchase in debt and not vice versa. Whereas, FIIs gross sales in debt market effects both gross sales and purchase in equity and not vice versa. Hence, only one-way cause and effect relationship is present among these flows.

Table 5 states results of Granger Causality Test of mutual funds flows. The test reveals interesting results, bi way causality exists between mutual funds gross sales in equity and gross sales in debt market. Also, mutual funds gross purchase in debt determines gross purchase in equity but not vice versa. Hence, common relationships which are revealed by the Granger causality test in case of both FIIs and MF are FIIs and MF gross purchase in debt instigates gross purchase in equity market. Same results apply to gross sales in debt and equity market by both the institutional investors also. Thus, flows of debt market determine flows of equity market to a large extent in case of both FIIs and mutual funds.

Null Hypothesis	obs	F-statistics	Prob.
FIIEQSALE does not Granger cause FIIDEPUR	189	2.10193	0.1251
FIIDEPUR does not Granger cause FIIEQSALE		1.20129	0.3032
FIIEQPUR does not Granger cause FIIDEPUR	189	1.52798	0.2197
FIIDEPUR does not Granger cause FIIEQPUR		2.86102	0.0598
FIIDESALE does not Granger cause FIIEQSALE	189	3.36102	0.0368
FIIEQSALE does not Granger cause FIIDESALE		0.01245	0.9876
FIIDESALE does not Granger cause FIIEQPUR	189	7.32281	0.0009
FIIEQPUR does not Granger cause FIIDESALE		0.34052	0.7118

Table 4: Results of Granger Causality test (FIIs)

Table 5: Results of Granger Causality Test (MF)

Null Hypothesis	obs	F-statistics	Prob.
MFEQPUR does not Granger cause MFDEPUR	189	0.23000	0.7948
MFDEPUR does not Granger cause MFEQPUR		4.93152	0.0082
MFEQSALE does not Granger cause MFDEPUR	189	1.81269	0.1661
MFDEPUR does not Granger cause MFEQSALE		2.02680	0.1347
MFEQPUR does not Granger cause MFDESALE	189	0.11406	0.8923
MFDESALE does not Granger cause MFEQPUR		2.43957	0.0900
MFEQSALE does not Granger cause MFDESALE	189	5.84551	0.0035
MFDESALE does not Granger cause MFEQSALE		3.97067	0.0205

Conclusion

FIIs and MF are the major institutional investors that play a vital role in Indian stock market. In case of FIIs, a positive and significant correlation between FIIs gross purchase in equity and debt market is found. Similar relationship is noticed between FIIs gross sale in equity and debt market. Also, FIIs gross sales in equity are highly correlated with gross purchase in debt market and a strong positive association between FIIs gross purchase in equity and gross sale in debt market is observed. In case of mutual funds, MF gross purchase in equity and debt market has a positive but less significant relationship with each other. Whereas, MF gross sale in equity and debt market are moving in same direction and a significant association is found between them. A strong positive relation between MF gross purchase in equity and gross sale in debt market is also observed. Finally, mutual funds gross sales in equityare highly correlated with gross purchase in debt market. Hence, results of mutual funds are to some extent similar to FIIs only with a lower level of significance.

Based on the results of Granger Causality test, FIIs gross purchase in equity is influenced by FIIs gross purchase in debt and not vice versa. Whereas, FIIs gross sales in debt market effects both gross sales and purchase in equity and not vice versa. Thus, only unidirectional causality is present among these flows. For mutual funds flows, the test reveals interesting results, bi- directional causality exists between mutual funds gross sales in equity and gross sales in debt market. Also, mutual funds gross purchase in debt determines gross purchase in equity but not vice versa. Hence, these two players invest in debt market according to their perception of market condition, investment objectives and information analysis skills, these flows determine fund flows in equity market to a large extent.

FIIs and mutual funds presently are investing simultaneously in both equity and debt markets of Indian stock market. Investments of both FIIs and mutual funds in equity and debt markets are increasing on yearly basis which supports the argument that FIIs and mutual fundsperceive these two markets are complementary and not a substitute to each other.

As MF combined investment in equity and debt market has surpassed FIIs investment, Mutual funds have emerged as one of the strongest pillars contributing to the long term growth of the country. Also, FIIs increased investment on yearly basis cannot be ignored for its contribution in growth of the country and helped in repealing FIIs image as hot money.

REFERENCES

- Arora, R. K. 2016. The Relation between investment of domestic and foreign institutional investors and stock returns in India. *Global Business Review*, 17(3), 654-664.
- BOSE, S. 2012. Mutual fund investments, FII investments and stock market returns in India. *Money & Finance, ICRA Bulletin.*
- Bulsara, H. P., Dhingra, V. S., & Gandhi, S. 2015. Dynamic interactions between foreign institutional investment flows and stock market returns – The case of India. *Contemporary Economics*, 9(3), 271-298. doi:10.5709/ce.1897-9254.170

- Jalota, D. S. 2017. FII and DII in Indian stock market: A behavioural study. International Journal of Research in Finance and Marketing (IJRFM), 7(5), 20-28.
- Lao, P., & Singh, H. 2011. Herding behaviour in the Chinese and Indian stock markets. *Journal of Asian Economics*, 22, 495-506.
- Mishra, S., & Debasish, D. S. 2017. An econometric study of trading behaviour of institutional investors in Indian stock market: The Vector Auto Regression Approach. *IIMS Journal of Management Science*, 8(2), 155-172.
- Murthy, K. B., & Singh, A. K. 2013. Do foreign institutional investors really drive the Indian stock market? Asia-Pacific Journal of Management Research and Innovation, 9(1), 45-53.
- Naik, P. K., & Padhi, P. 2015. Interaction of institutional investment activity and stock market volatility: Evidence from India. Asia-Pacific Journal of Management Research and Innovation, 11(3), 219-229.
- Rajaram, S. 2015. Dynamics of FII inflows in the Indian debt market. The Clearing Corporation of India Limited, Monthly Newsletter, 1-25.
- Sehgal, S., & Tripathi, N. 2009. Investment strategies of FIIs in the Indian equity market. *Vision: The Journal of Business Perspective*, *13*(1), 11-18.
- Tripathi, V., & Maggo, S. 2015. An empirical analysis of foreign institutional investments in equity & debt market in India. *Journal of International Economics*, 6(1), 107-117.
- Venkataraman, 1. R., .V.R, P. S., & Chandramouli, P. A. 2017. Institutional investments and their influence on stock returns – An empirical study. *IRA-International Journal of Management & Social Sciences*, 6(3), 332-344.

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Intention - Purchase Gap for Energy Efficient Household Appliances in India

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Abstract: This paper aims to explore determinants of the intensity of intention purchase gap for energy efficient home appliances in India and compare the role of socio-demographic and psychological factors in doing so. Moreover, the study aims to compare the relevance of the explored determinants with the recent studies in other developing nations in Asia. The results show that the psychographic variables are more relevant than socio-demographic variables in explaining intensity of intention purchase gap. Perceived behavior control was found to be the most important variable followed by perception towards the product, knowledge about the product, environment concern, perceived customer effectiveness and subjective norms respectively. Among demographic variables, only family income was found to be a significant explanatory variable.

Keywords: Eco Friendly Purchase Behavior, Theory of Planned Behavior, Socio- Demographics, Psychographics

Introduction

India is a fast developing nation with greater demand for mechanization and higher proportion of expenditures on electronic products by the household which brings ease, pleasure and comfort in their life. But all such products have an impact on environment, not only through the greenhouse gas emissions that lead to global warming but also through higher pressure on energy reservoirs in many parts of the developing country like India. There is an overall shortage of power in the northern grid from where the National Capital Region draws its power.

Thus, there is a greater need to purchase and use of electronic products cautiously for sustainable development of the country. The manufacturers are playing their role well by making available the alternatives such as star rating electronic products which ensure the power saving ability of the electronic products but the customers are often not allured much by the eco friendly and energy efficiency claims by the company and thus do not actually purchase such products in expected numbers. There is also a class of customers who may intend to purchase such products but actually do not purchase such products. The category of energy efficient products that will be discussed in this paper will relate to 4/5 energy

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stars in heavy (such as refrigerators, washing machines, water purifiers, air conditioners, microwave oven etc.) and small household appliances (such as kitchen appliances, fans, vacuum cleaners, blender, water purifiers etc.). Hence, the focus of this research study will be to measure the above phenomenon closely in National Capital Region of India and suggest pragmatic strategies to boost up the eco friendly purchase behaviour towards electronic products.

Many of the prior studies in India have focused on eco friendly purchase intention and behavior towards organic food (Chakrabarti, 2010; Paul, & Rana, 2012; Paul, Modi, & Patel, 2016). In India, there is dearth of other product specific researches in the area of green consumerism. Internationally there have been some recent studies on intention and purchase behavior towards energy efficient home appliances (Tan, Ooi, & Goh, 2017; Ishak, 2017; Nguyen, Lobo, & Greenland, 2017).

Tan, et al. (2017:461) and Joshi, & Rahman, (2015: 130) suggest the use of Theory of Planned Behaviour and its extension in assessing the consumers' eco friendly purchase intention/ behavior in general and also in assessing it towards energy efficient home appliances as it improves the explanatory power of the original theory. Intention is the cognitive representation of a person's readiness to perform a given behavior. Theory of Planned Behavior (Ajzen, & Fishbein, 1991) propagates that a person's behavior is determined by his/her intention to perform the behavior and that this intention is, in turn, a function of his/her attitude toward the behavior, his/her subjective norm and perceived behavioral control. In the present study, intention means willingness and ability to purchase an energy efficient home appliance (4/5 star rating). Whereas, purchase behavior is an exhibited form of the choice decision i.e. the actual purchase of more energy star products with higher ratings; while a variety of products are offered for sale in the market with lower prices and attractive deals. The relationship between intention and purchase may sometimes be interrupted due to certain factors. The present study is an attempt to study the relevance of the factors proposed by Theory of Planned Behaviour and other researches in understanding the intricacies of intentionpurchase gap.

In an extensive review of factors affecting eco friendly purchase intention and behavior for the time period of fourteen years: 2000 to 2014, it was revealed that environmental concern, perceived customer effectiveness, values and personal norms, knowledge and perception towards the product (trust v/s distrust) and other situational factors have been used in most of the studies to explain the eco friendly purchase intention and behavior across the globe. In the recent studies after 2014 till date, some of the above factors have been empirically tested in determining eco friendly purchase intention/ behavior (Tan, et al., 2017; Ishak, 2017; Nguyen, et al., 2017; Kumar, & Ghodeswar, 2015; Khare, 2015; Zhao, Gao, Wu, Wang, & Zhu, 2014).

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Apart from the psychographic variables discussed above, demographics play an important role in determining human behavior. Thus, the impact of these variables cannot be ignored while studying the eco friendly purchase intention and behavior. Demographic variables such as age, income, gender and education have also been considered in some recent studies to assess their impact on eco friendly purchase intention and behavior (Uddin, & Khan, 2016; Zhao, Gao, Wu, Wang, & Zhu, 2014; Akehurst Afonso & Martins Gonçalves, 2012). But, psychographic variables have been found to be better predictors of eco friendly purchase intention/behavior as compared to demographic variables (Akehurst et al., 2012:981).

There is paucity of such studies which take into perspective both socio demographic and psychographic variables to evaluate intention- purchase gap in India. The earlier researches in India also propose that more focused research with different samples need to be conducted (Kumar, & Ghodeswar, 2015: 343, Khare, 2015: 328, Uddin, & Khan, 2016: 87).

Objectives of the Study

Thus, the study focuses on the following objectives:

- To explore the socio- demographic variables affecting intensity purchase gap for household appliances among Indian customers.
- To explore the psychographic variables affecting intensity purchase gap for household appliances among Indian customers.
- To compare the role of socio-demographic and psychographic variables in explaining the intention purchase gap for household appliances among Indian customers.

Hypotheses

The hypothesized relationships on the basis of above review of literature are:

- $\rm H_{_{01}}\!\!:$ Demographic variables have a significant negative impact on intensity of intention purchase gap
- $\rm H_{_{02}}\!\!:$ Environment concern has significant negative impact on intensity of intention purchase gap
- $\rm H_{_{03}}\!\!:$ Perceived behavioral control has significant negative impact on intensity of intention purchase gap
- $\rm H_{\rm _{04}}\!\!:$ Subjective norms has significant negative impact on intensity of intention purchase gap
- $\rm H_{_{05}}\!\!\!:$ Knowledge about the eco friendly product has significant negative impact on intensity of intention purchase gap
- $\rm H_{\rm _{06}}\!\!:$ Perception towards the eco friendly product has significant negative impact on intensity of intention purchase gap
- $\rm H_{_{07}}\!\!:$ Perceived customer effectiveness has significant negative impact on intensity of intention purchase gap
- $\rm H_{_{08}}\!\!:$ Psychographic variables have no influence on intensity of intention purchase gap.

Research Methodology

Research Design: The present research study is exploratory cum descriptive where an attempt has been made to study the intensity of gap that exists between intention to purchase energy efficient household appliances and the intensity of actual purchase of such appliances.

Sample Design: The units of analysis in this research are the Indians above the age of 21 years and at least a graduate so that there is greater likelihood of getting pragmatic and mature responses. For this study, 600 self administered questionnaire were issued via personal distribution at public places, in societies and work places in National Capital Region. The sample comprised of 53.3% males and 46.7% females in proportion to the gender ratio in this region. 33.3% of the respondents held the degree of a graduate or an equivalent diploma degree and 66.7% held academic qualification of post graduation or above. The response rate was 97.16 per cent with 583 usable responses at the end of the survey. Such a high response rate was achieved due to two main reasons: firstly, the educated respondents and secondly due to personal contact with the respondents.

Survey Instrument: The relevant constructs based on review of literature were operationalized using measures from previous researches and the intellectual level of the target population (Uddin, & Khan 2016; Kumar, & Ghodeswar, 2015). A straightforward and clear layout with statements in easy language was designed by conducting pilot study on a sample of 50 respondents. The questionnaire of this study was mainly divided in two parts. First part aimed at collecting respondents' demographic information and the second part measured the below mentioned variables on a five point scale ('strongly disagree' to 'strongly agree').

Dependent Variable: Intention Purchase gap

It was measured by taking differences of the factor scores of two constructs measured separately: intention and actual purchase after checking their construct reliability and validity.

Intention: A three item measure was employed to measure the likelihood to purchase energy efficient home appliances in near future, likelihood to purchase it at higher prices and likelihood to purchase such products when alternative products have better appeal and deals.

Actual Purchase Behavior: A six item scale was designed to measure the respondent's past and present frequency of purchase with different situational factors.

Independent variables

Environment concern: Environment concern in general and in context of consumption behavior has been used as a simile of the behavioral belief (i.e. attitude toward the behavior), an important component of the Theory of Planned Behavior (Ajzen, & Fishbein, 1991). A three item scale designed to measure the level of agreement for the essentiality of framing

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environment friendly rules and regulations in India, increasing manufacture and purchase of energy efficient and eco friendly products, increasing the awareness about need for energy conservation and eco friendliness.

Perceived Behavioral Control: Another important component borrowed from the theory of planned behavior for the present study is perceived behavioral control which means the control that the customer perceives to exercise on his purchase decision. The four items such as efforts put in time and energy to buy energy efficient products, confidence and degree of independence enjoyed in taking and implementing one's own decisions were included in the construct.

Subjective Norms: Yet another component of theory of planned behavior, which refers to act according to the likes and desires of social group, was also included in the purview of the present study. The four item scale included statements related to seeking approval, recommendations, buying what others buy and importance of others' liking the product being purchased.

Knowledge about the product: It is an additional independent variable often used in the previous studies. It means not only meager awareness that the energy efficient products exist but also the ability to identify the various attributes of the product and its availability. It was measured with the help of four items related to awareness, identification of certain attributes and availability of energy efficient household appliances.

Perception towards the product: It means belief or opinion held about something. The construct consisted of six items; some of them reverse coded to check the authenticity of the responses. The statements related to opinions on attributes, cost effectiveness, prices and trustworthiness of claims made by the manufacturers.

Perceived Customer Effectiveness: This means whether the customers believe or not that their actions will have an impact on their surroundings and country as a whole. It has been found to be an important variable affecting eco friendly purchase intention in the previous studies (Joshi and Rahman, 2015:137). The construct included nine statements (with some of them reverse coded) designed to measure attributes such as sense and degree of responsibility one is ready to assume in environment conservation, whether one believes that one's efforts can have an impact on others and bring about changes in large country like India etc.

Results

Construct validity

Construct validity dictates the confidence level of how effectively the item measurements taken from a sample represent the actual score in the population or the degree of appropriateness of measures in representing the concept of study (Hair Jr, Black, Babin, Anderson, 2013:92). It is often assessed by the factor loadings, which denote the correlation between the original variable and its factor. A factor loading of 0.50 and above is

significant and the particular item is retained (Hair et. al., 2013: 115). In Table 1 all the factor loadings are above 0.50. In a sample size above 350 respondents, Hair et. al. (2013: 115) suggests that even the factor loading of 0.30 is good enough as a measure for construct validity. Hence, all the measurement items have significant construct validity.

Convergent Validity

It is the degree of agreement among the multiple items measuring the same construct. Composite Reliability (C.R.) and Average Variance Extracted (A. V. E.) are used by researchers often to assess convergent validity (Hair et. al., 2013). Also, due to several limitations inherent in Cronbach's alpha as a measurement of internal reliability, composite reliability is often a preferred method of measurement.

The results in Table 1 shows that as a measure of internal consistency, C.R. values range from 0.896 to 0.983 (calculated as C.R. $=\Sigma\lambda^2/(\Sigma\lambda^2 +\Sigma\epsilon)$). Thus, all the values are more than the recommended measure of 0.70 (Hair et. al., 2013). The A.V.E. ranges from 0.690 to 0.951 (calculated as A.V.E. $=\lambda^2/k$), which is also greater than recommended measure of 0.50 (Hair et. al., 2013). This indicates that the construct explains more than half of the variance of its indicators. Thus, the measure of the degree to which a latent construct explains the variance of its indicators to justify using a construct is significant in the study.

Hence, adequate convergent validity is demonstrated by the results Table 1.

Construct	Variables	Factor Loading (λ)	A. V. E (λ^2/k)	C.R [Σλ^2/ (Σλ^2+ε[]	Reliability (Cronbach's alpha)
Environment Concern	EC1 EC2 EC3 EC4	.925 .929 .934 .444	0.697	0.896	0.736
Perceived Behavioral Control	PBC1 PBC2 PBC3 PBC4	.979 .977 .977 .963	0.948	0.986	0.982
Subjective Norms	SN1 SN2 SN3 SN4	.806 .896 .926 .922	0.790	0.938	0.910
Knowledge Aboutthe Product	KAP1 KAP2 KAP3 KAP4	.923 .930 .915 .923	0.851	0.958	0.942

Table 1: Validity and Reliability of the constructs used in the study

Contd...

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Perception towards the product	P1 P2 P3 P4 P5 P6	.844 .865 .881 .763 .837 .792	0.690	0.931	0.908
Perceived Customer Effectiveness	PCE1 PCE2 PCE3 PCE4 PCE5 PCE6 PCE7 PCE8 PCE9	.886 .884 .905 .891 .893 .843 .819 .723 .735	0.713	0.957	0.946
Intention topurchase	I1 I2 I3	.977 .970 .979	0.951	0.983	0.974
Actual Purchase Behavior	PB1 PB2 PB3 PB4 PB5 PB6	.943 .934 .950 .944 .958 .938	0.892	0.980	0.976

Reliability test

As an additional measure to C.R. (which measures internal consistency), the Cronbach's á has been calculated. As depicted in Table 1, all the values of Cronbach's á are greater than 0.6 which is the cut off value recommended by Nunnally, & Berstein, (1994). Thus, there is adequate reliability in measures being used for the present study.

Regression Model

Once the basic assumptions of validity and reliability were found to be satisfied, the regression model was run in two phases. The first regression model depicts the role of socio- demographic variables in explaining the intention behavior gap. The second regression model takes into consideration the role of psychographic variables in explaining the intention behavior gap. This has been done to understand the relative importance of socio-demographic and psychographic variables in explaining the intention behavior gap.

In order to test H_{01} , a stepwise multiple linear regression was used with intention- purchase gap as the dependent variable and socio-demographic variables (gender, age, family income and education level) as predictors. The proposed model is:

	istics Durbin-	df2 Sig. F Watson	Change	581 .011 2.053	
ary ^b	ge Stat	IJþ		1	se gap
Table 2: Socio demographic model summa	Chan	ч	Change	6.432	ntion purcha
		R	Square Change	.011	variable: inte
	Std. Error	of the	Estimate	.55760408	te b. Dependent
	Adjusted	R Square	I	600.	t), Family incom
	R			.011	Constant
	lodel R	Square	I	.105 ^a	Predictors: (C

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Intention – Purchase gap= $\beta_0 + \beta_1$ Gender + β_2 Age + β_3 Family Income+ β_4 Education+ u_i

The assumptions of the multiple linear regression were analyzed and confirmed. The Model explains 1.1 per cent (R^2) of the total variance and is significant at 1 percent level of significance; F (1,581) =6.432, p value=0.011 (Table 2 and 3).

	Model	Sum of Squares	df	Mean Square	F	Sig.	
1	Regression	2.000	1	2.000	6.432	.011	
	Residual	180.646	581	.311			
	Total	182.646	582				

Table 3: Socio- demographic ANOVA

The results of the analysis depict that in explaining the intention purchase gap; none of the socio demographic variable is significant other than family income at 5 per cent level of significance. The negative â coefficient (-9.649) signifies that with an increase in family income (i.e. the purchasing power) there will be decrease in the intensity of intention purchase gap.

The second stepwise multiple linear regression model was used in order to test hypotheses: H_{02} to H_{07} . The proposed model is:

Intention – Purchase gap =	$\beta_0 + \beta_1$ Environment Concern + β_2 Perceived
	Behavioral Control + β_3 Subjective Norms+
	β_{A} Knowledge about the product+ β_{5}
	Perception towards the product + β_6 Perceived
	Customer Effectiveness+ u

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin- Watson
1	$.219^{a}$.048	.046	.54705433	
2	.301 ^b	.090	.087	.53520552	
3	$.325^{\circ}$.106	.101	.53116357	
4	$.353^{d}$.125	.119	.52584288	
5	$.368^{e}$.135	.128	.52323211	
6	.377 ^f	.142	.133	.52149108	1.999

Table 4: Psychographic model summary^g

a) Predictors: (Constant), Perceived behaviour control

b) Predictors: (Constant), Perceived behaviour control, Environment concern

c) Predictors: (Constant), Perceived behaviour control, Environment concern, knowledge about product

d) Predictors: (Constant), Perceived behaviour control, Environment concern, knowledge about product, Perception about the product

e) Predictors: (Constant), Perceived behaviour control, Environment concern, Knowledge about product, Perception about the product, Perceived customer effectiveness

- Predictors: (Constant), Perceived behaviour control, Environment concern, Knowledge about product, Perception about the product, Perceived customer effectiveness, Subjective norm
- g) Dependent Variable: Intention purchase gap

The results depict that psychographic variables have a significant impact on intention-purchase gap; F (6,582) = 15.935, p value=0.000 (Tables 4 and 5). The R² = 14.2% which is higher than the earlier model. H_{08} is rejected.

	Model	Sum of Squares	df	Mean Square	F	Sig.
2	Regression	26.001	6	4.333	15.935	.000*
	Residual	156.645	576	.272		
	Total	182.646	582			

Table 5: Psychographic model ANOVA

*Significant at 1 per cent level of significance

All the psychographic variables entered in the model are significant at either 1 per cent or 5 per cent level of significance (Table 6). Perceived behavior control is the most important variable in explaining the intensity of intention-purchase gap. Thus, the intention-purchase model that emerged is illustrated in the following equation:

Intention–Purchase gap=-1 -.088 Environment concern -.224 Perceived behavioral control -.048 Subjective norms -.092 Knowledge about the product-.114 Perception towards the product -.067 Perceived customer effectiveness

Discussions and Conclusions

Power supply is a major challenge impending NCR, India. Therefore, the present study posits the relevance of *the extended theory of planned behavior* in narrowing the intention purchase gap that exists for energy efficient home appliances in India.

Since, the Indian researchers in the area of eco friendly consumerism have strongly recommended the need for product specific studies to be taken up in India (Khare, 2015:329; Paul et. al., 2016, 130; Kumar, & Ghodeswar, 2015: 343); the current research work attempts to serve this purpose in the product category: energy efficient household appliances. The study contributes to the extant theoretical knowledge and also compares the results of present study with some of the recent research work in three developing countries of Asia: China, Malaysia and Vietnam (Tan, et. al., 2017; Ishak, 2017; Nguyen, et. al., 2017; Zhao, et al., 2014).

The purpose of this research work was to provide an insight of the factors which affect the intensity of intention purchase gap for household appliances in India. Perceived behavioral control (PBC) was found to be the most important variable (\hat{a} = -.224) that significantly and negatively affects the intention purchase gap. There has been limited research using this variable, which warranted further empirical investigation (Joshi &

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Model	Unstandar	dized.	Standardized				
	Coeffic	ients	Coefficients	t	Sig.	Collinearity	Statistics
	В	Std. Error	Beta			Tolerance	VIF
(Constant)	-1.000E-013	.022		000.	1.000		
Perceived behaviour control	224	.029	400	-7.836	.000	.572	1.747
Environment concern	088	.028	157	-3.179	$.002^{*}$.614	1.628
Knowledge about product	092	.028	165	-3.253	.001*	.579	1.727
Perception about the product	114	.029	203	-3.973	.000	.570	1.755
Perceived customer effectiveness	067	.028	119	-2.349	.019"	.581	1.722
Subjective norm	048	.022	086	-2.204	.028**	.969	1.032
* Significant at 1 per cent level of	of significance	** Significa	nt at 5 per cen	t level of signi	ficance		

Table 6: Psychographic coefficients

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Rahman, 2015: 133). Few studies reported a significant and positive impact of PBC on intention to buy eco friendly products whilst another found no impact on such intention (Tan et. al., 2017:468; Paul et. al., 2016: 129; Joshi & Rahman, 2015: 135). Thus, the results of the present study suggest that more the control exercised by an individual in making and executing the purchase decision, lesser will be the intensity of intention purchase gap and they will be able to translate their purchase intentions into actual purchases (Grimmer, & Miles, 2017:13).

Perception about the product ($\hat{a} = -.114$) also affects intention purchase gap significantly and negatively which means, positive perception towards the product will reduce the intensity of this gap. The trust, perceived positive attributes and good quality have a positive influence on eco friendly purchase behavior (Joshi & Rahman, 2015:133,134). Thus, the present study supports the earlier positive relationship with eco friendly purchase intention/behavior and further extends this positive relationship to narrowing down of intention purchase gap.

The third important variable in explaining the intention purchase gap is knowledge about the product (\hat{a} = -.092). Looking at the above discussion it is revealed that it is more important to have a positive perception about the product than a mere knowledge about the product. Knowledge about the energy efficient household appliances positively affects the attitude towards the product and hence leads to positive eco friendly purchase behavior among Vietnamese customers (Nguyen, T. N. et. al., 2017: 6). In the present study, it was found to have a significant negative impact on intention purchase gap, which means, higher the knowledge about the product, lesser will be the intention purchase gap.

Environment concern was found to be the next important variable in explaining the intention purchase gap. The study validates the earlier results which reveal that it has a significant positive impact on eco friendly purchase intention/behavior (Uddin, & Khan, 2016:97, Joshi & Rahman, 2015:132, Zhao, et al., 2014:149) whereas, it is contrary to the results of the study done on Malaysian customers (Tan et. al., 2017: 466). It affects intention purchase gap inversely (\hat{a} =-0.088).

Perceived customer effectiveness was also found to have a significant negative impact on intention purchase gap (\hat{a} =-0.067). In earlier studies, it has been found to have direct or indirect significant impact on eco friendly purchase intention/ behavior (Joshi & Rahman, 2015: 133). In a study by Uddin, & Khan, (2016: 97) on Indian customers, it was found to be an insignificant factor in explaining eco friendly purchase behavior. The results contradict the earlier results of a very small sample (161) of young Indian customers. But, it was suggested in the study that more India centric studies should be taken up to find the cultural differences. Thus, the differences in the results are attributable to comparatively larger sample size and respondents of different age group. In some of the other India centric studies, this variable was not taken up in the studies (Paul et. al., 2016; Kumar, & Ghodeswar, 2015). This increases the importance of the results of the present study on this variable.

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Subjective norm is the next and last explanatory variable in a model which has significant yet meager impact on the intention-purchase gap (\hat{a} = -0.048). The previous reviews were summarized by Joshi & Rahman (2015: 134) which disclose that majority of studies found a significant direct and indirect positive impact of subjective norm/ reference group/ social norm on eco friendly purchase behavior. The study supports the earlier findings in India (Khare, 2015: 324; Kumar, & Ghodeswar, 2015: 341) that social appeal has a significant positive impact on eco friendly purchase decisions of customers whereas contradict another study which was not product specific (Paul et. al., 2016). But the earlier researches suggested the need for product category specific research for further validation (Paul et. al., 2016: 130).

The results of the present study further reveal that the psychographic variables are more relevant than socio- demographic variables. Earlier studies focused on eco friendly purchase intention and behavior abroad, Similar results have been reported (Akehurst et al., 2012: 981, Zhao, et al., 2014: 148). Khare, (2015: 325) found no moderating influence of demographic variables on eco friendly purchase behavior in India. Although, Uddin, & Khan, (2016: 96) found significant differences in eco friendly purchase behavior of males and females in India but no other demographic variable was considered in the study other than gender and the results pertained to a small geographical sample of 161 young customers only. Thus, it was suggested that the interplay of demographics on a larger sample should be studied. In the present study on a larger sample with four demographic variables, it was found that only income had a significant negative impact on intention purchase gap (\hat{a} = -9.649). Since, energy efficient products are generally priced higher than conventional products the affordability may affect the intention purchase gap negatively.

The respondents in the sample were at least a graduate or a diploma holder, therefore, no significant differences were found among those with higher level of education. Gender and age were also found to be insignificant in the present study,

Implications and Scope for Future Research

As the results suggest, the marketers looking forward to boost the market for the energy efficient home appliances and the similar products must design their advertisement campaigns focused on the psychographic variables. The attempt should be to boost the confidence in the decision choices one makes which can bring about differences in the environment and society. This can be achieved by highlighting the idea of how each one can contribute to combat the energy crisis being faced presently in the country with rapidly increasing demand for technological products. Secondly, the knowledge and perception about the product play a very important role in covering the intention purchase gap, therefore, providing ample and true information to the potential customers is essential so that they understand the utility of the energy efficient appliances in the long run and can trust the claims of the company. This will make it easier to implement their intentions into a judicious purchase decision. Thirdly, the results give a message for the marketers who have been using social appeal as one of the prominent promotion strategy since long back. Indian customers tend to exhibit greater inclination to the logical appeals rather than social appeal in purchasing the home appliance product category, as per the results of the present study. Lastly, insignificance of demographic variables other than income suggests the intention purchase gap may also reduce if the energy efficient home appliances come at more affordable prices and the customers are logically convinced that these products will be more cost effective in long run i.e. pay today and save for tomorrow.

The future researches in other product categories can provide comparative relevance of the influential factors explored in the above study. Also, similar studies may be taken up in other parts of the country to explore for cultural differences in how customers behave and take their purchase decision. Further, this paper focuses only on the behavior of the customers prior to purchase and at the time of purchase, future studies may focus on the usage of such products to get a comparative and extensive insight of desirable energy conservative behavior during the life cycle of the product. Since, the purchase behavior has been assessed on the basis of responses only; future research may deploy observations to assess the same. Adding situational factors to the independent variables may be tested in future studies.

REFERENCES

- Ajzen, I., & Fishbein, M. 1991. The theory of planned behaviour. Organisation Behaviour and Human Decision Processes. 30.179-204.
- Akehurst, G., Afonso, C., & Martins Gonçalves, H. 2012. Re-examining green purchase behaviour and the green consumer profile: new evidences. *Management Decision*, 50(5), 972-988.
- Chakrabarti, S. 2010. Factors influencing organic food purchase in India–expert survey insights. *British Food Journal*, *112*(8), 902-915.
- Grimmer, M., & Miles, M. P. 2017. With the best of intentions: a large sample test of the intention behaviour gap in pro environmental consumer behaviour. *International Journal of Consumer Studies*, *41*(1), 2-10.
- Hair Jr, J. F., Black, W. C., Babin, B. J., Anderson, R. E. 2013. *Multivariate Data Analysis: Pearson Education Limited.*
- Ishak, M. H. 2017. Modelling energy consumption behaviour using' energy culture' concept for student accommodations in Malaysian Public Universities. *Facilities*, (just-accepted).
- Joshi, Y., & Rahman, Z. 2015. Factors affecting green purchase behaviour and future research directions. *International Strategic Management Review*, *3*(1), 128-143.

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- Khare, A. 2015. Antecedents to green buying behaviour: a study on consumers in an emerging economy. *Marketing Intelligence & Planning*, *33*(3), 309-329.
- Kumar, P., & Ghodeswar, B. M. 2015. Factors affecting consumers' green product purchase decisions. *Marketing Intelligence & Planning*, 33(3), 330-347.
- Nguyen, T. N., Lobo, A., & Greenland, S. 2017. Energy efficient household appliances in emerging markets: The influence of consumers' values and knowledge on their attitudes and purchase behaviour. *International Journal of Consumer Studies*.
- Nunnally, J.C., Berstein, I.H. 1994. Psychometric Theory. Mc- Graw-Hill, New York.
- Paul, J., & Rana, J. 2012. Consumer behavior and purchase intention for organic food. *Journal of Consumer Marketing*, 29(6), 412-422.
- Paul, J., Modi, A., & Patel, J. 2016. Predicting green product consumption using theory of planned behavior and reasoned action. *Journal of Retailing and Consumer Services*, 29, 123-134.
- Power Sector in the National Capital Region. (n.d.). Retrieved from http:// ncrpb.nic.in/power.php. on 2017, April, 12
- Tan, C. S., Ooi, H. Y., & Goh, Y. N. 2017. A moral extension of the theory of planned behavior to predict consumers' purchase intention for energy-efficient household appliances in Malaysia. *Energy Policy*, 107, 459-471.
- Uddin, S. F., & Khan, M. N. 2016. Exploring green purchasing behavior of young urban consumers: empirical evidences from India. *South Asian Journal of Global Business Research*, *5*(1), 85-103.
- Zhao, H. H., Gao, Q., Wu, Y. P., Wang, Y., & Zhu, X. D. 2014. What affects green consumer behavior in China? A case study from Qingdao. *Journal of Cleaner Production*, 63, 143-151.

Attitude towards Luxury Apparel and Accessories A Study of Young and Middle aged Consumers in Delhi/ NCR

SHUBHRA BAHAL AND KARTIK DAVE

Abstract: The purpose of this paper is to understand the attitude of young and middle aged consumers towards luxury apparel and accessories in Delhi- NCR. The attitude scale of luxury products is identified through extensive review of the literature. This study was undertaken in the high end luxury malls in the Delhi, NCR. Data reduction method (Factor Analysis) was applied to extract different factors of the attitude in context of luxury apparel and accessories. The study gives an insight about the attitude of the consumers towards luxury apparel in the context of Indian market in general and Delhi/NCR in particular.

Introduction

The varied forms of the luxury have marked its presence since the early ages. Early centuries witnessed a well-defined social status classification, leading to the luxury consumption only by the elite and the affluent class. Thus, luxury was far beyond the reach of the common man which made luxury exclusive for the consumption of the elite class.

India is not new to the concept of luxury consumption either. It dates back to the early 1900s when the Maharajas of India were the great consumers of luxury products including handcrafted products. The limited products including diamonds, jewelleries, automobiles and properties only constituted luxury (Okonkwo, 2007). There has been a radical change since then. Consumption patterns and lifestyle have changed drastically with the advancement of time and globalization (Cristache, 2009). Today, the wide array of products and services like automobiles, private jet, yachts and luxury cruises, beauty, fine wine and spirits, apparel, shoes, jewellery, cosmetics and perfumes, spas and hospitality constitute the Luxury industry. Luxury goods are categorized as fashion/apparel, perfumes and cosmetics, wines and spirits, watches and jewellery (Jackson, 2004). Luxury hotels, tourism, home furnishing and airlines were included later in the luxury goods category (Chevalier and Mazzalovo, 2008). Apparel,

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accessories, shoes, watches, handbags and perfumes constitute the luxury fashion segment. These are related with the self-esteem of the consumers apart from offering the functional utility to the consumers (Vignernon and Johnson, 2004). Armani, Laura Ashley, Bang & Cartier, Pierre Card in, Chanel, Regal, Christian Dior, Gucci, Lacoste, Estee Lauder, Ralph Lauren, Montbtanc, Omega, Revlon, Rolex, Louis Vuitton are few examples of luxury brands.

There is no single consolidated definition of luxury despite the considerable research undertaken in this field. The concept of luxury has different connotations for different researchers. It differs according to the context and situation.

The attitude towards luxury brands is a vast topic of research. The review of literature indicates the growing interest in this area. It was well evident through the past researches that attitude towards luxury are formed based on consumers demographics, society and psychological factors. According to (Pietrzak 2014), the consumers following the same culture or religion may have different attitude towards the same luxury product because of the very nature of the luxury products. Despite the extensive research on luxury in the past, the study on the consumer attitude towards luxury are still limited.

Attitude towards Luxury Brands

Attitude is both a positive and negative feeling a person develops towards stimuli (Crites, Fabrigar and Petty, 1994). Attitude is rigid in nature thus; it is quite difficult to change one's attitude. The deeply rooted attitudes are very difficult to change. In the study of Consumer Behavior, attitude plays a vital role in consumer decision making process. There is a profound ABC model (Affective, Behavioral and Cognitive) to define attitude in the consumer behavior studies. The affective component means the emotional instinct related with the attitude formation. The behavioral part describes the way the consumers tend to behave towards the stimuli or a situation, based on one's belief and knowledge. The cognitive attribute relates to the knowledge possessed by the consumer. Attitude is a persistent assessment and evaluation of stimuli, the emotional instincts towards the object which results in the actions, either favorable or unfavorable (Kotler, 2000). Demographic, cultural, social, psychographic and geographic factors help to develop the consumer attitude.

Attitude has been defined by (Louden and Bitta, 2003), as consumer feeling, both positive and negative towards a particular offering or an idea, as behavior and set of belief by (Schiffman and Kanuk, 2004) and as combination of factors like motivation, emotional connects or feeling, preconceived notion and knowledge which leads to certain favorable or unfavorable behavior towards the environment or an object (Secord, et.al, 1994).

Consumer attitude formation and the change in attitude are extremely important issues. Many factors viz; a personal experience, individual's traits and personality, learning's, interactions with friends and family and exposure to the mass media leads to attitude formation and may also lead to attitude change. Various models like the tri-component model, the multi-attribute model, the trying- to-consume model gives a better understanding about the different components of attitude which leads to consumer's attitude formation.

The combination of cognitive and affective factors to evaluate stimuli develops attitude (Crano and Prislin, 2006). Many theories make it evident that attitude leads to the way a consumer behaves, thus it influences the consumer decision making to a great extent (Bandura, 1997; Bagozzi et al., 1989). The third factor of attitude is the consumer's intention to purchase (Assael, 1998).

The attitude towards the Luxury Brands is mainly shaped through the consumer's perception about that particular brand. There are other factors also which influence consumer attitude and thus, it is vital to understand how the consumer's attitudes are formed for the luxury goods item. The brand attributes, features and utility offered determines the attitude of consumers towards the particular luxury brand. Thus, it is the relevance and importance which leads to the formation of luxury brand attribute in the theory of consumer behavior (Keller, 1993). Materialistic approach leads to the development of positive attitude towards luxury brands, according to the study undertaken by (Gil et al. 2012).

Dubois and Laurent 1994 developed the initial attitude scale in French language, taking a sample size of 440 consumers. Later, Dubois et.al 2005 extended the original model and developed a scale consisting of 34 items, which were classified under the cognitive, affective and behavior categories. The five point Likert scale ranging from strongly agree to strongly disagree were used to measure these 34 scale items.

Brand Attitude is the analysis and evaluation of a brand in order to make a purchase decision (Mitchell and Olson 1981). According to (Shimp, 2010), consumer perception leads to the formation of consumer attitude, which is considered to be one of the consistent factors in understanding and interpreting consumer behavior towards the brand. There has been an evident shift in the Indian buying behavior patterns in recent times. The Indian consumers are looking for best product and services, and are open to try new improved products, which have paved the way for the luxury marketers to offer their brands to this emerging set of consumers.

The favorable consumer attitudes towards the luxury apparel are formed because of its quality, superior raw-materials used, its design and fitting and its uniqueness. The three well identified reasons for consumers to buy luxury apparel are: physical characteristics- superior quality, design and fitting and exclusive workmanship; intellectual attributes like grace and style; and the superior experience while purchasing the luxury apparel brand (Amatulli and Guido, 2011). Some other study on luxury apparel concluded that the quality, prestige and keeping oneself abreast with the latest fashion trends are the key drivers and motivators for the purchase of luxury apparels (Kamenidou et al., 2007).

Review of Literature

The history of luxury goods industry dates back to nineteenth century in Europe. During the Industrial Revolution, few designers and business enterprises ventured into the luxury segment and manufactured products for the rich and affluent class. Before the Industrial Revolution, luxury products were not made with machinery, there was a lot of hand crafted precision which went into the detailing and making of such exclusive products (Antoni et al., 2004).

There are different dimensions of luxury which are covered in various definitions of luxury given by authors over a period of time. In the view of (Silverstein and Fiske, 2003), luxury is about high end experience resulting from the consumption of aesthetically superior products. Various studies in the area of luxury have been done, wherein different context of luxury has been elaborated. (Dubois and Czellar, 2002) study on the luxury signifies the concept of luxury to the consumers. (Vigneron and Johnson, 1999) has defined luxury from the marketers end, meaning the perspective it lays on the marketers and the manufacturers of these high end products. (Antoni et al. 2004) has discussed various factors of great significance in the luxury markets. In their research the key findings related to the luxury brands were focused on their superiority and the distinctiveness. The luxury consumers expected high quality of the luxury products in turn of the high price and premium they paid to buy such products. Additionally, the research concluded that the luxury products should be able to maintain its appeal; this is possible through aesthetics, its product features, style, uniqueness, precision, and exclusivity.

Luxury is the consumption of things which are wanted and desired for, but not fall in the category of necessities or essentials (Goody, 2006). Luxury is used and consumed since ages and it symbolizes allure and uniqueness (Thomas, 2007). The luxury products are not mass produced, they are characterized as non- essentials but are highly priced. Luxury items were made in craftsmanship and were essentially consumed by the rich. According to (Berthon et al., 2009), luxury is a wide term and goes beyond the materialistic approach. Luxury is exclusive taste and the luxury consumers usually differentiate themselves from others.

The luxury apparel and accessories segment is very lucrative and is emerging at an increasing pace, yet there are limited extensive research in this particular area. Luxury apparel is termed to be classy and beautiful. The attributes classified as sophisticated, delicate, tender and feminine. These products are characterized by its exceptional quality of the materials being used and the designing, leading to superb fit increasing the status and esteem of the luxury apparel consumer (Kamenidou et al., 2007). The consumers attach the emotional instinct with the luxury apparel consumption and their perception and attitude leads to their purchase intentions (Lee et al., 2008). According to the Kamendou et al., 2007, factors like social status and prestige, high quality of the product and being contemporary are the undermining reasons for the Greece consumers to buy high end luxury apparels.

Luxury is defined as the aspirations or wants of the individual which are far beyond the basic necessities (Finn, 2011). The luxury goods can be classified as apparels, accessories (jewelleries and watches), scents and beauty products, spirits and wines (Jackson, 2004). Other research indicates that luxury products are considered to be high priced and best quality and consumers perceive that highly priced and good quality products are ought to be luxury products (Teimourpour and Hanzaee, 2011). Consumers are driven by both external and internal motives to buy luxury products (Amatulli and Guido, 2011). The internal factors comprises of the emotional content, happiness, memorable purchase experiences and the external factors include the attributes, features, quality, price, esteem, power and social acceptability (Daswani and Jain, 2011). The motives behind purchasing the luxury products may range from imitating the rich (Vigneron and Johnson, 2014) to buy luxury for self-satisfaction without an attempt to impress others (Silverstein and Fiske, 2005).

Consumers are prompted to buy luxury products as they depict the social status of the person in the society. The luxury products are expanding fast in the developing nations like India. In their book 'The Cult of Luxury Brand', the authors (Chadha and Husband 2007), has developed a five stage model on Luxury. The Asia- Pacific consumers are emerging as the potential consumers of the luxury products because of their high disposable income, sustainable growth of the economy and the countries open policy on foreign direct investments. Indian consumers are stuck at the showing off phase according to the model of Chadha and Husband. Buying luxury products indicates the symbol of wealth for the Indian consumers and is the parameter to showcase their wealth (Eng and Julie, 2010).

Consumers buy luxury Apparels because of the superior quality, amazing fit and exclusiveness. The precision and craftsmanship makes the luxury apparels extremely elegant and sophisticated and the consumers feel elated to buy such high end products (Amatulli and Guido, 2011). Various researches on the luxury apparels have concluded that the consumer behaviour towards the luxury brands are not consistent and vary tremendously. The study by (Keegan et al. 1992), suggested a consumer purchase behavior model known as Black Box. The model explained the influence of external factors and processing of the available knowledge in order to make a purchase decision. The knowledge gained by the consumer due to the marketing tactics of the marketers stimulates the consumer to buy certain products (Monga and Chaudhary, 2011).

According to (Dryl and etal.2016), attitude of consumers towards luxury brands are governed by religion. Other significant contributors are culture, the country of origin and the progress of the country. According to the study conducted by (Isaac Cheah and et al. 2015), the consumers of luxury brands are more influenced by the brand eminence. It has also been concluded that social pressure also stimulates the purchase of luxury brands. This notion is backed by yet another study by (Meng- Shan and et al. 2015), stating that exclusive apparels and accessories purchases configures an affluent status in the society. The aspiring group indulgence into lavish spending is countered by the fact that luxury products are superior in quality and are durable.

According to the various research carried out in the field of attitude towards luxury brands, it is presumed that attitude of consumers differ amongst different cultures. Also, various studies on luxury attitude by different researchers like (Hofstede and Hofstede 2004); Hult and et al. 2000); (Tynan and et al. 2010) conclude that country of origin is significant in developing the attitude of the consumers. Consumers from different countries display different attitude towards luxury brands. Studies also conclude that consumer attitude towards luxury also based on religion (Dubois and et al.2001, Hennings and et al.2012). Therefore, there exists a gap in the literature on the attitude of consumers towards luxury brands in the Indian context.

Methodology

Sample Design and Data Collection

The present study is an exploratory followed by descriptive in nature. Data were collected from selected destinations using mall-intercept method. Mall -intercept method is one of the best data collection method in short span and also approaching the right set of prospective respondents based on the nature of study (O'Cass and Grace, 2008). This method is highly approved and commendable when the time and funds are scares (Prasad and Aryasri, 2011). Prominent destinations for luxury brands like DLF Emporia, The Kila, DLF Promenade, Ambience Mall, Select City Walk, DLF Mall of India, The Great India Place in Delhi and NCR were visited and responses were obtained. Awell -structured questionnaire was developed and given to 550 prospective respondents. These respondents were selected based on judgment and observed shopping behavior (like checking out from any luxury outlet) in the respective luxury destinations. A total of 504 were collected out of which 488 responses were found useful for the study in terms of completeness and relevance to the study. All respondents were briefed about the survey instrument and a screening question was included at the beginning of the survey to ensure that sample only consists of the luxury brand consumers.

Survey Instrument

The questionnaire has two parts, Part A and B.The first part of the questionnaire comprised of the attitude scale items and the second part focused on the socio-economic profile (viz; age, gender, income, education, occupation, experience, etc.) of the respondents. In Part A, Consumer Attitude towards luxury brand was based on fivepoint scale. One item in the attitude scale is reverse coded. The questionnaire was developed on Likert scale where the respondents were asked to rate the items/variables on the scale on 1 to 5, where 1 meant Strongly Disagree and 5 meant Strongly Agree. The questionnaire was pilot tested on the sample of 50 respondents before administering it on the larger sample. Based on the pilot study, the statements (items) were reworded and rephrased as per the need of the study and to ensure correct interpretations from the respondent's point of view.

Table 1 above represents the socio-economic profile of the respondents in the present study. There were 44 percent males and 56 percent females in the age bracket of 20 to 50 years, where majority of the respondents were reported either between the age group of 30 to 40 years (35%) or 40 to 50 years (34%).

Respondent's demographics	No. of respondents	%
Gender		
Male	217	44.5
Female	271	55.5
Age (in years)		
Up to 20	5	1.0
20-30	149	30.5
30-40	170	34.8
40-50	164	33.6
Education		
Up to higher education	5	1.0
Graduation	107	21.9
Post-Graduation	218	44.7
Professional	147	30.1
Others	11	2.3
Working		
Yes	448	91.8
No	40	8.2
	_	Contd

Table 1: Socio-economic profile of the respondents in Delhi/NCR

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Experience (in years)		
0-5	111	22.7
5-10	104	21.3
10 and above	273	55.9
Annual Household Income		
5 to 10 lakhs	98	20.1
10-15 lakhs	111	22.7
15 lakhs and above	279	57.2
Frequency of purchase (in a quarter))	
1-2 times	333	68.2
3-4 times	113	23.2
5 and more than five times	42	8.6
When to buy luxury		
On specific occasion	201	41.2
Festivals	32	6.6
Anytime	255	52.3
Annual spending on luxury		
Less than 20 $\%$	257	52.7
20-40%	195	40.0
40-50%	31	6.4
More than 50%	5	1.0

Analysis

The Exploratory Factor Analysis was applied on the 18 items. In the Principal Component Analysis the Varimax rotation method was used. After multiple iterations and refinements the 14 items persisted which were grouped under three factors. The three factors were Luxury fun, fantasy and feelings; Luxury Conative and Luxury Discernment (Cognition). The items having a communality score of 0.50 were only retained. For the factor loading the minimum score of 0.5 was applied for the retention of the scale item (Hair Jr. et al., 2006). Therefore, both these criterions were used to retain the scale items. The final results reported the total variance explained as 60 percent and the Kaiser-Meyer-Olkin (KMO) measure of sampling adequacy as 0.885, which were greater than the prescribed standard values stated by (Hair Jr. et al., 2006). In order to check the reliability of the scale items, the Cronbach alpha value was used and it came out to be 0.785 which was more than the stated value of 0.6, thus it was acceptable (Hair Jr. et al., 2006).

Scale Items	Factor Loading	Factors
Luxury is delight	.901	Luxury fun, fantasy and feelings
Luxury is exciting	.898	
Luxury is thrilling	.855	
Luxury is enjoyable	.810	
Luxury is fun	.778	
Luxury makes me dream	.728	
Luxury is happiness	.682	
When I wear a luxury item, I feel a bit like I'm disguising myself	.802	Luxury Conative
One needs to be bit of a snob to buy luxury products	.752	
I would not feel at ease in a luxury shop	.678	
People who buy luxury seek to imitate the rich	.641	
Some education is needed for appreciating luxury products	.750	Luxury Discernment (Cognition)
In my opinion, luxury is good taste	.650	
A real luxury brand does not advertise its products	.597	

Table 3: Rotated component matrix with reliability scores

The EFA identified the constructs which were further validated through the Confirmatory Factor Analysis. The Confirmatory Model is shown below in Figure 2. The prelim requirement for the construct validity is to find how precisely and exactly does the individual scale item explains the construct. For this to happen, it is very important to find the uni-dimensionality of the model. A (Comparative Fit Index) CFI value of more than 0.90 is adequate to signify the uni-dimensionality (Byrne, 2010). A value of 0.96 indicated a fairly good fit. The other goodness of fit included ($\div 2 = 191.071$, df = 74, p<.001, $\div 2/df = 2.582$). In addition, the RMSEA was 0.057 and GFI was 0.946. A value less than 0.08 for RMSEA is considered adequate for model fit (Hu and Bentler, 1999). In addition, all factor loadings were significant at p<0.001 and the standardized regression weights were greater than 0.5 with all factor loadings in EFA greater than 0.5. According to Ford et al. (1986), these values should be above 0.4 for a good fit.



Figure 2: Confirmatory model of attitude towards luxury apparel and accessories in Delhi and NCR region

The essentials for the convergent validity are; all factor loading should be above 0.5, variance explained should be above 50 % and the reliability test should have a score of 0.70 or more (Hair Jr. et al., 2006). The proposed model has convergent validity as per the EFA. All the factor loadings are above 0.5, total variance explained is 60% and the reliability test has the score more than 0.7.

Discussions and Managerial Implications

Luxury fun, fantasy and feelings

Most of the respondents were of the opinion that consuming luxury is a delight; they were found excited to buy luxury products. Young female consumers were found quite thrilled to buy designer wear for the occasions such as weddings. The middle aged females loved buying the solitaires, high- end purses and footwear. Males enjoyed buying apparels and watches and footwear most. For many mid aged consumers, buying luxury gave them happiness. Few female consumers were of the opinion that buying luxury gives only temporary satisfaction and is related with power or class, internal peace and happiness are the most important things for the eternal satisfaction. Many luxury consumers agreed with the statement that luxury makes them dream. They aspire for better luxury products to make their life better.

Luxury Conative

The respondents felt that they do not disguise themselves when they wear a luxury brand rather they prefer to wear those brands which relates to their self-image. Many of them were against the notion that they need to be snob to buy luxury products. They believed that buying luxury brand is all about their taste and preferences. It cannot be comparative or relative. It is an individual choice to consumer particular apparel or accessory brand. Mostly all the respondents who prefer buying luxury products were confortable buying in the luxury shop. Few respondents who aspire buying those high end luxury apparels or accessories were not at ease in the environment there. According to these set of aspiring respondents, they felt that they can not bargain there as they have to match up the social status and it is a pretentious buying behaviour always seen in the high end stores. The middle aged luxury consumers were of the view that they do not buy luxury to imitate the rich because according to them they themselves are the affluent class so the question to imitate does not arise for them. For the young respondents it was a showy business, most of them bought luxury products, just to be a part of the rich socio-class, might be they do not have the need of such products but because of the social pressure they indulge in buying high end products like phones and apparels. But to note, they are not the long term consumers of luxury. Youngsters are more ravaged by the brands. It has been found that young buyers both males and females are buying apparels and accessories out of their conspicuous consumption behaviour.

Luxury Discernment (Cognitive)

Many of the luxury consumers agreed that some education is needed to appreciate luxury. The feature, aesthetics and exclusivity could only be understood if the consumer is educated enough to value this. For few of the luxury consumers, education is not at all significant to appreciate and enjoy luxury. For them, if a person can afford luxury he can enjoy it as well. It is more to show off their status in the social group, they do not get into the details of luxury to appreciate it. The respondents had a consensus about luxury is good taste. They pay a premium for the better quality product. They are made in craftsmanship and thus are exclusive in nature. Most mid- aged females felt that luxury brands do not advertise their products, its primarily through word of mouth, exhibitions, or sponsored events the luxury brands are publicized. According to them, the communication method also has to be exclusive to get along the luxury brand image. They associated advertisements with the mass products or the daily consumption products.

Conclusion

Luxury Market in India has been undergoing unprecedented changes. Young consumers in India have shown their different attitude and belief while comparing with relatively old consumers who are highly influenced by the tradition. Today, the young consumer segment does not hesitate to express their desire to become rich, successful and knowledgeable. This is a notable deviation from the traditional doctrine of hiding wealth with pretends to be socialist. With the rise of social media and other platforms where one can easily display his/her conspicuous consumption, there is a greater opportunity for the luxury fashion, apparels and accessories marketer to influence the buying behavior.

The marketers need to shape the attitude of consumers towards their respective luxury apparel and accessories brands by informing, educating, inspiring and enticing through various means and tools. These steps will help the marketers to approach systematically by influencing beliefs related to knowledge, perception, emotional and willingness to purchase.

Limitation and Future Scope

There are few limitations in the present study which could be improved in the future research. The present study is conducted in Delhi/NCR, which could refrain the future researchers to use the scale nationally. So, there is a probability of difference in the results in smaller towns and cities. Further studies could also incorporate the socioeconomic variables to better understand the consumer attitude towards luxury brands.

REFERENCES

- Ali, M., Amir, M., Akram, M.W. 2016. The factors affecting attitudes and purchase intent in luxury fashion goods: An empirical study of Pakistani Market, Arabian Journal of Business and Management Review, 5:6, 1-20.
- Bagozzi, R.P. 1992. The self-regulations of attitudes, intentions and behavior. Social Psychology Quarterly, 55:2, 178-204.
- Bain and Company 2016 Report Luxury 2020: New Market Dynamics
- Belleau, B.D., and et.al, 2001. Fashion leaders' and followers' attitudes towards exotic leather apparel product. *Journal of Fashion Marketing and Management, An International Journal*, 5:2, 133-144.
- Brown, G.H. 2014. Measuring consumers attitude towards products. *Journal of Marketing*, 14:5, 691-698.
- Brun, A., Castelli, C. 2013. The nature of luxury: a consumer perspective. International Journal of Retail and Distribution Management, 41:11, 823-847.
- Canadean 2013. Clothing, footwear, accessories and luxury goods specialists in India: Market Snapshot to 2017
- Crowley, A.E., Spangenberg, E.R., Hughes, K.R. 1992. Measuring the hedonic and utilitarian dimensions of attitudes towards product categories. *Marketing Letters*, 3:3, 239-249.
- Das, G. 2014. Factors affecting Indian shoppers' attitude and purchase intention: An empirical check. *Journal of Retailing and Consumer Services*, 21, 561-569.
- Deloitte Global Powers of Luxury Goods 2017 Report: The new luxury consumer
- Dryl, W., Koztowski, A. 2016. The attitude to luxury amongst young Polish and Portuguese consumers. *Economies and Business Review*, 2:16, 94-112.
- Dubois, B., Czellar, S., Laurent, G. 2005. Consumer segments based on attitude towards luxury: empirical evidence from twenty countries. *Marketing Letters*, 16:2, 115-128.
- Euromonitor International Report: Luxury Goods 2017, New insights and system refresher, December, 2016
- Fionda, A.M., Moore, C.M. 2009. The anatomy of the luxury fashion brand. *Brand Management*, 16:5, 347-363.
- Gil, L.A., and et.al, 2012. Impact of self on attitude towards luxury brands through nurturing consumer attitude. *Journal of Business Research*,65, 1425-1433.
- Gupta, K.D. 2009. Changing paradigms of luxury consumption in India: A conceptual model. *South Asian Journal of Management*, 16:4, 29-43.
- Jain, V., Pingle, S., Daswani, A. 2012. Understanding Indians purchase behaviour process: Luxury Apparel Sector.*Metamorphosis*, 11:1, 82-94.
- Keller, K. L. 2009. Managing the growth trade off: challenges and opportunities in luxury branding. *Brand Management*, 16:5, 290-301.
- Kim, K.H., and et.al, 2012. Increasing customer equity of luxury fashion brands through nurturing consumer attitude. *Journal of Business Research*, 65, 1495-1499.
- Ko, E., Megehee, C.M. 2012. Fashion marketing of luxury brands: recent research issues and contributions. *Journal of Business Research*. 65, 1395-1398.

- Kwong, K. K., and et.al, 2003. The effects of attitudinal and demographic factors on intention to buy pirated CDs: The case of Chinese consumers. *Journal of Business Ethics*, 47:3, 223-235.
- Liu, F., and et.al, 2012. Self-congruity, brand attitude and brand loyalty: A study on luxury brands. *European Journal of Marketing*, 7:8, 922-937.
- Miceli, G.N., Raimondo, M.A., Farace, S. 2013. Customer attitude and dispositions towards customized products: The interaction between customization model and brand. *Journal of Interactive Marketing*, 27, 209-225.
- Miller, K.W., Mills, M.K. 2012. Contributing clarity by examining brand luxury in the fashion market. *Journal of Business Research*, 65, 1471-1479.
- Phau, I., Leng, Y.S. 2008. Attitude towards domestic and foreign luxury brand apparel: A comparison between status and non-status seeking teenagers. *Journal of Fashion Marketing and Management: An International Journal*. 12:1, 68-89.
- Phau, I., Teah, M. 2009. Devil wears (counterfeit) prada: A study of antecedents and outcomes of attitudes towards counterfeits of luxury brands. *Journal of Consumer Research*, 26:1, 15-27.
- Phau, I., Teah, M., Chuah, J. 2015. Consumer attitudes towards luxury fashion apparel made in sweatshops. *Journal of Fashion Marketing and Management*, 19:2, 169-187
- Sorinel, C. 2012. A historical perspective on luxury. *Economic Science Series*, 12:2, 382-386
- Thakur, A., Kaur, R. 2016. An empirical examination of relationship between emotional attachment and attitudinal brand loyalty towards luxury fashion brands. *DLSU Business and Economic Review*, 26:1, 70-80.
- The National Council of Applied Economic Research, 2017. The NCAER State Investment Potential Index: Second Edition
- Voss, K.E., Spangenberg, E.R., Grohmann, B., 2003. Measuring the hedonic and utilitarian dimensions of consumer attitude. *Journal of Marketing Research*, 40:3, 310-320.
- Wang, Y., Sun, S., Song, Y., 2011. Chinese luxury consumers: motivation, attitude and behaviour. *Journal of Promotion Management*, 17, 345-359.
- Zang, B., Kim, J.H. 2013. Luxury fashion consumption in China: factors affecting attitude and purchase intent. *Journal of Retailing and Consumer Services*, 20, 68-79.

Conceptual Framework of GST

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Abstract : An attempt has been made to compare the Indian GST with that of some other selected countries. Various aspects like different names given for GST in different countries, standard rates, threshold exemption limit, various liabilities, returns and payments, reverse charge mechanism along with the exempt services have been evaluated. This paper found that the implementation of GST need to be improved and reengineered in order to create 'win-win situation' to all parties.

Keywords: IGST, CGST, SGST, Threshold Exemption Limit, Reverse Charge Mechanism

Introduction

GST/National VAT has been introduced in more than 150 countries. It has been a part of the tax system in Europe as far back as 50 years and is the favored form of the indirect tax in the Asia-Pacific region. There are diverse models of GST currently in force, each with its own peculiarities. While country such as Singapore essentially taxes everything at a single rate, some countries have more than one rate (a zero rate, certain exemptions and higher and lower rates). In some countries, it is recoverable only on goods used in the production process and specified services. The standard GST rates in most of the countries ranges between 15-20 per cent.

GST is an indirect tax, which will subsume almost all the indirect taxes of central government and states governments into a unified tax. As the name suggests, it will be levied on both goods and services at all the stages of value addition. It has dual model including central goods and service tax (CGST) and states goods and service tax (SGST). CGST will subsume central indirect taxes like central excise duty, central sales tax, service tax, special additional duty on customs, counter veiling duties whereas indirect taxes of state governments like state vat, purchase tax, luxury tax, octroi, tax on lottery and gambling will be replaced by SGST. Integrated goods and service tax (IGST) also called interstate goods and service tax is also a component of GST. It is not an additional tax but it is a system to examine the interstate transactions of goods and services and to further assure that the tax should be received by the importer state as GST is a destination based tax. Goods and services tax has been divided in 3 parts.

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- **I-GST:** Integrated GST is levied on interstate supplies or services. In such cases, collection of taxes will be done by central government but the money will be distributed between Central government and state government.
- **C-GST:** Central GST is levied on intra state supplies or services in which collection and retention of such taxes is done by central government.
- **S-GST:** State GST is levied on intra state supplies or services in which collection and state government does retention of such taxes.

India has opted for dual model of GST. State GST is to be collected by the State Government; Central GST is to be collected by the Central government and integrated GST is to be collected by the Central government on inter-State transactions.

Review of Literature

Hamilton and Whalley (1989) found that replacing federal tax by broadly based sales tax provided more gain than replacing provincial sales taxes although this gain is very small. Distributional impact was so small that this can be offset by direct taxes. Lledo (2001) analyzed Brazilian indirect tax system with the two objectives; the reason of not approving a comprehensive reform of the tax system and to know redistributive effect of tax system. He found that younger generation would be beneficial from this proposal and this gave politicians ground for their vote in its favour. Wittwer & Kym (2002) quantified impact of GST on Australia's wine industry with the help of CGE model. Meagher and Parmenter (1993) analyzed short-term implications of Australia's tax reform. They reached on the conclusion that GST made smaller impact on cost-sensitive industries facing international competition in comparison to former taxes. Sajadifar et al. (2012) quantified impact of tax reform of Iranian economy. They found that government revenue was increased and household welfare was declined. GDP declined due to implemention of VAT. They made suggestion that Iranian government should increase VAT rate to increase its revenue. Agogo (2014) made an appraisal of GST and found that GST is not good for low-income countries and does not provide broad based growth to poor. Kumar (2014) studied different aspect of GST and concluded that implementation of GST in India help in removing economic distortion by current indirect tax system and expected to encourage unbiased tax structure which is indifferent to geographical locations. Pinki, Kamma and Verma (2014) studied GST for indirect tax system in India and concluded that the new NDA government in India is positive towards implementation of GST and it is beneficial for Central government, State government and as well as for consumers in the long run if its implementation is backed by strong IT infrastructure. Devi (2016) performed swot analysis on GST in India and concluded that GST will present India in a top class taxation system that will appeal the international eyes for investment. It encourages international market competition and promotes the export. However, this depends upon coherent design and timely implementation.

Objectives of the Study

The study has the following objectives:

- To study the history of unified tax model
- To evaluate the salient features of GST Act and its implementation by the States
- To compare the Indian GST with that of some other selected countries

GST Act

The salient features of GST Act as adopted are given below:

- GST would be applicable on supply of goods or services as against the present concept of tax on the manufacture of goods or on sale of goods or on provision of services.
- GST would be based on the principle of destination based consumption taxation as against the present principle of origin based taxation.
- It would be a dual GST with the Centre and the States simultaneously levying it on a common base. The GST to be levied by the Centre would be called Central GST (CGST) and that to be levied by the States [including Union territories with legislature] would be called State GST (SGST). Union territories without legislature would levy Union territory GST (UTGST).
- An Integrated GST (IGST) would be levied on inter-State supply (including stock transfers) of goods or services. This would be collected by the Centre so that the credit chain is not disrupted.
- Import of goods would be treated as inter-State supplies and would be subject to IGST in addition to the applicable customs duties.
- CGST, SGST / UTGST & IGST would be levied at rates to be mutually agreed upon by the Centre and the States under the aegis of the GSTC.
- GST would replace the currently levied and collected by the Centre, i.e. Central Excise duty; Duties of Excise (Medicinal and Toilet Preparations); Additional Duties of Excise (Goods of Special Importance); Additional Duties of Excise (Textiles and Textile Products); Additional Duties of Customs (commonly known as CVD); Special Additional Duty of Customs (SAD); Service Tax; Cesses and surcharges in so far as they relate to supply of goods or services.
- State taxes that would be subsumed within the GST are: State VAT; Central Sales Tax; Purchase Tax; Luxury Tax; Entry Tax (All forms); Entertainment Tax (except those levied by the local bodies); Taxes on advertisements; Taxes on lotteries, betting and gambling; State cesses and surcharges in so far as they relate to supply of goods or services.
- GST would apply to all goods and services except Alcohol for human consumption.

- GST on five specified petroleum products (crude, petrol, diesel, ATF & natural gas) would be applicable from a date to be recommended by the GSTC.
- Tobacco and tobacco products would be subject to GST. In addition, the Centre would continue to levy Central Excise duty.
- A common threshold exemption would apply to both CGST and SGST. Taxpayers with an annual turnover of Rs. 20 lac (Rs. 10 lac for special category States as specified in article 279A of the Constitution) would be exempt from GST. A compounding option (i.e. to pay tax at a flat rate without credits) would be available to small taxpayers (including to specified category of manufacturers and service providers) having an annual turnover of upto Rs. 50 lac. The threshold exemption and compounding scheme would be optional.
- The list of exempted goods and services would be kept to a minimum and it would be harmonized for the Centre and the States as well as across States as far as possible.
- Exports would be zero-rated.
- Accounts would be settled periodically between the Centre and the State to ensure that the credit of SGST used for payment of IGST is transferred by the originating State to the Centre. Similarly the IGST used for payment of SGST would be transferred by Centre to the destination State. Further the SGST portion of IGST collected on B2C supplies would also be transferred by Centre to the destination State. The transfer of funds would be carried out on the basis of information contained in the returns filed by the taxpayers.
- Electronic filing of returns by different class of persons at different cutoff dates.
- Obligation on certain persons including government departments, local authorities and government agencies, who are recipients of supply, to deduct tax at the rate of 1% from the payment made or credited to the supplier where total value of supply, under a contract, exceeds two lakhs and fifty thousand rupees (Rs. 2.5 lac).
- Refund of tax to be sought by taxpayer or by any other person who has Page 11 of 16 borne the incidence of tax within two years from the relevant date.
- System of self-assessment of the taxes payable by the registered person.
- Audit of registered persons to be conducted in order to verify compliance with the provisions of Act.
- Limitation period for raising demand is three years from the due date of filing of annual return or from the date of erroneous refund for raising demand for short-payment or non-payment of tax or erroneous refund and its adjudication in normal cases and five years in case of fraud, suppression or willful misstatement.

- Arrears of tax to be recovered using various modes including detaining and sale of goods, movable and immovable property of defaulting taxable person.
- Goods and Services Tax Appellate Tribunal would be constituted by the Central Government for hearing appeals against the orders passed by the Appellate Authority or the Revisional Authority. States would adopt the provisions relating to Tribunal in respective SGST Act.
- An anti-profiteering clause has been provided in order to ensure that business passes on the benefit of reduced tax incidence on goods or services or both to the consumers.
- This Act is to be implemented from July. 01, 2017 and it is expected to boost competitiveness and performance in India's manufacturing sector. Declining exports and high infrastructure spending are just some of the concerns of this sector.
- All the states have approved and adopted by passing GST Act in their respective assemblies on the dates mentioned below;

Comparative Analysis

Comparison of India's indicators of effective tax rates and tax revenue productivity with other countries shows that the Indian tax system is characterized by: (1) a high dependence on indirect taxes, (2) low average effective tax rates and tax productivity, and (3) high marginal effective tax rates and large tax-induced distortions on investment and financing decisions. The most recently proposed package of reforms would improve tax productivity and lower the marginal tax burden and tax-induced distortions. But firms that rely on internal sources of funds or face problems borrowing would continue to face high marginal tax rates.

Advantages and Challenges of GST

The Goods and Services Tax (GST) will unify the nation into a common economic market, obviating the need for goods to be taxed each time they cross a state border. Much of the current discussion about GST has focused on the tax structure and the complexities surrounding the implementation of the new system. In the following points, some advantages are discussed:

- GST will subsume a number of existing indirect taxes being levied by the Centre and State Governments, including Central Excise duty, Service Tax, VAT, Purchase Tax, Central Sales Tax, Entry Tax, Local Body Taxes, Octroi, Luxury Tax, etc. It brings benefits to all the stakeholders viz. industry, government and the citizens.
- It is expected to lower the cost of goods and services, boost the economy and make our products and services globally competitive.
- GST will help to make India a common national market with uniform tax rates and procedures and remove the economic barriers, thereby paving the way for an integrated economy at the national level.

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- GST is a destination based consumption tax. It has been designed in a manner so that the tax is collected at every stage and the credit of tax paid at the previous stage is available to set off the tax to be paid at the next stage of transaction, thereby eliminating cascading of taxes. This eradicates "tax on tax" and allows cross utilization of input tax credits, which benefit the industry by making the entire supply chain tax neutral.
- GST would mitigate the ill effects of cascading and thereby improve our competitiveness by subsuming most of the Central and State indirect taxes into a single tax.
- It will give a major boost to the 'Make in India' initiative of the Government by making goods or services produced or provided in India and make competitive in the national and international markets.
- It will bring parity in taxation on local and imported products as all imported goods will be charged with integrated tax (IGST), which will be more or less equivalent to Central GST + State GST. Under the GST regime, exports will be zero rated in entirety unlike the present system where refund of some taxes is not allowed due to fragmented nature of indirect taxes between the Centre and the States. All taxes paid on the goods or services exported or on the inputs or input services used in the supply of such export goods or services shall be refunded. The principle of exporting only the cost of goods or services and not taxes would be followed. This may boost Indian exports.
- It is expected to bring buoyancy to the Government Revenue by widening the tax base and improving the taxpayer compliance.
- It is likely to improve India's ranking in the Ease of Doing Business Index and is estimated to increase the GDP by 1.5% to 2%.
- It will provide a comprehensive input tax credit mechanism across the entire supply chain. The seamless availability of Input Tax Credit across goods or services at every stage of supply will enable streamlining of business operations.
- Backed with a robust end-to-end IT system, GST would be simpler and easier to administer.
- It will result in better tax compliance due to a robust IT infrastructure.
- Harmonization of laws, procedures and rates of tax will make compliance easier and simple. There would be common definitions, common forms/formats, common interface through GST portal, resulting in efficiencies and synergies across the board.
- Common procedures for registration of taxpayers, refund of taxes, uniform formats of tax return, common tax base, common system of classification of goods or services along with timelines for every activity will lend greater certainty to taxation system.

		Comparative Status o	of GST in different cour	ntries	
Particulars	India	Canada	UK	Singapore	Malaysia
Name of GST in the country	Goods and Service tax	Federal Goods and Service tax & Harmonized Sales Tax	Value Added Tax	Goods and Service tax	Goods and Service tax
Standard Rate	0%, 5%, 12%,18% and 28% (+cess for luxury items)	GST 5% and HST varies from 0% to 15%	20% Reduced Rates-5% and exempt and zero rated	7% Reduced Rates- zero rated and exempt	6%
Threshold Exemption Limit	INR 20 Lakhs (10 Lakhs for NE states)	Canadian \$ 30,000 (Appox. 15.6 Lakhs in INR)•	UK £ 73,000 (Appox 61.32 Lakhs in INR	Singapore \$ 1 Million (Appox. 4.8 Crores in INR)	MYR 5,00,000 (Appox. Rs. 75 Lakhs in INR
Liability arises on	Accrual basis: Issue of invoice or Receipt of payment earlier	Accrual basis: Issue of invoice or Receipt of payment earlier	Accrual basis: Issue of invoice or payment or supply- earliest. Cash basis (Turnover below & 1.35 mn): Payment received	Accrual basis: Issue of invoice or Receipt of payment or supply-earliest. Cash basis (Turnover below SGD \$ 1 million): receipt of Payment	Accrual basis: Delivery of goods or Issue of invoice or Receipt of payment
Returns and Payments	Monthly and 1 Annual Return	Depending on the turnover, tax needs to be deposited either monthly, quarterly or annually	Usually quarterly return. However, small business can opt for annual returns filing	Usually quarterly return. However, business can opt for monthly returns	Monthly for large organizations
Reverse Charge Mechanism	Apply on goods (new) as well as services currently applicable under Service Tax)	Reverse Charge applies to import of services and intangible properties	Applicable	Reverse Charge applies to supply of services	Reverse Charge applies to import of services
Exempt Services	Manufacture of exempted goods or provision of exempted services	Real Estate, Financial Services, Rent (Residence). Charities. Health, Education	Medical, education, Finance, Insurance, Postal Services	Real Estate, Financial Services, Residential rental	Basic foodstuff, essential services such as health transportation, residential property and agricultural land

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Conceptual Framework of GST and...

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- GST is largely technology driven. The interface of the taxpayer with the tax authorities will be through the common portal (GSTN). There will be simplified and automated procedures for various processes such as registration, returns, refunds, tax payments, etc. This will encourage a culture of compliance.
- Average tax burden on trade and industry is likely to come down, which is expected to reduce prices, resulting in more consumption, which in turn means more production and thereby boosting the growth of the industries.

Although so much hype is created by the GST, it has to face many challenges to effectively implement the same. Some of the challenges are:

- Besides Constitutional amendments, GST implementation would also involve installation of requisite IT infrastructure both at the Central and State level. The country needs a strong IT networking.
- India has adopted dual GST instead of national GST. It has made the entire structure of GST fairly complicated in India. The Centre will have to coordinate with 29 states and 7 union territories to implement such tax regime.
- The proposed regime seems to discount emerging sector of ecommerce. E-commerce does not leave sign of transaction outside the Internet and has anonymity associated with it.
- High implementation cost for Administration and Compliance of GST. The compliance costs of implementing the GST refer to the resources contributed by the economy in its preparation to comply with the GST.
- The knowledge and expertise for GST implementation need to be communicated from the top management to all staffs in each department.
- Future finance and accounting graduates need to be prepared with updated with latest knowledge base in order to ensure company readiness in implementing GST
- Both companies and tax authority need to employ supplementary human resource for communication and adoption of smooth implementation. Shamsuddin, Ruslan, & Halim (2014) advised government to aggressively promote GST in order to increase the awareness, perception and acceptance of the citizens towards GST.

Further Research on GST

GST has been implemented in India from July 01, 2017 and most important objective is to ensure uniformity, bring transparency and objectivity in the tax regime system. There are initial hiccups but major research is required to know the impact of GST in pan India across geographical region and boundaries, impact on import and export, revenue sharing arrangements by the states, revenue collection industry-wise are some of the issue on which future research could be conducted.

Conclusion

Today, GST is the most contemporary, controversial and significant issue in India and it is believed that it will boost tax consumption revenue. Banerjee (2017) promoted one unified indirect tax regime, as it will encourage foreign investors to invest in India due to simplicity and enhanced transparency throughout the process. This will lead to generation of FDIs or foreign direct investments in India. It is expected that GST would empower Indians, strengthen Indian economy, and enhance the public quality of life.

REFERENCES

- Banerjee, A. 2017. Impact of the Goods and Services Tax (GST) Bill on the Indian Economy, International Journal of New Technology and Research (IJNTR), Vol. 3, No.6, 59-61.
- Devi, S. 2016. Goods and Service Tax in India: A Swot Analysis. International Journal of Research Granthaalayah, Vol. 4, No. 12, 188-195.
- Garg, G. 2014. Basic concepts and features of good and service tax In India. International Journal of Scientific Research and Management (IJSRM), Vol. 2, No. 2, 542-549.
- Kotnal, J. R. 2016. GST In India: An enrichment of indirect taxation system . International Journal of Applied Research, Vol. 2, No. 4, 735-738.
- Mansor, N. H., & Ilias, A. 2013. Goods and services tax (GST): A new tax reform in Malaysia. International Journal of Economics Business and Management Studies - IJEBMS, Vol. 2, No.1, 12-19.
- Monika Sehrawat, U. D. 2015. GST in India: A key tax reform. *International Journal of Research Granthaalayah*, Vol. 3, No. 12, 133-141.
- Priya, B. 2017. GST A game changer . International Journal of Management Research and Social Science (IJMRSS) ISSN 2394-6407(Print) Vol 4, No. 1 , 10-12.
- Raj, R. 2017. Goods and Services Tax in India . Imperial Journal of Interdisciplinary Research (IJIR) Vol. 3, No. 4, 1225-1228.
- Shamsuddin, A., Ruslan, M. I., & Halim, A. A. 2014. Educators' awareness and acceptance towards goods and services tax (Gst) implementation in Malaysia: A study in Bandar Muadzam Shah, Pahang . International Journal of Business, Economics and Law, Vol. 4, Issue 1, 1-10.
- Swarupa, P. U. 2016. One Nation One Tax (GST) The gainers and losers in INDIA . International Journal of Innovative Research in Management Studies (IJIRMS), Vol. 1, No. 11, 35-41.
- Tran-Nam, B. 2000. The Implementation costs of the GST in Australia: concepts, preliminary estimates and implications. *Journal Of Australian Taxation*, 331-342.
- Vasanthagopal, R. 2011. GST in India: A big leap in the indirect taxation system. International Journal of Trade, Economics and Finance, Vol. 2, No. 2, 144-146.

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Awareness, Concerns and Compliance of GST

AKASH AGARWAL AND SV PATHAK

Abstract: The main objective of the study is to investigate and explore effect of GST to consumer as well as retailers' level. The result shows that consumers, by and large acquainted with GST structure and there is no significant correlation GST tax structure and spending behaviour of respondent. The results also indicate that majority of the retailers are GST registrants and complying GST legislation. Apart from perceived burden of compliance cost, retailer by and large, still not sure about the overall effect of GST on their business.

Keywords: GST, spending behaviour, perceived concerns

Introduction

GST is the biggest and substantial indirect tax reform which has taken place in India since Independence. It is termed as reform as it not only abolished the cascading effect of multiple taxes but also marked as a masterstroke to align the unorganized sector of the economy with the organized sector. On one hand, it increases the revenue collection of both State and Central Government, on the other, the consumer as the end user, anticipating the reduction in overall prices due to abolition of multiple taxes in the economic system and manipulating role of middle man. As 122nd amendment in constitutional bill, GST replaced the Value Added Tax system (introduced in 2005). GST aims to simplify the entire indirect tax system and intended to make it as identical tax system for everyone. The GST tagline 'one nation, one market, one tax' is self-explanatory. In the process of making it a hot selling cake, Government had made all the efforts to make GST launch a successful show and to create a favorable environment for its implementation and acceptance among public at large. GST as an unified tax mechanism aimed to streamline India's US \$ 2 trillion market economy and estimated to spawn an incremental growth of about 2% in GDP.

GST is a consumption tax which had replaced the Value Added Tax System. It has been enforced with an aim to align Indian market under a single tax

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system as one marketplace. As a domestic trade tax, serves as an efficient and economic system to implement a comprehensive indirect tax mechanism. It mitigates the cascading and ill effects of large number of Central and State taxes. India have adopted the *Dual GST System*, where tax is imposed by central and state both named as CGST (Central Goods & Service Tax) and SGST (State Goods and Service Tax).



Figure 1: GST Process

Journey of GST in India

In 2000 Shri Atal Bihari Vajpayee former Prime Minister of India, started discussions on the GST. In 2004 a task force chaired by Dr. Vijay L. Kelkar, then advisor to the Finance Ministry, said the existing tax system suffers from many problems and suggested a comprehensive GST. In his budget speech for financial year 2005-06, Mr. P Chidambaram announced introduction of GST with effect from 01-04-2010. In March 2011 the Congress party-led government introduced a constitution amendment bill in the Lok Sabha to implement GST. NDA Govt. implemented constitutional amendment Act and GST effectively implemented in India from 01-07-2017.

Research Problem

The issue of implementation of GST has been hotly debated on various forum and experts had influenced the public at large with their own opinion regarding its pros and cons. It caught a massive attention from various stakeholder in market including academicians, businessman and consumer at large. Each one of them have their own stake. Among all these personal viewpoints and opinion, there is an absolute dearth of empirical investigation of GST and its effect on Indian consumer. The researcher attempted to explore the level of understanding about GST among the Indian consumers and to investigate the impact of GST on spending behavior of consumer at large.

Objectives

The present research work make an attempt:

- To examine the level of understanding regarding GST in India.
- To explore the level of awareness and acceptance regarding GST structure in India.
- To investigate the effect of GST on spending behavior and its relationship with awareness of GST Structure.
- To explore and address the concerns of Indian retailer regarding the implementation and compliance of GST.

Review of Literature

There is considerable sparseness regarding the empirical evidence on GST implication, 2017. However, the research work available on VAT and similar tax regime structure available in other nearby countries of Asian and South Asian region. Most of the articles available on GST in India merely focusing on challenges before the government and traders to adopt and implement the GST tax regime. Furthermore, some articles merely providing the insight about the perceived pros and cons of GST for Indian marketplace. Muthupandi & Xavier (2017) in their research article highlighted the importance of imparting awareness and knowledge base regarding GST implementation and its benefit through organization of workshop, training sessions, short term courses etc. Saravanan (2017) in their research paper made a comparison of GST with earlier existing Indirect tax regime. The paper evaluated and revealed that GST will cause a negative impact on service sector and manufacturing sector business transaction and positive impact on intermediary investors and final consumers. Prabreja (2017) analyzed the reaction on GST among public at large in India through 5000 twitter data through sentiment analysis. The study revealed people's acceptance for GST with too much of anticipation feeling.

Research Methodology

The study is primarily based on Primary data collected from different parts of the country. In this process we have prepared two different questionnaires. The first questionnaire consists of 25 questions addressing the understanding, awareness, acceptability of consumers at large, regarding GST. The questionnaire further explores the effect of GST on spending behaviour of Consumer. Another Questionnaire consists of 12 questionnaire to understand and explore the issues and concerns of business operator (especially retailer by and large) in post GST regime. The first two questions deal with the gross annual turnover of business and GST registration. While other 10 questions specifically deal with issues and concerns from the last point of contact in the supply chain. The retailer in this regard is playing a key role as it has direct contact and dealing with both the wholesaler or distributors as well as with consumer at large.

The Pilot study was conducted to check the reliability, validity and consistency of the questionnaire in addressing the objective. Fifty consumers and ten academicians were respondents by personal approach in Delhi NCR, for this purpose.

The results of the data is used to determine inclination of consumers at large towards the indentified key variables in this study. The study is based on descriptive and correlation analysis and were used to analyze the data collected from the consumers in different parts of the country mostly from cities i.e. Lucknow, Gorakhpur, Delhi NCR, Hyderabad, Kanpur, Bangalore, Chandigarh and Ahmadabad etc. Out of 312 questionnaire received only 200 found correctly filled and fit for the study

purpose. So, the response rate is around 64% in this study. The descriptive statistics used to elucidate the basic feature regarding the study. It also provided an idea of inclination of consumers and changes in their spending behavior due to GST. Furthermore, the correlation analysis used to examine the relationship between awareness and acceptance to GST with spending behavior of consumer.

Reliability

Table 1 shows the reliability test statistics for each of the identified variable in the research work. The result shows that for each of the identified variable the Cronbach's Alpha value is greater than 0.7. The result further indicates that there is a fairly good internal consistency and reliability in the structure and can be used for further analysis.

Data Analysis

Understanding of GST

Table 1 shows the general understanding regarding GST among the respondents. Total eight different set of questions were framed to address these six dimensions of understanding of GST. Based on 5 point Likert scale denoted as "Not understand at all", "Not understand clearly", "Moderately understanding", "Understanding fairly", "Clearly Understanding at all". In this highest mean reported by Structure and Mechanism of GST with aggregate mean value of 3.86 which is more than 3.75 and termed high, and lowest mean value with Popularity of GST with aggregate 2.80 as mean value which indicated as medium level of understanding among the population.

Components of level of understanding	Mean	Level
Purpose and objective of GST	3.24	Medium
Structure and mechanism of GST	3.81	High
Rationale for implementation of GST	3.21	Medium
GST implication for economy	3.28	Medium
Applicability of GST	2.80	Medium
Popularity of GST	2.68	Medium

Table 1: General understanding of GST

Awareness and Acceptance of GST

Table 3 depicts the frequency and percentage of specific understanding as awareness and acceptance of GST with further eight questions. It is clearly understood with the responses that most of the respondents have answered correctly related to questions standard rated items, exempted supply and types of GST. As much as 72% to 80% respondents reported with correct answers. Meanwhile, nearly 28% respondents are not having clear understanding regarding zero rated items.

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		Table	2: Reliat	oility			
	Items	Ν	Ν	α^{1}	Internal consistenc y ¹	α^2	Internal consistenc y ²
	Understanding of GST	8	200	0.689	Good	0.729	Fairly good
consu mers'	Awareness and acceptance of GST structure	x	200	0.714	Good	0.825	Excellent
Perspe	Spending Behavior	6	200	0.726	Good	0.864	Excellent
lssues & Pr (Business C	oblems for Retailers Derators)	10	371	0.902	Very Good	0.881	Excellent
	α = Cronbach's Alpha, N = Nui	mber of qu	estions, n =	= Number of	respondents, ¹ Pilot, ²	Actual	

Choices	Star Rated	ndard Items	Exe Su	mpted ipply	Тур G	es of ST
Correct Answer	161	80.5%	149	74.5%	158	79%
Wrong Answer	39	19.5%	51	25.5%	42	21%
Total	200	100%	200	100%	200	100%

Table 3: Awareness and acceptance of GST structure

Spending Behavior

Table 4 represents the nine identified dimensions related to spending behaviors of individuals. The response have been recorded on standardized five point Likert scale ranging from Strongly Disagree to Strongly Agree. Here the 1 point awarded to Strongly Disagree and 5 point awarded to Strongly Agree response related to specified questions in the questionnaire. The highest mean reported to more purchases in specified/ inspecified items as 3.82 labeled as 'high' and lowest mean reported to increased in Price as 2.75 labeled as medium. Furthermore, it has been interesting to witness that respondents report that applicability of GST adversely affecting their mood for eating outsides in some specified restaurants and they used to avoid to pay taxes as the mean value reported as 3.75 which labeled as 'high'.

Table 4 : Effect on spending behavior of respondents'

Components of spending behavior	Mean	Level
Do you think about GST before spending	3.23	Medium
Affecting purchasing power negatively	3.26	Medium
Adversely affecting eating outside	3.75	High
Avoiding to pay taxes	3.75	High
Increase price	2.75	Medium
Effect on Spending pattern	3.26	Medium
More purchases in specific items	3.82	High
Reduce frequency of visiting shopping malls	3.64	Medium
Negatively affecting purchasing of standard- rated items	3.56	Medium

Relationship between Awareness and Spending Behavior

Table 5 depicts correlation between awareness & acceptance of GST with spending behavior of respondents. The reported value of correlation coefficient is +0.03 which shows that there is no significant relationships between level of awareness of GST on spending behavior. It can further be inferred as GST rate structure have not made any significant effect on the spending behavior of respondent in specific and public at large in general.

	Awareness and acceptance of GST	Spending behavior of respondents'
Correlation Coefficient	1.000	.030
Sig. (2-tailed)		.603
Ν	200	200
Correlation Coefficient	.030	1.000
Sig. (2-tailed)	.603	
Ν	200	200

Table 5: Results of correlation analysis

Perceived Concerns of Indian Retailers

In order to fulfill our fourth objective we have explored the concerns of Indian retailer who complete the chain of supply. Retailers are the last and the most important contact point to address the needs of customers and ensure the supply of the goods.

Taking actual practice in Indian retailers market earlier, Some of the retailers are used to evade the tax in order to reduce the overall cost of goods at their end. But, Now it is completely a different story. Post-GST, retailers or a middleman who wish to avail the benefit of input tax credit, has to get registered with GST and make an on-bill purchase and sale. This will make a push to entire market system to comply the GST regime. We have explored and collected data from 371 retailers and business operators of Indian market. The first two questions of the collected data from questionnaire provide a glimpse about their position in Post-GST regime and their concerns and challenges in the first quarter of GST implementation.

Annual Gross	GST	Registi	ration		Total	Percentage
Turnover	Yes	%	No	%	Number	(%)
Less than Rs. 20,00,000	67	18	108	29.1	175	47.1
More than Rs. 20,00,000	185	49.9	11	3	196	52.9
Total	252	67.9	119	32.1	371	100

Table 6: Retailers' turnover and GST registration status

As depicted in Table 6, out of 371 business operators (retailers specially) responded for the questionnaire. Out of 371 respondents, 47% reported gross turnover less than 20 lacs rupees whereas around 53% reported, for gross turnover more than 20 lacs. Furthermore, It is also observed that around 70% of respondents have their GST registration.

From Table 7, the responses recorded from strongly agree to strongly disagree have tabulated with respective statements. Mean value provides a general idea of inclination of retailers regarding specified issues. The response received from retailers in different parts of the country projects that the retailers are nutural in terms of changing the accounting or

SI.	Statement Of The Question						Mean
No.		SA(%)	MA(%)	NA-ND(%)	MD(%)	SD(%)	value
1.	Facing problem regarding GST compliance at implementation level.	42 (11)	56 (15)	179 (48)	67 (18)	28 (8)	3.05
5.	Record management for 60 months is troublesome.	44 (12)	70 (19)	65 (17)	154 (42)	39 (10)	2.80
с.	GST implementation will increase compliance cost for your business.	35 (9)	196 (53)	61 (17)	58 (16)	21 (6)	3.45
4.	Requirement for new professionals to handle & manage GST matters	60 (16)	70 (19)	72 (19)	149 (40)	21 (6)	3.00
<u>ю</u> .	Requirement of training & workshop of existing staff	60 (16)	208 (56)	53 (14)	37 (10)	14 (4)	3.71
.9	Pricing & Discount to customer Post-GST, is an issue for your business	60 (16)	203(55)	53 (14)	39 (10)	18 (5)	3.67
7.	Uncertain regarding overall impact of GST on your business turnover.	33 (9)	149 (40)	61 (17)	88 (24	40 (11)	3.13
×.	GST remittance in a perceived issue in business supply as of now.	30 (8)	210 (57)	70 (19)	40 (11)	21 (6)	3.50
9.	Filing of GST return under GST compliance is hard.	47 (13)	210 (57)	67 (18)	37 (10)	11(3)	3.67
10.	Government offering sufficient information and support for smooth implementation of GST.	35 (9)	208 (56)	61 (17)	56 (15)	11 (3)	3.54
SA= S	strongly Agree; MA= Moderately Agree; NA-ND= Neither Agree Nor D	isagree; M	D= Modera	tely Disagree;	SD= Strong	ly Disagree	

Table 7: Analysis of responses collected from retailers

Awareness, Concerns and Compliance
recording system and requirement of new professional for handling GST. It also shows that majority of retailers feel it is not actually troublesome to keep the GST record for 5 years. Since it is just a two month old story the actual impact on business and benefit of input tax credit is due, small businessman dealing with consumers are still not very sure about its impact on business. Although, majorly of them believe implementation of GST, increase their compliance cost. Retailers by and large, having proper knowledge regarding the GST and are satisfied with the government initiative taken in this regard. However, they are facing challenge to offer discount at point of selling to consumer as they are still struggling to quantify the overall cost of compliance. This can further taken as, retailers by and large accepted and implemented GST at their level and contributing effectively for success of GST in the economy. The concerns or issues will surely need an attention and will definitely get an answer as the first quarter input tax credited to their end.

Conclusion

The present research article made a fair attempt to study the relationship between GST tax structure and its effect on spending behavior of consumers. Firstly, respondents were aware about the GST system and its introduction in India but yet to aware about the different aspect of it. As India had adopted the dual GST system, it has filled with its own complexities and many stakeholders including businessman, suppliers, wholesalers' and retailers are yet to experience with its functionality and input tax credit system. Although, respondents are quite aware regarding the GST structure. Furthermore, the study also revealed that although most of respondents avoid to pay tax but there is no clear correlation between GST structure and their spending behavior. It further implied as GST structure did not make any significant effect on the spending pattern of the respondent in general. On the other hand, Apart from perceived burden of compliance cost, retailers are by and large, still not sure about the overall effect of GST

REFERENCES

- Auerbach, Alan J., Laurence J. Kotlikoff and Jonathan Skinner, 1983. The Efficiency Gains from Dynamic Tax Reform, *International Economic Review*, Department of Economics, University of Pennsylvania and Osaka University Institute of Social and Economic Research Association, vol. 24(1), pages 81-100, February.
- Bollard, A.E., 1992. New Zealands Experience with consumption tax, NZ Institute of Economic Research Working Paper.
- Pabreja Kavita 2017, GST sentiment analysis using twitter data, International Journal of Applied Research, Vol. 3 (7), page 660-662.
- Muthupandi S., Xavier A.J, 2017, Awareness of implementation of goods and services tax (GST) among college students' in Sivakasi, IJESC, Vol. 7 (4), 01-06.
- Saravanan S & K CM, 2017, Assessment and impact of existing indirect tax to goods and service tax in India, *International Journal of Scientific Research in Computer Science, Engineering & Information Technology*, Vol. 2 (3) 623-629.

Impact of Demonetization on Salaried People in Manipur

TOMBA SINGH AND A. S. RAPHEILENG

Abstract: A contextual structural model of demonetisation was proposed to test the impact of demonetisation among salaried people in Manipur. 120 bank account holders who withdrew monthly salary through bank accounts participated in the study. The result of the structural equation modeling (SEM) revealed that neither expenses nor savings significantly predicted overall demonetisation impact. However, as expected, expenses were positively and savings negatively related with demonetisation impact though not significant.

Keywords: Demonetisation, contextual structural model, structural equation modeling.

Introduction

The withdrawals of the legal tender rights of any denomination of currency is known as demonetization. Demonetization means either introducing new notes or coins of the same currency or fully replacing the old currency with new currency. There is one important thing exist on economics, which is remonetisation, in which forms of payment is restored as legal tender. Demonetization is the process where government declares the currently running currency notes illegal to tender after the declaration is made. There are both pros and cons of demonetization in the Indian economy. On November 8, 2016, it was decided to demonetise high value currency notes of denomination of Rs 1000 and Rs 500 (called specified bank notes - SBNs). Such notes, valued at Rs 15.4 trillion, constituted 86.9 per cent of the value of total currency in circulation. The decision was in continuation of a series of measures taken by the Government of India during last two vears aimed at eliminating corruption, black money, counterfeit currency and terror funding. The decision was guided by the aim of reaping its enormous potential medium-term benefits in the form of reduced corruption, greater digitisation of the economy, increased flow of financial savings and greater formalisation of the economy. All of these would lead to higher GDP growth and tax revenues that could be used by the

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Government for inclusive and stronger economic growth within the norms of fiscal prudence, besides contributing to overall improvement in business environment.

The government believe that this demonetization is required for four main reasons; for stopping the funding of terrorism, facing the problem of fake currency, making black money worthless and reducing corruption, etc.

Legal Tender Money

The legal tender is the money that is recognised by the law of the land, as valid for payment of debt. It must be accepted for discharge of debt. RBI Act of 1934, which gives the Central Bank the sole right to issue bank notes, states that every bank note shall be legal tender at any place in India in payment for the amount expressed therein. The legal tender money is of two types:

- i) Limited Legal Tender Money: This is a form of money, which can be paid in discharge of a debt up to a certain limit and beyond this limit, a person may refuse to accept the payment and no legal action can be taken. Coins are limited legal tender in India.
- ii) Unlimited Legal Tender Money: In this form of money, which can be paid in discharge of a debt of any amount? A person who refuses to accept this money a legal action can be taken. Paper notes/currency are unlimited legal tender in India.

Non-Legal Tender Money is a form of money, which is generally accepted, but legally is not bound to accept it. Such as cheques, bank drafts bills of exchange, postal orders etc., are not legal tenders and are accepted only at the option of the creditor, lender, or seller. It is also called the optional money because it does not have legal backing and their acceptance is optional.

In India demonetisation was undertaken twice in the past, once in 1946 and the second time in 1976. However, during those time, the Indian economy was not so vibrant. The notes demonetised were of high denominations with very few people having access to these high denomination notes and hence not much hardship was faced by the common man. However, the present demonetisation announcement had widespread repercussions.

Effects of Demonetization

The demonetization drive initiated by the Indian Government is going to have far reaching impact on the Indian Economy. It is being considered as one of the most significant step in tackling the black money issue that has gripped our country since many years.

Some of the effects of the demonetization measures are:

• The total currency in circulation as on Oct 28, 2016 was Rs. 17.54 lakh crores. According to the Reserve Bank of India (RBI), 86% of this component is in currency notes of Rs.500 and Rs. 1000 denomination.

Therefore, the currency that is being attempted to be demonetized is around Rs. 15 lakh crores. It is being estimated (internal estimates) that around 20% of this currency is in black. It is further believed that this money either will not come back into the system for exchange for new notes or will be surrendered as black money and taxes thereon will be paid.

- Conservatively assuming current parallel economy to be 25% of India's GDP (World Bank estimated parallel economy to be 23.7% of India's GDP in 2007), it is estimated that the total size of unaccounted economy in cash would be around Rs 35 to 40 trillion.
- It is believed that government's move to demonetize higher denomination currency would have a far-reaching impact on Indian economy. It might have short-term pain but sure long-term gains. Apart from flushing liquidity in the banking system, demonetization could create short-term disruption in consumption and lead to behavioural changes in household's saving and consumption demand.
- The banking sector is going to see a surge of liquidity as deposits get collected. Based on our assumption (internal estimates) that (20% of currency will not be tendered back), there is going to be tendering of currency from the public to the tune of Rs. 12 lakh crores (80% of Rs. 15 lakh crores). Due to the temporary restrictions on withdrawing cash, our internal estimate is that at least 50% of the cash will remain within the banking system, i.e., of Rs 6 lakh crores. This sudden surge in deposit of 6% of current aggregate deposits will help in improvement of liquidity. This will lead to demand for fixed income securities, particularly government securities.
- According to a World Bank estimate in 2007, around 20-25 % of India's GDP is the size of the parallel black economy. The steps taken by the Indian Government has the parallel black economy scaring and should lead to better tax compliance. This may have a significant effect on the other heavens of black money i.e. real estate and gold. Both these sectors are going to witness reduced demand. Lower demand for gold resulting ultimately in lower import of gold is expected to improve the current account balances. The Indian rupee should remain stable and display appreciating bias against hard currencies, as the current account improves and may also move into surplus.
- The sudden change due to reduced cash transaction will lead to reduction in economic activity. We believe that the services sector growth will be majorly affected. This will lead to lowering of inflation expectation and moderation of headline inflation too. However, the effect on inflation would depend on the moderation in economic activity in those sectors that have heavy cash transaction. There are some other positive impact expected over the medium to long term. A more compliant economy should increase tax collections and tax to GDP ratio should improve. In future, an increase in use of plastic money rather than hard currency would also lead to higher money multiplier which will be more productive.

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Objectives

The primary aims of this study are to compare the level of impact of demonetisation between male and female, and to test the proposed contextual structural model.

Hypothesis

Ho₁: The overall impact of demonetisation does not differ significantly between male and female.

Proposed Model

The distal variables, namely, age, size of family and monthly income predict the proximal variables, namely, monthly expenses and monthly savings, and these proximal elements, in turn, will directly predict an outcome, that is, overall impact of demonetization. In addition, the distal variables will indirectly predict the outcome, that is, overall impact of demonetization via the proximal latent variables.



Figure 1: Proposed contexual mediated model of demonetisation

Research Methodology

One hundred and twenty individuals (male = 90, female = 30) aged between 23 and 59 years (mean = 36.65, SD = 9.69 years) who withdrew monthly salary through bank accounts participated in the study. ATM card holders who were queuing at ATM booths to withdraw cash were randomly approached between December 2016 to January 2017 in greater Imphal city spreading over different ATM booths (mostly SBI/Bank of Baroda/UBI/ and others). The questionnaires were self administered by the researchers, thus 100% correct responses were achieved.

A questionnaire include the following variables.

Distal Variables: The variables age, size of family and monthly income from salary were included in the study as distal variables. Participants simply had to indicate their age, number of family members living together and their monthly salary.

Proximal Variables: A one-item question each for expenses and savings. Respondents simply had to state their average monthly expenses and savings.

Outcome Variable: A measure consisting of single item question: 'How adversely does demonetisation affect your present overall economic-related chores/activities/status?'

Responses were rated on a 5-point likert scale (1= No Affect, 2 = Minor Affect, 3 = Neutral, 4 = Moderate Affect, 5 = Major Affect), with higher scores indicating higher levels of impact.

Analysis

The data collected were first codified and then entered and processed using the Statistical Product and Service Solutions – Analysis of Moment Structure (IBM SPSS – AMOS Statistics), the English version 22.0. Student t-test was used to test the difference in the overall impact of demonetization between gender. To test the proposed model, structural equation modeling (SEM) analysis was performed using the Analysis of Moment Structure (AMOS) software.

Descriptive Analysis of the Control Variables

Descriptive information about the control variables are given in Table 1. It revealed that the participants' age ranged between 23 to 59 years, having mean age (male = 37.9, female = 32.9), and on average male are older (about 5 years) than female. While judging from the economic perspective, on average, female outperformed their male counterpart in all the three economic parameters taken for the purpose of this study, that is, monthly income, monthly expenses and monthly saving.

t-test was applied to examine the differences in experiencing overall impact of demonetisation between male and female (Table 2). The t-test result (t = 0.342, p = 0.734) revealed that the supposition of no difference cannot be rejected. Thus, Ho₁ sustained, that is, the overall impact of demonetisation does not differ significantly between male and female, or in other words, demonetisation impacted equally irrespective of gender.

Structural Analysis

Figure 2 showed the structural model expressed in the form of standardised path coefficient predicting overall impact of demonetisation as outcome by monthly expenses and monthly saving acting as proximal variables, and age, size of family and monthly income acting as distal variables. The model yielded a very good fit (NFI = 0.945, GFI = 0.938, CFI = 0.952, RMSEA = 0.213). Investigation of the structural path parameters vis-a-vis the regression weights (Table 3) revealed that four out of the six possible paths from the distal context to proximal context were significant and neither of the two paths from proximal variables predicted outcome significantly. While partially supporting expectations with regard to the

	Table	1 Descriptive ((n =120;	lassification (Male = 90, Fe	of the control male = 30)	variables		
Variables	Me	an	03	D.	Mean Diff.	Min.	Max.
	Male	Female	Male	Female			
Age	37.90	32.93	9.60	9.15	4.96	23	59
Size of Family	4.55	5.06	1.74	1.68	-0.51	1	8
Monthly Income	31702.2	34170.0	12401.5	9710.2	-2467.7	14700	65000
Monthly Expenses	12743.3	13340.0	4532.4	4148.4	-596.6	5000	22000
Monthly Savings	14346.6	15333.3	7829.5	6395.5	-986.66	5000	40000
Source: Computed from	Primary Data						

Table 2 Mean, S.D. and t-test of the outcome variable (n =120: Male = 90. Female = 30)

				(00)		
Factor	I	Mean		S.D.	t	<i>p</i> - value
	Male	Female	Male	Female		
Impact of Demonetisation	3.72	3.63	1.11	1.27	0.342	0.734

Source: Computed from Primary Data

distal variables predicting proximal variables, income positively predicted both savings and expenses, size of family positively predicted expenses and negatively predicted savings, however, age did not predict significantly either expenses or savings. As with the proximal variables predicting outcome, neither expenses nor savings significantly predicted overall demonetisation impact. However, as expected, expenses were positively and savings negatively related with demonetisation impact though not significant.



Figure 2 Structural model

Table 3 Regression weights of demonetisation (group number 1 – default model)

	Estimate	S.E.	C.R.	Р
Age — > Monthly Expenses	55.488	26.724	2.076	.038
Size of Family $-$ > Monthly Expenses	1197.322	135.923	8.809	***
Monthly Income— > Monthly Expenses	.169	.024	7.192	***
Age — > Monthly Savings	2.588	41.153	.063	.950
Size of Family $-$ > Monthly Savings	-1434.228	209.308	-6.852	***
Monthly Income— > Monthly Savings	.627	.036	17.292	***
Monthly Expenses— > Overall Impact	.000	.000	2.871	.004
Monthly Savings— > Overall Impact	.000	.000	-3.015	.003

Source: Computed from primary data

Conclusion

The investigation did not find any major differences in the experienced of demonetisation impact between male and female. So both the gender was equally affected by demonetisation. As with causal relationship, income was positively related to both expenses and savings, as also size of family was positively related to expenses but negatively related to savings, as expected. Regarding prediction, experience of the adverse impact of demonetisation increases as expenses increases, and on the other hand, decreases as saving increases. In other words, demonetisation drive was friendlier to those who save more and less friendly to those who spend more.

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REFERENCES

- Bankers want RBI to use MSS route to mop up excess liquidity. http://www.thehin dubusinessline.com/money-and-banking/bankers-want-rbi-to-use-mss-route-to-mop-up-excess-liquidity/article9414024.ece.
- C.Vadgama, A. Khutwad, M.Damle, S.Patil, 2015. Smart funding options for developing smart cities: A proposal for India. *Indian Journal of Science and Technology*. 8(34), 1-12.
- Clamour for rate cut is baseless. http://www.thehindubusinessline.com/opinion/ india-doesnt-need-a-rate-cut-now/article9411930.ece.
- Demonetization hits child trafficking industry hard. http://www.thehindubusi nessline.com.
- Jaitley admits Currency shortage. http://www.thehindubusinessline.com/ economy/economy/article9416336.ece.
- RBI cites inflation risk, holds rate; markets stunned. http://www.thehindub usinessline.com/money-and-banking/rbi-keeps-repo-rate-unchanged-at-625/ article9415400.ece.
- V. A. Srinivas, 2016. Indian capital market Impact of FII on Indian stock market. Indian Journal of Science and Technology. 9(15), 1-7.

Employment and Entrepreneurship through Self Help Groups in Manipur

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Abstract: Entrepreneurship plays a significant role in the economic development of the nation. The present research paper tries to find the relationship between the characteristics of entrepreneurs and their success and also tries to find out the factors that influenced the entrepreneurship development. The study found there is a meaningful difference between individual and financial barriers to entrepreneurship in male and female, no significant difference among marketing and physical barriers to entrepreneurship and significant difference between discouraging factors, compulsory factors, encouraging factors, motivational factors to independent entrepreneurship and its dimensions among male and female.

Key words: Entrepreneurship, Economic development, SHGs,

Introduction

Entrepreneurship is a multidimensional phenomenon that cuts across disciplines. There is no universal theory of the phenomenon. Many theories of entrepreneurship are coming from different schools of thought, with many authors emphasizing different factors to explain it. Carter (2004) noted, research on entrepreneurship is moving from looking at whether gender makes a difference to how it makes a difference. It has been recognized that small and medium enterprises have been the major force in job creation, innovation and economic development. Further, it may be good to emphasize that out of many SMEs, a good proportion of them are women-owned or operated and women do not only form majority of the work force in certain sectors of the economy, but their businesses have also influenced in one or another way. Women constitute about 66 percent of the agricultural work force (GoI, 2008). Thus, poverty and unemployment continuously hunt the rural poor. Statistics for micro, small and medium enterprises combined with those indicating the growing number of women in self-employment, should alert policy planners to the growing importance of the economic contribution that women are making to sustain the local economy (Smith, 1999; Shaw et al., 2001). It is now being recognized that

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many newly self-employed people establish micro-businesses (Clark, 1995) and by 1997micro-businesses represented 95 percent of all firms. During the fifth five year plan the removal of unemployment and poverty alleviation was recognized as one of the principal objectives of economic planning in the country. Women constitute about 66 percent of the agricultural work force (UN, 2012). This agricultural work provides food security to the country's 1.13 billion people. But, agriculture provides only seasonal employment in the rural economy. Hence, poverty and unemployment continuously hunt the rural poor. SHG is one of the most important means of employment in the development process. Entrepreneur is a catalytic agent of change, which generates employment opportunities for others. The emergence of entrepreneurs in a society depends to a great extent on the economic, social, religious, cultural and psychological factor prevailing in the society.

The factors that influenced the entrepreneurship development are motivational factors, encouraging factors, compulsory factors and discouraging factors.

Review of Literature

Keishnaraj & Maithreyi, (2005) opined that in India, where poverty still remains a major problem with around 320 million people forming 36 percent of the population living below the poverty line, non-governmental organizations (NGOs) have recognized microfinance as one of the tools to attack poverty. They have facilitated organization of SHGs for a common cause through a process of social mobilization with varying entry points like removal of illiteracy, basic health care, access to local resources, removal of social ills, resolution of social conflict, protection of environment thrift and credit. The issue of women and men's entrepreneurship has received growing attention among policy makers in the developing as well as developed countries. Women and men's entrepreneurial activities are the important factor in creating and increasing employment opportunities and ensuring economic growth. Women entrepreneurship became an essential topic of research and discussion in the USA in the 1970s. The transition from communist states to market-based economics has introduced more attention to entrepreneurship in former communist countries since 1990s (Costanza et al., 2003). Shaver (2001) found that entrepreneurs who believed in their skills and ability were motivated to exert the necessary effort. Nilufer (2001) described an entrepreneur as any person who possesses the above qualities and uses them in setting up and running an enterprise. Entrepreneurs are enterprise builders, they perceive new business opportunities, take the associated risks and enjoy profit as rewards for their efforts. Taking into consideration the definitions discussed above, an entrepreneur can be defined as a person who brings all the required resources for innovation, production and renovation while considering the associated risks. According to an ILO (2001), entrepreneurship development refers to training and other support services incorporated within a structured program designed to assist individuals

and groups interested in becoming entrepreneurs and starting small businesses. Entrepreneurship development is an initiative that recognizes entrepreneurs' problems and launches programs to solve those problems to enable entrepreneurs to become active in the innovation process. Kantor (2001) has considered gender sensitive policies and programs that explicitly recognize differences between women and men, and that these differences will impact woman or man's ability to participate in entrepreneurship. Gender specific policies and programs targeted specifically women in order to benefit them within the current context of gender relations can be considered as women entrepreneurship development. On the other hand, different definitions have been used to identify enterprise size. Dasgupta (2000) observed that micro-financing through informal group approach has effected quite a few benefits like savings mobilized by the poor, access to the required amount of appropriate credit by the poor, matching the demand and supply of credit, reduction in transaction cost for both lenders and borrowers, tremendous improvement in recovery, heralding a new realization of subsidy less and corruption less credit and remarkable empowerment of poor women. Kamal (2000) found that financial support from the government especially in the start-up capital is an important factor that motivates women to establish their own businesses. Selffulfillment, knowledge, skills and experience, including relationship to spouse or father business, are all important factors in the development of women entrepreneurs. According to Kristin, (1999) small and medium enterprise varies by country and usually based on the number of employees or the value of assets. Coltrane, (1998) argued that gender has been a central organizing principle of social life throughout history and across cultures. The construction of gender and gender difference is a universal principle of cultural life (Goldner, Penn, Sheinberg & Walker, 1990); as such, gender is one of the primary constructs around which people organize their family relationships, identities and life choices.

Research Problem

Presently Manipur as many other developing states is encountered with the mass of important socio-economic problems arising mainly due to unemployment and poverty. Development and welfare came under focus with the launch of planned economic development through different five year plans. A good number of such programs have also been implemented for the socio-economic development by Government, NGOs and International Agencies etc. Despite all these efforts development has not been satisfactory. Under this group of enterprises provide an organizational frame work for pooling up capital, technology, market, labour and this facilitates participation of male and female influence on skill development in self-employment and income generating activities. Therefore, to assess the successfulness of the program, this study was carried out under the following specific objectives.

Objectives of the Study

- To find out the socio-economic characteristics of male and female entrepreneurs belonging to SGSY assisted SHGs who are functioning independently in the study area.
- To identify the factors those influence the entrepreneur's development.
- To assess the relative performance of both the categories in terms of entrepreneurial barriers and various factors to entrepreneurships.

Hypotheses

- Ho_1 : There is no significant difference among the demographic variables in male and female entrepreneurship.
- ${\rm Ho}_2$: There is no significant difference between entrepreneurial barriers to independent entrepreneurship.
- Ho_3 : There is no significant difference among discouraging, compulsory, encouraging and motivational factors to entrepreneurship in male and female.

Research Methodology

A multi-stage purposive sampling procedure was followed in order to select the district, block, villages and entrepreneurs. Valley district of Manipur was chosen as a study area. The sample for this study comprises of 210 working SHG employees of both manufacturing and services activities in four districts. The sample has covered working entrepreneur.

The study is descriptive in nature. It is based on primary as well as secondary data. The primary data were collected with the help of interview Schedule. SPSS 21 package was used to analyze the data using various performance measurement techniques and statistical techniques like average, percentage, t-test and ANOVA.

At present there are nine district of Manipur. Out of four districts are valley district namely Imphal East, Imphal West, Bishnupur and Thoubal were selected for the present study.

Table 1 presents the important demographic variables with social status associated in traditional societies. In general the majority of working male and female belong to the age group of 41 to 45 years. As seen from the table SHG members who remain up to 35 years of age are very few only 12 and 16 numbers respectively. They are playing active role in SHGs. The educational profile indicates that the majorities of the sample entrepreneurs are able to go for higher education. Majority of the respondents both male and female are higher secondary and graduate. Whereas 50 male and 54 female constitute highest numbers of working employees engaged up to 15 members. 3 male and 3 female found lowest number of working employees above 30. 39 and 41 respondents are engaged in manufacturing and least number of respondents belongs to agricultural related and food and beverage activities accounting for 21

respondent both male and female respectively. The remaining sample respondents are found scattered in other enterprises. Income indicates the standard of living of the respondents. 40 male and 37 female respondents have monthly income between Rs. 30001 to 40000. It reflected that medium income status of the respondents. Similarly about 16 male and 12 female members are earning less income between Rs. 10,001 to 20000.

			-	
	Variables	Gende	er	Total
		Male	Female	
Age	Up to 35 years 36-40 years 41-45 years above 45 years	12(42.9) 20(51.3) 53(50.5) 20(52.6)	16(57.1) 19(48.7) 52(49.5) 18(47.4)	28 39 105 38
Literacy	High school Higher secondary Graduate and above	36(55.4) 29(43.9) 40(50.6)	29(44.6) 37(56.1) 39(49.4)	65 66 79
Number of working employee	Up to 15 16-25 26-30 Above 30	50 (48.1) 44(48.4) 8(88.9) 3(50.0)	54 (51.9) 47(51.6) 1(11.1) 3(50.0)	$ \begin{array}{r} 104 \\ 91 \\ 9 \\ 6 \end{array} $
Type of industry	Manufacturing Services Agricultural and allied Handloom and handicraft Food and beverage	39(48.8) 23(51.1) 13(61.9) 18(41.9) 12(57.1)	$\begin{array}{c} 41(51.2)\\ 22(48.9)\\ 8(38.1)\\ 25(58.1)\\ 9(42.9)\end{array}$	80 45 21 43 21
Income of the business	10,001-20,000 20,001-30,000 30,001-40,000 More than 40,000	16(57.1) 20(44.4) 40(51.9) 29(48.3)	12(42.9) 25(55.6) 37(48.1) 31(51.7)	28 45 77 60
Total		105 (50.0)	105 (50.0)	210 (100.0)

Result and Discussion

Table 1: Demographic variables of male and female entrepreneur

The result highlighted that significance values are below 0.05 for 5% level of significance in the variables except year of the establishment, type of industry, current turn over size and age of the respondent.

There is a meaningful difference between individual and financial barriers to entrepreneurship in male and female. The value is greater than 0.05 level of significant in the first and third rows of the table; therefore, there is no significant difference among marketing and physical barriers to entrepreneurship in male and female.

The significance level implies that there is no meaningful difference between all the factors to independent entrepreneurship among male and female.

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The calculated value is greater than 0.05 level of significance. All the factors reflect that there is no difference among male's group and female group.

The major findings are:

- 60 percent of the groups have got only financial facilities from the NGO and they did not get any other facilities.
- Imphal East and Imphal West district covered the 33 percent of the total number of SHGs in Manipur (as on March 2011). More than 80 per cent of them are women SHGs.
- It is found that maximum numbers of groups have been formed in the year 2010 and least numbers of groups have been formed in the year 2007-2008 i.e., 44 percent and 15 percent respectively.
- The maximum numbers of groups have been formed by the influence of NGO. 60 percent of the total study population falls under this category.
- Only 45 percent of the group has opened their bank account and maximum numbers of them 55 percent have no bank account. Here the state of financial exclusion is more than inclusion.
- It is found that 68 percent of the group has accessed the microinsurance facilities provided by the microfinance institutions.
- 60 percent of the total groups i.e., SHGs have given the interest rate of 2 percent and more in a month against their loan amount. It is the 24 percent per annum and if it is calculated on flat basis it is 8 per cent in a month and more than 100 percent in a year.
- Again 90 percent of groups have found to select the SHGs due to easy, simple, quick and no need for collateral securities.
- It is found that 68 percent of them have internal lending and rest have no internal lending. The main reason for not internal lending is due to non-availability of enough funds.
- For the development of their fund they have charged different rate of interest with mutual agreement of the group members.
- Among the different trades done by the SHGs embroidery work covered the 66 percent of the total.
- The attendance of member at the group meeting is poor due to the busy schedule of their family works.
- Only 18 percent of total SHGs have group production (i.e., group business). The mode of group productions are collected from members which have been producing in their own home and another one is producing jointly at one work place.
- Majority of the respondents which have found that educational levels both in male and female are higher secondary and graduate.
- No significant difference among marketing and physical barriers to entrepreneurship in male and female category.

	Та	ble 2: Results o	of hypotheses usi	ng F-test			
Groups of the Variable	Sum of Squares	df	Mean Square Value	F Value	P l Significano	Level of ce	
Year of the establishment	Between groups Within groups	1272.605 6729.209	18 191	70.700 35.231	2.007	.011	Significant
	Total	8001.814	209				
Type of industry	Between groups Within groups	90.249 333.180	28 181	3.223 1.841	1.751	.016	Significant
	Total	423.429	209				
Current turn over size	Between groups Within groups	31.311 177.684	18 191	1.740.930	1.870	.020	Significant
	Total	208.995	209				
Age of the entrepreneur	Between groups Within groups	24.682 148.847	18 191	1.371 .779	1.760	.033	Significant
	Total	173.529	209				
Educational qualification	Between groups Within groups	$9.346\ 133.721$	18 191	.700	.742	.765	Not Significant
	Total	143.067	209				
Source: Primary Data							

** Significant at 1% level, * Significant at 5% level.

					1 Pourse	2 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0				
Entrepreneuria	l barriers	Leven test 1 equalit varian	le's for y of ices		t-tes	st for equa	dity of mean	s		
		۲	Sig.	÷	df	Sig. (2- tailed)	Mean Difference	Std. Error Difference	959 Confid Intervi the Diff	6 ence al of erence
									Lower	Upper
Physical barriers	Equal variances assumed	.217	.642	-1.080	208	.281	04952	.04585	13991	.04087
	Equal variances not assumed			-1.080	207.156	.281	04952	.04585	13992	.04087
Marketing barriers	Equal variances assumed	.567	.452	.370	208	.711	.02619	.07071	11321	.16559
	Equal variances not assumed			.370	205.108	.711	.02619	.07071	11322	.16560
Financial barriers	Equal variances assumed	10.571	.001	1.645	208	.102	.10476	.06370	02081	.23033
	Equal variances not assumed			1.645	206.156	.102	.10476	.06370	02082	.23034

Table 3: Results of hypotheses using t-test

Source: Primary Data

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	Table	4: Results o	of hypothes	es using F-te	st		
Factors of the g	sdno	Sum of squares	df	Mean square	F Value	P Value	Level of significance
Discouraging factors	Between groups	.129	1	.129	1.167	.281	Not Significant
	Within groups Total	22.956 23.085	208 209	.110			0
Compulsory	Between groups	.036	1	.036	.137	.711	Not Significant
	Within groups Total	54.597 54.633	208 209	.262			
Encouraging factors	Between groups	.049	1	.049	.462	.498	Not Siønificant
	Within groups Total	21.966 22.015	208 209	.106			0
Motivational factors	Between groups	.576	1	.576	2.705	.102	Not Significant
	Within groups	44.305	208	.213			
	Total	44.881	209				
Source: Primary	. Data						

source: Frimary Data

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• There is no difference among male's group and female group of all the factors to independent entrepreneurship.

Conclusion

The results indicated that there is a significant difference between individual and financial barriers in men and women and there is also a significant difference among the order of effectiveness of barriers to entrepreneurship in men and women. Comparing the order of effectiveness of barriers to independent entrepreneurship in men and women, it was found that financial constraints are the main barrier to entrepreneurship. Additionally, it also became clear that no significant difference between discouraging factors, compulsory factors, encouraging factors, motivational factors to independent entrepreneurship and its dimensions among both groups. However, it is interesting to say that among the three barriers financial has the same impact on independent entrepreneurship in male and female.In order to maximize the socio-economic development of potential entrepreneur, SHGs should promote partnerships between microentrepreneurs. This will reduce the effects of competition, increase the potential for business expansion and higher profits and improve relations between market participants.

REFERENCES

- Carter, N.M., 2004. The career reasons of nascent entrepreneurs, *Journal of Business Venturing*, 18(1), 13–16.
- Clark, P. 1995. *Business development and the poor:* the strategy of micro-enterprise assistance, available at: www.sbaer.uca.edu/docs/proceedings/95sbai01.
- Coltrane, S. 1998. Gender and families. Thousand Oaks, CA: Pine Forge Press.
- Costanza, G., Hrund, G. & Angela, M. 2003. The status of statistics on women and men's entrepreneurship in the UNECE Region, Statistical Division, UNECE, Geneva.
- Dasgupta, G. 2000. An informal journey through SHG's, Indian Journal of Agricultural Economics, 56(3), July-September.
- GoI 2008. Annual Report, Planning Commission. New Delhi.
- Goldner, V., Penn, P., Sheinberg, M. & Walker, G. 1990. *Love and violence:* gender paradoxes in volatile attachments. *Family Process*, 29, 343-344.
- Kamal, N. 2000. Online publication: url permanent 10.1108 / 19348830910974932 – Emerald Group Publishing Limited.
- Kantor, P. 2001. Promoting women's entrepreneurship development based on good practice programmes: some experiences from the north to the south, SEED Working Paper No. 9, International Labour Office, Geneva.
- Keishnaraj&Maithreyi, 2005. Growth and rural poverty, *Economic & Political Weekly*, September 21.
- Kristin, H.1999. *Small and medium scale enterprises:* A framework for intervention, Small enterprise unit, Private sector development department, The World Bank, Washington, DC.

- Lazar Daniel, Aravanan S &DeoMalabika (ed.) 2011. *Embodiment of empowerment* self help group. Chennai, India: Vijay Nicole Imprints Pvt. Ltd.
- Nilufer, A. 2001. Jobs, gender and small enterprises in Bangladesh: factors affecting women entrepreneurs in small and cottage industries in Bangladesh, *SEED Working Paper No. 14*, International Labor Office, Geneva.
- Singh N. Muhindro & Devi L. Sancharani 2004.*Micro Finance and self help groups in Manipur A new perspective*. Naoremthong, Imphal, India: Kounu Printing Press.
- Smith, I. 1999. Micro solutions to macroeconomic change: rural management and human resources, *Journal of the Agricultural Manpower Society*, 1(4).
- Shaver, K.G., 2001. Attributions about entrepreneurship: a framework and process for analyzing reasons for starting a business. *Entrepreneurship Theory and Practice* 26(2): 5–16.

A Study of Job Satisfaction of Loco Pilots of South Eastern Central Railway, Bilaspur, Chhattisgarh

HARISH KUMAR AND B. V. RAMANA RAO

Abstract: The present study was conducted on the Job Satisfaction of Loco Pilots. The work of a loco pilot is demanding and full of responsibility. A Loco Pilot is in-charge of both safety and punctuality, a job which requires high level of concentration and alertness when it comes to the signals, information, the tracks and his immediate environment. The extremely irregular working hours, constitute an added job stress for the train driver and this exacerbated by the way driver is not allowed to decide for himself when to take breaks. 120 loco pilots were tested for their job satisfaction About fifty five percent of loco pilots feel their organization is supporting their affairs and not so stressful. The loco pilots with more than 10 years of service were felt more organizational support than their counter parts and job satisfaction increases with increase in experience.

Key words: Job, Satisfaction, Loco Pilot, Stress, Reward,

Introduction

The physical working environment including noise, vibration and uncomfortable cabin climate (too hot, too cold and draughty) increases their job stress. The train driver is also exposed to a demanding psychological working environment, which includes solitary work, limited opportunities for social contact with colleagues and a heavy responsibility for operating the train. Traffic volume and speed is going to be increased in Indian Railways successively, leading to higher stress in staff connected with train operations. The jobs of railway engine pilots come under the category of high-strain jobs, necessitating a need to conduct multi centric study.

The job of a Driver consists of irregular rest and working hours, eating disorders, and sleep disorders. That is why the Railway spends a lot on their trainings and resting time. They are booked from a crew changing point, informed well in advance, after ensuring that they have taken sufficient rest and completed all required trainings and requirements, those are mandatory for train operation. At the end of the journey, they are sent

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to well-maintained rest rooms, given meals (home cooked) and rebooked back to their headquarters after giving minimum stipulated rest.

Railway Loco Pilot

Railway Loco Pilot (Driver) is an important person in executing the huge task of transporting nearly seventeen million passengers and more than two million tons of freight daily with the help of 2,25,000 wagons, 45,000 coaches and more than 8300 locomotive engines of various kinds. The job of a Driver demands hard work and great presence of mind along with courage to handle adverse conditions. For this one should have discipline, patience, responsibility, punctuality, commitment, courage and above all self-confidence.

How vigorous is the job profile can be noted from this very fact that the Railway recruits persons as 'Assistant Loco Pilot'. They work on freight trains for as long as 10–12 years. During this tenure they are supposed to work with experienced Train Drivers and perform only assisting work during the run of a locomotive i.e. a train. An Assistant Driver thus learns the work required for train operation. Thereafter they are promoted as 'Shunter', after proper courses and practical trainings, wherein they are supposed to drive locomotives in sheds/yards at not more than 15 km/h speeds. After experiencing for not less than two years, they are promoted as 'Goods Drivers', who are always monitored by their respective 'Loco Inspectors'.

A train typically has an Assistant Driver and a Driver on the Locomotive. The Assistants are normally common but Drivers fall in various categories like Goods Train Drivers (or Loco Pilots used for running goods trains), Passenger Driver (Driver used to run slow moving Passenger carrying Trains), Mail Express Driver (Driver used to run high speed Passenger carrying Trains) and Rajdhani Drivers (Used for very high speed passenger carrying trains). There is yet another category of crew called 'Shunters' who operate only in yards, for moving trains within a particular station yard. Normally Shunters work alone without an Assistant.

Review of Litature

Vanderberg and Lance (1992) reported that with increase in job satisfaction employee loyalty increases and absenteeism decreases. Judge, Heller, and Mount (2002) found that the job satisfaction is influenced by emotional adjustment and mal adjustment. Eisenberger, Fasolo, & Davis (1990) reported that perceived organizational support enhances the commitment of the employees. Shore, and Shore, (1995) suggested that employees' repeated exposure to fair procedures would increase POS. Kim (2002), reported that performance-appraisal fairness, skill utilization and supervisors' support of career development are positively associated with high levels of job satisfaction. Ren-Tao (2011) showed positive associations of perceived organizational support and job satisfaction. Pandey (1995) reported that advancement in experience was found to enhance probability of stress as also to have differential impact on drivers. Olivo, Cecere, and Coni (1999) Other situations like vibrational stress, shaking and mi-croclimate conditions, that are not always optimal, determine a decrease in the level of performance of drivers. Devesh, Jai and Poonam (2011) found that occupational stressors of railway engine pilots were found significantly higher to that of office clerks and highest subgroup of stressor observed was role overload followed by role conflict.

Shamir (1983) reported that shift work during weekends and working in rotating shift systems is likely to increase the work-family conflict. Staines and Pleck, (1984) suggested that irregular working times to be positively related to the interference of work with family life. Gutek, Searle, and Klepa (1991) concluded that the number of working hours predict the work-family conflict. Eby, Casper, Lockwood, Bordeaux, and Brinley (2005) reported that the level of perceived stress and working in non-regular shift times as a main driver for the work-family conflict.

Objectives

The study was undertaken with the following objectives:

- To study the current status of affairs with regard to job satisfaction of Loco Pilots.
- To examine the reasons responsible for job satisfaction and dissatisfaction.

Hypotheses

Following hypotheses were formulated.

- There is no effect of age of Loco Pilots on their level of perceived organizational support.
- There is no effect of age of Loco Pilots on their level of Job stress
- There is no effect of age of Loco Pilots on their level of Work Life Balance
- There is no effect of age of Loco Pilots on their level of Job Satisfaction.
- There is no effect of experience of Loco Pilots on their level of perceived organizational support.
- There is no effect of experience of Loco Pilots on their level of Job stress.
- There is no effect of experience of Loco Pilots on their level of work life balance.
- There is no effect of experience of Loco Pilots on their level of job satisfaction.
- There is no significant correlation between the age and job satisfaction Loco Pilots.

• There is no significant correlation between the experience and job satisfaction Loco Pilots of Bilaspur Division.

Research Design

A cross-sectional survey design was found to be appropriate in examining these relationships. The population of the study includes all the Loco Pilots and Assistant Loco Pilots working in Bilaspur Division. There are six crew points in Bilaspur Division. Though the number of loco pilot posts were sanctioned on 04.02.2012 was 2526, but the number of actual working individuals is about 1635 which is 64.72 percent of the sanctioned. For the present study a sample 120 Loco Pilots and Assistant Loco Pilots who were selected instantaneously at the time of signing on or signing off their duties and those who are undergoing refresher training at the Electric Loco Pilots Training Centre located at Uslapur.

For the purpose of this specific research study, a tool was developed by the researcher consulting Loco Pilots, Loco Inspectors and Loco Pilot Training Instructors. The tool consisted of 30 items comprising three factors viz. organizational support, job stress and work life balance. The tool was balanced by taking 10 items from each of the factor mentioned above. Items were taken bi-lingual Hindi and English to eliminate ambiguity of the non-hindi speaking respondents. There were 24 positive items and 6 negative items. The negative items were pointed as 9, 15,16,17,19 and 20.

Analysis and Discussions

Table 1: Mean and SD of various dimensions of job satisfaction Perceived Organizational support

Group	Ν	Mean	SD	df	t-value	Signi.
A 40& + Years	37	35.84	4.53	98	6.509	0.01
B up to 40Years	63	31.78	4.84			
Job Status						
A 40& + Years	37	32.76	3.69	98	0.77	NS
B up to 40Years	63	32.98	3.82			
Work life balance						
A 40& + Years	37	31.81	6.43	98	0.13	NS
B up to 40Years	63	29.98	4.31			
Job satisfaction						
A 40& + Years	37	100.41	8.69	98	0.002	NS
B up to 40Years	63	94.75	9.29			
Perceived organizat	ional sup	port				
A 10 & + Years	59	34.98	4.86	98	3.328	.01
B below 10Years	41	30.82	4.44			
						Contd

Contd						
Job stress						
A 10 & + Years	59	32.15	3.54	98	0.018	NS
B below 10Years	41	33.97	3.84			
Work life balance						
A 10 & + Years	59	31.25	5.45	98	0.168	NS
B below 10Years	41	29.80	4.86			
Job satisfaction						
A 10 & + Years	59	98.38	9.07	98	0.051	NS
B below 10Years	41	94.60	9.62			

From the Table 1 it can be observed that the number of loco pilots in group A (40 and above years age) was 37, their mean score and standard deviation for perceived organizational support were 35.84 and 4.53. Similarly number, mean and sd of group B (below 40 years age) were 63, 31.78 and 4.84 respectively. In order to study significance of difference between the mean scores t-test was applied (tails 2 and type 3). The t score found to be 6.509, which is more than the table value. (t=2.63, df=98).

Hence the hypothesis 1 has been rejected and can be said that the pilots of age group 40 and above feel more organizational support than that of their counter parts.

From the Table 1 it can be observed that the number of loco pilots in group A (40 and above years age) was 37, their mean score and standard deviation for job stress were 32.76 and 3.69. Similarly number, mean and SD of group B (below 40 years age) were 63, 32.98 and 3.82 respectively. In order to study significance of difference between the mean scores t-test was applied (tails 2 and type 3). The t score found to be 0.77, which is less than the table value. (t=2.63, df=98). Hence the hypothesis 2 has been supported and can be said that there is no difference in the job stress of pilots of age group 40+years and below 40 years.

From the Table 1 it can be observed that the number of loco pilots in group A (40 and above years age) was 37, their mean score and standard deviation for work life balance were 31.81 and 6.43. Similarly number, mean and SD of group B (below 40 years age) were 63, 29.98 and 4.31 respectively. In order to study significance of difference between the mean scores t-test was applied (tails 2 and type 3). The t score found to be 0.13, which is less than the Table value. (t=2.63, df=98). Hence the hypothesis 3 has been supported and can be said that, there is no difference in the work life balance of pilots of age group 40+years and below 40 years.

From the Table 1 it can be observed that the number of loco pilots in group A (40 and above years age) was 37, their mean score and standard deviation for job satisfaction were 100.41 and 8.69. Similarly number,

mean and SD of group B (below 40 years age) were 63, 94.75 and 9.29 respectively. In order to study significance of difference between the mean scores t-test was applied (tails 2 and type 3). The t score found to be 0.002, which is less than the Table value. (t=2.63, df=98). Hence the hypothesis 4 has been supported and can be said that, there is no difference in the job satisfaction level of pilots of age group 40+years and below 40 years.

For the purpose of the present study, the loco pilots responses were sorted out on the basis of experience they possess. The pilots, who possess 10 years or more experience were grouped in A, whereas the pilots who possess less than 10 years of experience were placed in group B.

From the Table 1 it can be observed that the number of loco pilots in group A (10 and above years' experience) was 59, their mean score and standard deviation for perceived organizational support were 34.98 and 4.86. Similarly number, mean and SD of group B (below 10 years' experience) were 41, 30.82 and 4.44 respectively. In order to study significance of difference between the mean scores t-test was applied (tails 2 and type 3). The t score found to be 3.328, which is more than the table value. (t=2.63, df=98). Hence the hypothesis 5 has been rejected and can be said that the pilots of group A with experience of 10 and above years feel more organizational support than that of their counter parts.

From the Table 1 it can be observed that the number of loco pilots in group A (10 and above years' experience) was 59, their mean score and standard deviation for job stress were 32.15 and 3.54. Similarly number, mean and SD of group B (below 10 years' experience) were 41, 33.97 and 3.97 respectively. In order to study significance of difference between the mean scores t-test was applied (tails 2 and type 3). The t score found to be 0.018, which is less than the table value. (t=2.63, df=98). Hence the hypothesis 6 has been supported and can be said that, there is no difference in the job stress of pilots with experience of 10 & above years and below 10 years.

From the Table 1 it can be observed that the number of loco pilots in group A (10 and above years' experience) was 59, their mean score and standard deviation for work life balance were 31.25 and 5.45. Similarly number, mean and SD of group B (below 10 years' experience) were 41, 29.80 and 4.86 respectively. In order to study significance of difference between the mean scores t-test was applied (tails 2 and type 3). The t score found to be 0.168, which is less than the Table value. (t=2.63, df=98). Hence the hypothesis 7 has been supported and can be said that there is no difference in the work life balance of pilots with experience of 10 & above years and below 10 years.

From the Table 1 it can be observed that the number of loco pilots in group A (10 and above years' experience) was 59, their mean score and standard deviation for job satisfaction were 98.38 and 9.07. Similarly

number, mean and sd of group B (below 10 years' experience) were 41, 94.60 and 9.62 respectively. In order to study significance of difference between the mean scores t-test was applied (tails 2 and type 3). The t score found to be 0.051, which is less than the Table value. (t=2.63, df=98).

Hence the hypothesis 8 has been supported and can be said that there is no difference in the job satisfaction of pilots with experience of 10 & above years and below 10 years.

In order to study the correlation between pilot's age and their job satisfaction the correlation coefficient was computed. The summary of the same has been presented in Table 2.

Table No. 2: Correlation between the	age and	job satisfaction	of loco	pilots
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Factor 1	Factor 2	Ν	r	df	Sign.
Age of Loco Pilots	Job Satisfaction	100	0.273	98	.01
Age of Loco Pilots	Perceived Org. Support	100	0.363	98	.01
Age of Loco Pilots	Job Stress.	100	-0.193	98	NS
Age of Loco Pilots	Work Life Balance	100	0.276	98	.01

In the factor wise analysis of correlation coefficient of age of pilots with perceived organizational support (r= 0.363, df=98, p<.01) was significantly positively correlated. The correlation coefficient of age of pilots with their job stress (r= - 0.193, df=98, NS) was negatively correlated. It means with the increase of age, the job stress was reduced or vice versa. Similarly the correlation coefficient of age of pilots with work life balance (r= 0.276, df=98, p<.01) was significantly positively correlated. It means with the increase of age, pilots learn to balance their life with the nature of work they do.

From the Table 3, it can be observed that the correlation coefficient between experience and job satisfaction of loco pilots was 0.236, which is more than the Table value at 0.05 level of confidence at 98 degree of freedom (r= 0.195, df=98 at .05 level)

Hence the hypothesis is rejected and interpreted that job satisfaction of pilots increases with the increase of experience of pilots.

Table No. 3: Correlation between the experience and job satisfaction of loco Pilots

Factor 1	Factor 2	Ν	r	df	Sign.
Experience of LP's	Job Satisfaction	100	0.236	98	.05
Experience of LP's	Perceived Org. Support	100	0.345	98	.01
Experience of LP's	Job Stress.	100	-0.180	98	NS
Experience of LP's	Work Life Balance	100	0.218	98	.05

In the factor wise analysis of correlation coefficient of experience of pilots with perceived organizational support (r= 0.345, df=98, p<.01) was significantly positively correlated. The correlation coefficient of experience of pilots with their job stress (r= -0.180, df=98, NS) was negatively correlated. It means with the increase of experience, the job stress was reduced or vice versa. Similarly the correlation coefficient of experience of pilots with work life balance (r= 0.218, df=98, p<.05) was significantly positively correlated. It means with the increase of experience, pilots below the positively correlated. It means with the increase of experience, pilots below to balance their life with the nature of work they do.

Major Findings

The research questions in this study were concerned with the level and percent of job satisfaction and factors contributing to it. These research questions were described by ten hypotheses. Following are the main findings of the study:

- About fifty five percent of loco pilots feel that their organization is supporting their affairs.
- Job stress was felt by fifty five percent of loco pilots.
- Fifty percent of loco pilots feel that they could manage the work life balance.
- The loco pilots of age group 40 and above feel more organizational support than that of their counter parts.
- There is no difference in the job stress of loco pilots of age group 40+years and below 40 years.
- There is no difference in the work life balance of loco pilots of age group 40+years and below 40 years.
- There is no difference in the job satisfaction level of loco pilots of age group 40+years and below 40 years.
- The loco pilots of group A with experience of 10 and above years feel more organizational support than that of their counter parts.
- There is no difference in the job stress of loco pilots with experience of 10 and above years and below 10 years.
- There is no difference in the work life balance of loco pilots with experience of 10 and above years and below 10 years.
- There is no difference in the job satisfaction of loco pilots with experience of 10 and above years and below 10 years.
- Job satisfaction increases with the increase of age of loco pilots.
- Job satisfaction of loco pilots increases with the increase of experience of pilots.

Suggestions

Following are the suggestions to improve upon the job satisfaction:

- More improvement sought on leave rules strategy especially for Loco Pilots.
- Priority in housing facility nearby the railway stations might reduce the effective time between two consecutive duty periods.
- Lack of toilet facility in engines makes their jobs more stressful, hence provision may be reintroduced.
- As the most of the loco pilots not satisfied with the food facility at running rooms, hence more focus on this issue may be fruitful.
- Loco Pilots work appraisal system may be developed so that good performance of individuals may be rewarded.
- In order to improve the work-life balance, get together programes for loco pilots may be arranged.
- In order to release the stress some moral supporting and counselling programes for the loco pilots may be organized.

Conclusion

About fifty five percent of loco pilots feel their organization is supporting their affairs and not so stressful. The loco pilots with more than 10 years of service were felt more organizational support than their counter parts and job satisfaction increases with increase in experience.

REFERENCES

- A. Olivo, E. Cecere, M. Coni, 1999. Relationship between the performance level of railway drivers and particular environmental variables. Department of Territorial Engineering, Transportation Section, University of Cagliari, Cagliari, Italy.
- Devesh Kumar, Jai Vir Singh, and Poonam S. Kharwar, 2011. Study of occupational stress among railway engine pilots. *Indian J of Occup Environ Med.* 2011 Jan-Apr; 15(1): 25–28. doi: 10.4103/0019-5278.83002. US National Library of Medicine National Institutes of Health.
- Eby, L.T., Casper, W.J., Lockwood, A., Bordeaux, C. and Brinley, A. 2005, Work and family research in IO/OB: content analysis and review of the literature (1980–2002) *Journal of Vocational Behavior*, Vol. 66 No. 1, pp. 124–197. doi:10.1016/j.jvb.2003.11.003
- Eisenberger, R., Fasolo, P., & Davis-LaMastro, V. 1990. Perceived organizational support and employee diligence, commitment and innovation. *Journal of Applied Psychology*, 75, 51–59.

- Eisenberger, R., Huntington, R., Hutchison, S., & Sowa, D. 1986. Does pay for performance increase or decrease perceived self-determination and intrinsic motivation? *Journal of Personality and Social Psychology*, 77: 1026-1040
- Gutek, B.A., Searle, S. and Klepa, L. 1991, Rational versus gender role explanations for work-family conflict, *Journal of Applied Psychology*, Vol. 76 No. 4, pp. 560– 568. doi:10.1037/0021-9010.76.4.560.
- Judge, T. A., Heller, D., & Mount, M. K. 2002. Five-factor model of personality and job satisfaction: A meta-analysis, *Journal of Applied Psychology*, 87 (3), 530-541.
- Kim Soonhee 2002. Organizational support of career development and job satisfaction Downloaded from rop.sagepub.com by guest on February 12, 2013
- Pandey Anirudh 1995. An empirical study on rail engine drivers of Indian Railways' Indian Journal of Industrial Relations, Shri Ram Centre for Industrial Relations and Human Resources.
- Ren-Tao Miao 2011. Perceived organizational support, job satisfaction, task performance and organizational citizenship behavior in China Institute of Behavioral and Applied Management.
- Shamir, B. 1983, Some antecedents of work-nonwork conflict, *Journal of Vocational Behavior*, Vol. 23 No. 1, pp. 98–111. doi:10.1016/0001-8791(83)90062-3
- Shore, L.M. and Shore, T.H. 1995, Perceived organizational support and organizational justice, in Cropanzano, R.S. and Kacmar, K.M. (Eds), organizational politics, justice, and support: managing the social climate of the workplace, Quorum, Westport, CT, pp. 149-64.
- Staines, G.L. and Pleck, J.H. 1984, Nonstandard work schedules and family life Journal of Applied Psychology, Vol. 69 No. 3, pp. 515–523. doi:10.1037/0021-9010.69.3.515
- Vanderberg, R.J. and Lance, Ch.E. 1992. Examining the causal order of job satisfaction and organizational commitments, *Journal of Management*, Vol.18, No.1, pp. 153-167

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