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SELF-EFFICACY AS A CONTROL MEASURE FOR ATTRITION INTENT: AN EMPIRICAL ASSESSMENT

Anju Verma*, Brij Sharma**

Abstract *The present study seeks to examine the control measures for the attrition intent. A total of 782 employees from various pharmaceutical companies scattered well in Delhi (including National Capital Region) and Haryana were considered for the study which is based on primary data. Structural equation modelling (SEM) has been used to analyse the data. SEM shows that self-efficacy has positive and significant effect on attrition intent and is able to minimise attrition intent. Hence, self-efficacy comes out as control measure for attrition intent for the employees of Indian Pharmaceutical Industry. The present study contributes the existing literature by highlighting the role of self-efficacy in reducing attrition intents among employees. High self-efficacy will lead to decrease the attrition intents among the employees of skill-based businesses.*

Keywords: *Self-Efficacy, Pharmaceutical Industry, Attrition Intent, Control Measure, Structural Equation Modelling*

INTRODUCTION

Talented and highly innovative employees are in great demand in research driven pharmaceutical companies and such employees are blessed with abundance of opportunities in the competitive market. They are the source of ideas, but are most hit by attrition. The literature also describes that pharmaceutical industry is research driven industry and the personnel working in this industry are found psychologically strong. They have belief in their abilities of taking on any challenge and perform well for a given task. This belief comes from self-efficacy (Bandura, 1986). Thus, it can be said that self-efficacy is one of the important construct for the individuals working in such a competitive environment. Self-efficacy is an individual's belief that an individual is capable of performing a particular assigned task successfully (Bandura, 1977; Bandura & Adams, 1977).

Self-efficacy is a kind of self-confidence (Kanter, 2006) or a task specific version of self-esteem (Brockner, 1988). It has powerful effects on learning, motivation and performance. Because people try to learn and perform only those tasks that they believe they will be able to perform successfully. Wood & Bandura (1989) proposed a persuasive discussion concluding that high level self-efficacy will raise the personal performance. Self-efficacy grows with the passage of time. A person who has high self-efficacy will look forward to being better than other colleagues, set high standards and expect the better performance than others.

LITERATURE REVIEW

For in-depth insight of current problem, existing literature has been extensively reviewed and segregated on the basis of variables taken for the present study.

Self-Efficacy: Concept and Implications on Organisations

Bandura (1986) concluded that self-efficacy is the core of individual success, a motivational force of human action. Stress, tension, anxiety, and low mood undermine self-efficacy whereas positive mood, energy and enthusiasm intensify it. Bandura (1977), Bandura and Adams (1977), and Locke, Frederick, Lee, and Bobko (1984) studied that there is a significant correlations between self-efficacy and subsequent task performances. Gist (1987) examined the implications of self-efficacy on organisational behaviour and human resource management, and also found high correlation between efficacy perceptions and employee selection, organisational leadership, training and vocational counselling of employees, locus of control, performance appraisal, goal settings, incentives and future performance of individual. Furthermore, increasing self or collective efficacy in the absence of learning can lead to overconfidence (Lindsley, Brass, D., & Thomas, 1995). Hill, Smith, and

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Mann (1987) researched that employee who feels capable of performing a particular task is highly efficacious and will cope more effectively with change. Judge and Bono (2001) found that self-efficacy along with other traits like general high self-esteem has positive effect on job satisfaction and job performance. Hurter (2008) concluded that such a confident approach produces personal accomplishments; affect life choices, motivation level, quality of work, resilience of adversity and vulnerability to stress and depression. Rigotti, Schyns, and Mohr (2008) found correlation between occupational self-efficacy and satisfaction, and commitment with job. Hashmi and Ghanizadeh (2011) found a positive association between emotional intelligence and self-efficacy beliefs. Emotional intelligence tends to enhance their belief in their efficacies to organise and execute the courses of action required for successful performance. Verma and Sharma (2013) in their study validated the self-efficacy scale on the employees of all hierarchies in the departments of marketing, R&D and production in pharmaceutical companies in India.

Attrition Intent: Causes

Maslow (1954) in his need-hierarchy theory of motivation introduced the concept of social needs. An employee in his organisation looks toward his superiors, subordinates and peer group to satisfy his social need or for social support. Studies have found social support to play an important role in mitigating intentions to quit. Herzberg (1966) in his two-factor theory of motivation; mentioned the factors such as achievement, recognition, work, responsibility, possibility of advancement, salary, possibility of growth, job security, interpersonal relationship, technical supervision, agreement with company policy, administration, work condition and personal life that impacts job satisfaction. This in turn influences an employee's intentions to stay or quit his organisation. Wai, Teresa, and Robinson (1998) and Price and Mueller (1986) concluded that non-managerial employees are more likely to quit than managerial employees. Hendrix, Robbins, Miller, and Summers (1998) and Hom, Griffeth, and Sellaro (1984) found that organisational justice also plays an important role in quitting intention of an employee. In fact, Fields, Pang, and Chiu (2000) found distributive justice to have a significant effect on the employees quitting intentions. Additionally, Cohen and Spector (2001) and Dailey and Kirk (1992) examined that procedural justice is negatively related to actual turnover. However, Loi, Hang-Yue, and Foley (2006) in their studies indicated contrary to be true, that negative relationship exists between turnover intention and both procedural and distributional justice. Another study (Elanain, 2010) disclosed that the perception of organisational justice has an influence on work outcomes. A low degree of turnover intention was observed on employees who showed positive feelings towards procedural and distributive justice.

Literature reviews provides linkages between self-efficacy and a number of activities of organisations which have been treated as antecedents. This construct is well-established and has a proven record of association and effects on the organisational environment. Since 'attrition' is drawing attention in several areas of research nowadays, the literature review suggests that self-efficacy can be hypothesised as a tool to minimise attrition intents among employees. Therefore, the above study is designed to fill the said gap and provide empirical base that can contribute to understand better the implications of self-efficacy on attrition intents among employees in Indian pharmaceutical companies.

RESEARCH FRAMEWORK

Employee attrition is a big concern for the pharmaceutical organisations. In order to identify the main causes for attrition; some human factors like motivation, self-confidence, behaviour, self-esteem, efficacy (positive factors), stress, anxiety, overconfidence, over-aspirations, less enthusiasm, tension (negative factors) etc. and their effect on individual as well as organisation is studied. Positive human factors strengthen self-efficacy whereas negative human factors undermine it. It is also perceived from literature review that self-efficacy is helpful to reduce the attrition intent among employees. To make this relationship clearer, the present study is conducted with following objective:

- to examine the implications of self-efficacy for employee attrition in Indian Pharmaceutical companies.

In order to achieve the above said objective, following null hypothesis is set:

- **H_{01}:** Self-efficacy is not a control measure for employee attrition of Pharmaceutical companies in India.

In order to examine the implications of self-efficacy for employee attrition, the Cronbach's alpha has been used to check reliability and afterwards exploratory factor analysis (EFA) and confirmatory factor analysis (CFA) are used to determine the factors and confirm the factors for the data. Structural equation modelling (SEM) is applied to extract the causal relationship between self-efficacy and attrition intent with the help of 782 employees working at various hierarchical levels and in three departments (after extensive literature review) of the pharmaceutical companies (R&D, production and marketing) located in Delhi-NCR and Haryana. Data was collected with the help of questionnaire which comprises three segments. Segment one was devoted to respondents' personal profile; second segment of questionnaire was having the items of self-efficacy, and the last segment was containing the items of attrition intent.

The self-efficacy scale developed by Schwarzer and Jerusalem (1995) is used in the present study. Seven dimensions of

attrition intent used for current study have been adopted from the study conducted by Khatri, Budhwar, and Fern (1999). These seven dimensions are given as: satisfaction with pay (adopted from Index of Organisational Reactions Questionnaire; Smith, 1976), satisfaction with nature of work (Minnesota Satisfaction Questionnaire; Weiss, Dawis, England, & Lofquist, 1967), satisfaction with supervision (Index of Organisational Reactions Questionnaire; Smith, 1976), organisational commitment (Porter, Steers, Mowday, & Boulian, 1974), justice environment (Magner, Johnson, & Elfrink, 1994; Folger & Greenberg, 1989), turnover intensions (Cammann, Fichman, Jenkins, & Klesh, 1979; Khatri *et al.*, 1999), and perceived alternative employment opportunities (Mowday, Koberg, & McArthur, 1984; Billings & Wemmems, 1983; Arnold & Feldman, 1982; Michaels & Spector, 1982).

DATA ANALYSIS AND INTERPRETATION

A total of 782 respondents have been contacted during the study and gathered information is segregated on the basis of their demographic features like gender, age, experience, department, and designation in the organisation. The levels of the senior, middle and junior employees are segregated on the basis of the designations mentioned by the respondents in the questionnaire.

Table 1: Respondents' Profile

Demographic Variables		Frequency	Percentage
Gender	Male	710	90.8
	Female	72	9.2
	Total	782	100.0
Age of Respondents (in Years)	20-29 Years	601	76.8
	30-39 Years	146	18.7
	40 Years and above	35	4.5
	Total	782	100.0
Experience of Respondents (in Years)	1- 2 Years	257	32.9
	3- 4 Years	214	27.4
	5- 6 Years	122	15.6
	7 years and above	189	24.1
	Total	782	100.0
Departments	Production	418	53.5
	Marketing	281	35.9
	R&D	83	10.6
	Total	782	100.0
Designations	Senior Level	192	24.6
	Middle Level	325	41.6
	Junior Level	265	33.9
	Total	782	100.0

Source: Primary data

The sample presented in Table 1 is made up of majority of male respondents (90.8 per cent) whereas female respondents constitute 9.2 per cent of the whole data. Majority of the respondents are in the age group of 20-30 years (76.9 per cent) which means that the sample is led by young generation respondents followed by 18.7 per cent respondents from 30-40 years of age group. There are only 4.5 per cent respondents from 40 and above year's age group. As far as department is concerned, majority of the respondents are from production department (53.5 per cent) followed by respondents from marketing department (35.9 per cent). Most of the respondents belong to middle level management (41.6 per cent) followed by junior level management.

Factor Determination of Self-Efficacy

The factors of self-efficacy are presented in Table 2. Factor analysis is used to determine factors of self-efficacy using principal components method of factor extraction with varimax rotation. The basis for factors extraction is kept as the Eigen value of 1.0 and factor loading above 0.5 is only considered. Principal component analysis extracted three factors explaining approximately 51.33 per cent of variance. In social sciences studies, 50 per cent of variance explained is considered to be adequate and can be taken ahead for further research (Zenk & Eckhardt, 1970). Communalities section presents the proportion of variance in each variable commuted by the common factor.

Table 2: Latent Factors Determination of Self-Efficacy Using Principle Component Analysis

Factor and Variables for Self-efficacy		Factor loading	Communalities	% of Variance	Cumulative %	Mean	Rank
(1) Persistence Cronbach's Alpha = 0.643				21.470	21.470	4.040	3
When I am confronted with a problem, I can usually find several solutions. (Q 8)		0.741	0.515				
If I am in trouble, I can usually think of a solution. (Q 9)		0.674	0.446				
I can usually handle whatever comes my way. (Q 10)		0.635	0.478				
I can remain calm when facing difficulties because I can rely on my coping abilities. (Q 7)		0.599	0.413				
(2) Self-determination Cronbach's Alpha = 0.413				16.097	37.567	4.049	2
It is easy for me to stick to my aims and accomplish my goals. (Q 3)		0.812	0.418				
I am confident that I could deal efficiently with unexpected events. (Q 4)		0.609	0.362				
(3) Self-reliance Cronbach's Alpha = 0.504				13.771	51.337	4.179	1
I can always manage to solve difficult problems if I try hard enough. (Q 1)		0.795	0.437				
If someone opposes me, I can find the means and ways to get what I want. (Q 2)		0.608	0.431				
I can solve most problems if I invest the necessary effort. (Q6)		0.550	0.387				
Kaiser-Meyer- Olkin measure of sampling adequacy.		0.819					
Bartlett's test of sphericity	Approx. chi-square	1.156E3					
	Sig.	0.000					

Extraction Method: Principal Component Analysis.
Rotation Method: Varimax with Kaiser Normalisation.
Source: Primary data

The principal method of factor extraction helps to withdraw as many factors as there are variables. Total three factors are extracted namely; 'persistence' (reliability coefficient which is 0.643 and is highly satisfactory and the factor loading of all the statements are also high showing the high correlation between the four variables written to measure self-efficacy), 'self-determination' with alpha value (0.413), and 'self-reliance' with significant amount of alpha reliability (0.504).

Model Identification for Self-Efficacy Scale

The degree of freedom for self-efficacy for model identification issues is presented in Table 3. Model identification issue deals with whether there is enough information available to identify a solution to a set of equations. It is calculated as p (p + 1) / 2 where p is the observed variables (Byrne, 2010). One degree of freedom (df) is then used/ lost for each parameter estimated (Hair, Black, Babin, Ralph, & Ronald, 2006).

Table 3: Computation of Degrees of Freedom for Self-Efficacy Model

Number of distinct sample moments:	6
Number of distinct parameters to be estimated:	6
Degrees of freedom (6 - 6):	0

Source: Primary data

Model identification information is provided by CFA in notes for model section of the output. Structural model could be of three types, under-identified, just-identified, or over-identified. In this study, we are having just-identified model for self-efficacy. In just-identified model the number of data variances and covariance equals the number of parameters to be estimated (Byrne, 2006). Consequently, a just- identified model should have a perfect fit (Hair *et al.*, 2006). However, a just-identified model is not scientifically attractive because it has no degrees of freedom and for that reason can never be rejected (Byrne, 2006; Raykov & Marcoulides, 2006).

Because of this reason, the self-efficacy model can be used directly for the analysis purpose and no separate model fitting is required.

Self-Efficacy as a Control Measure for Attrition Intent (Self-Efficacy→ Attrition Intent) Using Structured Equation Modelling (SEM)

Confirmatory factor analysis (CFA) is used to confirm the extracted factors followed by structured equation modelling (SEM) to show the association between the confirmed factors. CFA is applied on the self-efficacy (latent variable) and attrition intent (latent variable) to know the causal relationship between self-efficacy and attrition intent. In the present study, the effect of self-efficacy (measured by the three observed variables of persistence, self-determination, and self-reliance) on attrition intent (measured by the five observed variables of mutual trust, justice environment, satisfaction with pay, satisfaction with nature of work and satisfaction with supervision) has been drawn. The regression model in Amos incorporating these two latent constructs and their respective measurement indicators are presented with statistical values are given in Fig. 1.

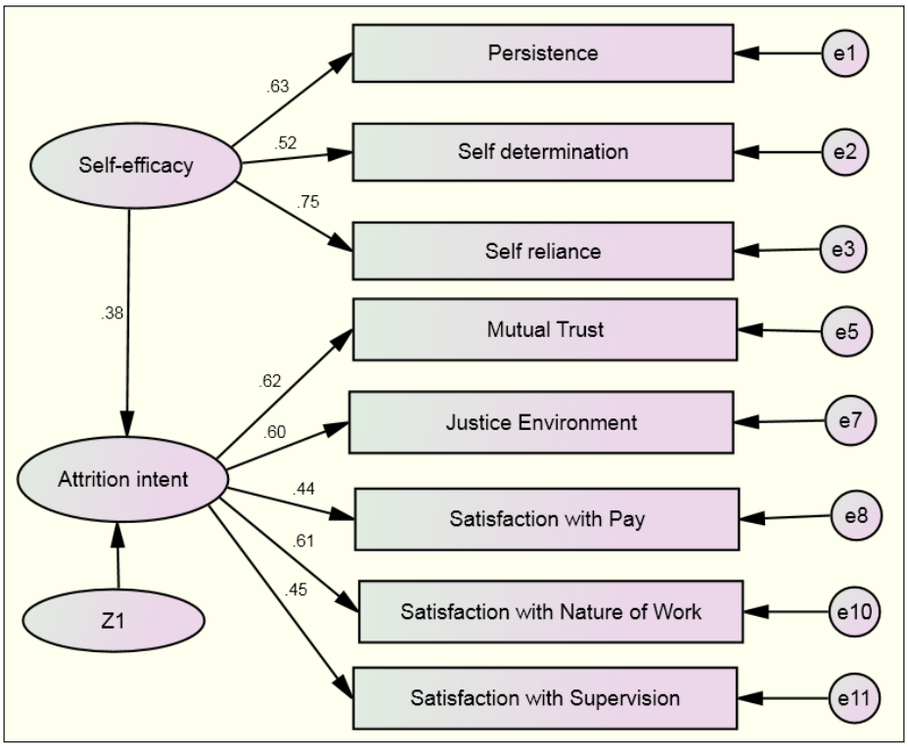

Fig. 1: Causal Relationship between Self-Efficacy and Attrition Intent

Source: Primary data

In Fig. 1, the factor loadings are shown on the arrows from the latent variable to the observed variables. The loadings on self-efficacy for the three dependent variables range from 0.63 (persistence) to 0.75 (self-reliance). The factor loadings on attrition intent for the five dependent variables range from 0.44 (satisfaction with pay) to 0.62 (mutual trust). All the variables are positively loaded on their respective latent variables. As it is not assumed that the extent of one's attrition intent will be perfectly predicted by one's self-efficacy, this dependent variable includes a residual error (Z1). For the model to be identified, it is required to fix the unit of measurement of each latent variable to unity.

Fit Comparison of Default and Nested Model

The fit statistics for the default model and modified model (nested) of causal relationship between self-efficacy and attrition intent are presented in Table 4.

Table 4: Fit Statistics Comparison of Default and Nested Model

Fit Statistics	DF	P	CMIN/ DF	RMR	TLI	CFI	GFI	RMSEA	P CLOSE
Default model chi-square= 65.0									
Values	19	0.000	3.423	0.020	0.929	0.952	0.979	0.056	0.244
Nested model chi-square = 36.4									
Values	18	0.006	2.020	0.015	0.970	0.981	0.983	0.036	0.907
Covariance Estimates	SE	0.018							
e10 <-> e11	CR	5.117*							

Note: *Significant at 0.05 per cent level

Source: Primary data

Chi-square value of default model of causal relationship among self-efficacy and attrition intent is 65.0. The RMSEA value is 0.056 which is more than 0.05. The values of CFI and GFI are quite satisfactory (0.952 and 0.979 respectively). But the value of TLI is below (0.929) than 0.95 required for a good fit. The value of the PCLOSE is also less than 0.5 which should be above for a good model fit.

Nested Model Revised Through Modification Indices

Table 5: Modification Indices

Factors	M.I.	Par Change
e10 <--> e11	22.269	0.072
e8 <--> e11	11.470	-0.081
e7 <--> e10	5.511	-0.027
e7 <--> e8	7.083	0.048

Source: Primary data

The revised model through modification indices is presented in Table 5. This shows that this model does not fit well for the given data. There is need to improve the model. Examining the modification indices (MI) suggests adding covariance estimates between the residual error (e10 <--> e11) which is also significant ($p < 0.05$). This covariance is added due to the high MI (22.269 at 0.072 par change) between errors of the factors e10 (satisfaction with nature of work) and e11 (satisfaction with supervision).

Nested Model Description (Self-efficacy→ Attrition Intent)

The model evaluates how self-efficacy predicts the extent of support for attrition intent is presented by figure 2.

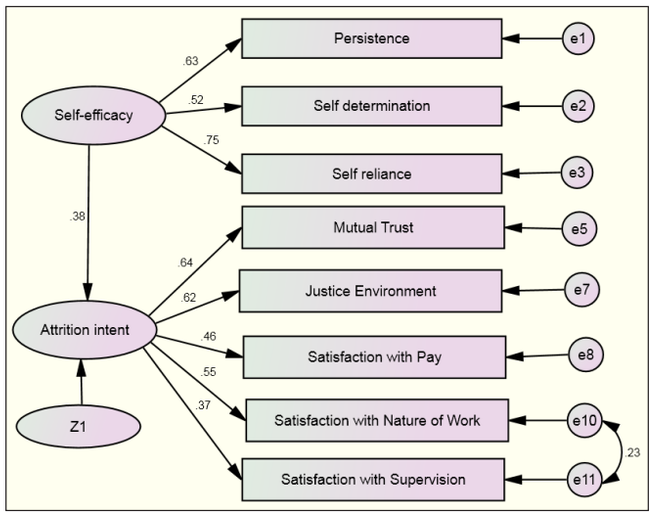

Fig. 2: Causal Relationship between Self-Efficacy and Attrition Intent

Source: Primary data

As it is not assumed that the extent of one's attrition intent will be perfectly predicted by one's self-efficacy, this dependent variable includes a residual error (Z1). For the model to be identified, it is required to fix the unit of measurement of each latent variable to unity. Self-efficacy is predictive of greater attrition intent (standardised coefficient= 0.38). The factor loadings are shown on the arrows from the latent variables to the observed variables. The loadings on self-efficacy for the three variables range from 0.62 (self-determination) to 0.75 (persistence). It can be said that persistence (β= 0.75) is most important factor in self-efficacy construct which can be enhanced to lower the attrition intent in the organisation.

The second and third important factors are self-reliance (β= 0.64) and self-determination (β= 0.62). The loadings for the five variables for attrition intent range from 0.37 (satisfaction with supervision) to 0.64 (mutual trust). The loading for the factor satisfaction with supervision on attrition intent is low

(0.37) and is below the specified limit (0.40). Theoretically, this should be deleted from the model as it could cause a poor model fit, but deletion of this factor from the model gives extreme values. Thus, it can be said that this factor is somewhat necessary for latent variable of attrition intent and model fit when evaluated with the self-efficacy construct. The loadings of all the variables for their respective factors are positively significant ($p < 0.05$).

Fit Comparison between Default and Nested Model after Revision

A comparison can be done between the original (default) and modified (nested) model as both models are based on the same data set and have different degree of freedom. Chi-square test can be used to test the significance of the nested model over default model. The smaller chi-square value may be subtracted from the larger one to conduct this test. Chi-square value of the default model is 65.0 and for the nested model is 36.4 (Table 4). The difference between the two chi-square values equals 28.6 (65-36.4= 28.6). Now finding the difference between the degree of freedom for both the models (i.e., df for the default model and df for the nested model). The difference is 19-18= 1. Now using the table of critical values for chi-square, the critical value for a 1 df test is 3.84 (at 0.05 per cent). Therefore, as our obtained value of the chi-square difference between the default model and nested model (28.6) is greater than 3.84, it can be concluded that the change in the default model resulted in a significant ($p < 0.05$) improvement in model fit.

Model Evaluation and Hypothesis Testing

Table 6: Path Coefficients of the Measurement Model (Self-Efficacy→ Attrition Intent)

Latent Variables	Regression Weights					
	Relationship between Self-efficacy and Attrition Intent			**S.E.**	**C.R.**	**Standardised Estimates (β)**
	Attrition Intent	**<--**	**Self-efficacy**	**0.065**	**5.655***	**0.381**
Attrition Intent	Satisfaction with Supervision (Factor15)			Parameters Fixed to 1		0.365
	Satisfaction with Nature of Work (Factor14)			0.152	8.398*	0.547
	Satisfaction with Pay (Factor12)			0.230	6.884*	0.465
	Justice Environment (Factor11)			0.185	7.501*	0.625
	Mutual Trust (Factor9)			0.195	7.522*	0.640
Self-efficacy	Self-reliance (Factor3)			Parameters Fixed to 1		0.640
	Self-determination (Factor2)			0.216	6.071*	0.621
	Persistence (Factor1)			0.227	6.344*	0.747

Note: *Significant at 0.05 per cent level
Source: Primary data

The confirmation of model and hypothesis through path analysis are presented in Table 6. The results indicate that the standardised estimates are all significant by the critical ratio test ($> \pm 1.96$, $p < 0.05$), except for those parameters fixed to 1 (satisfaction with supervision and self-reliance) which indicates that all the estimates are statistically different from zero, and evident that the null hypothesis can-not be accepted. It is evidently proved that self-efficacy minimises the attrition intent among the employees of pharmaceutical companies in India. Hence, self-efficacy act as control measures for attrition intent among employees.

In the standardised estimates (β) column, the results indicate that the self-efficacy is related to the attrition intent in a statistically significant way (Standardised regression weights: $\beta = 0.381$, $p < 0.05$) and self-efficacy is a predictor of employee attrition intent. It can be said that attrition intent is 38 per cent explained by self-efficacy. Rest of the 62 per cent of the variance is explained by residual error (Z1). More specifically, the path coefficients from each latent construct to the observed variable is significant and the standardised regression weights range from 0.36 to 0.62, which supports the validity and reliability of the items. It is concluded that self-efficacy is a cause of attrition intent because there is a positive and significant influence of self-efficacy on attrition intent; hence the null hypothesis that self-efficacy is not a control measure for employee attrition of pharmaceutical companies in India, is hereby not accepted.

Standard regression weights (β) are standardised coefficients estimates, and are independent of the units in which all variables are measured. These standardised coefficients allow the researcher to compare directly the relative relationship between each independent variable and the dependent variable. It can be further noted that the standardised regression weight (β) on the all factors are both significant and positively related to attrition intent i.e. factor 9 (mutual trust, β= 0.640), factor 11 (justice environment, β= 0.625), factor 12 (satisfaction with pay, β= 0.465), factor 14 (satisfaction with nature of work, β= 0.547), and factor 15 (satisfaction with supervision, β= 0.365). Thus, it can be concluded that factor 9 (mutual trust) is more important factor for attrition intent as the β value (0.640) is higher than other factors. Furthermore, factor 11 (justice environment, β= 0.625) is the next important variable of employee attrition.

Similarly, factor 14 (satisfaction with nature of work) got the third highest standardised regression weight (β= 0.547) which is having the third highest mean value in the factor analysis. This is also most crucial factor of employee attrition which can be checked at times. Factor 12 (satisfaction with pay, β= 0.465) and factor 15 (satisfaction with supervision, β= 0.365) are also pivotal for the attrition intent. As far as self-efficacy is concerned, factor 1 (persistence, β= 0.747) is the most important variable which describes self-efficacy well. Factor 3 (self-reliance, β= 0.640) is the second best representing variable for self-efficacy. Factor 2 (self-determination, β= 0.621) is the last good defining variable for self-efficacy.

CONCLUSION AND MANAGERIAL IMPLICATIONS OF THE STUDY

From the data analysis and interpretation, it is concluded that total three factors of self-efficacy are extracted using exploratory factor analysis. These factors are persistence, self-determination, and self-reliance (factor 1, 2, and 3 respectively). Mean rank is used for describing the order of these factors. Self-reliance came out as most preferred factor of self-efficacy followed by self-determination (at order 2) and persistence (at order 3) (ref. Table 2). These extracted factors are then confirmed by applying confirmatory factor analysis (CFA). Afterwards, the effect of self-efficacy on attrition intent has been drawn using SEM. Fit statistics for nested and default model (Tables 4, 5, and 6) stated that the model fits well as the values for absolute fit measures are appropriate (ref. Table 7 in Appendix 1). The results of SEM shows that persistence (β= 0.747) came out as most important factor in self-efficacy construct which lowers the attrition intent among the employees followed by second and third important factors which are self-reliance (β= 0.64) and self-determination (β= 0.62) (ref. Table 6). Mutual trust came out as most important factor for attrition intent (β value is 0.640) than other factors. Furthermore, justice environment (β= 0.625) and satisfaction with nature of work (β= 0.547) came out as second and third important factors respectively. If mutual trust, justice environment and satisfaction with nature of work are increasing, it will help to reduce the attrition intent. Persistence, self-reliance, and self-determination help to increase mutual trust, justice environment and satisfaction with nature of work. Ultimately results in reduced attrition intents. It is evident from the data analysis that the self-efficacy is related to the attrition intent in a statistically significant way (standardised regression weights: $\beta = 0.381$, $p < 0.05$) and self-efficacy evidently is a predictor of employee attrition intent.

Pharmaceutical industry is the industry where competent, skilled and highly research oriented human resources are required to have a cutting edge over the competitor. Retention of the talent is the most tedious task for the human resource managers. Due to the extreme competition in the industry, job hopping and poaching comes into picture and this leads to the higher attrition rate in the industry. Keeping in view, the dearth of competent employees in Indian pharmaceutical industry across all functional departments, it is important to understand the factors which are responsible for the employee attrition in the organisation. This study is primarily focused on the individual factors such as self-efficacy and their role in employee attrition in the industry.

It is evident from the analysis that self-efficacy and attrition intent has a causal relationship. It means attrition intent is controlled by self-efficacy as it is significantly regressed on attrition intent. Thus, if the pharmaceutical organisations do not offer challenges to a high efficacious individual, he would seek another challenging job for himself. Similarly, an individual with low self-efficacy would seek comparatively easier task and avoid difficult one. At any stage, an individual with low self-efficacy believes that he would not be able to perform well under pressure in the organisation or cannot accomplish an assigned task, would leave. It can therefore be concluded that a balance between the individual and his self-efficacy belief should be maintained. Furthermore, self-efficacy can be enhanced with increase in persistence in the organisation. Attrition intent can be minimised by inculcating mutual trust among employees as well as between pharmaceutical organisations.

FUTURE RESEARCH SCOPE

The present study provides some new insights and directions for the future researches. As this research is limited to small geographical area, an elaborated study can be conducted on a larger geographical area to generalise the results of the study. Further studies can be conducted to find out the strategies to develop self-efficacy in the employees of the organisation. More robust studies can be carried out in order

to study the role of self-efficacy in minimising attrition intent among the employees of different skill based organisations. The influence of other psychological factors (locus of control) as well as organisational factors (organisational efficacy, organisational climate, organisational culture etc.) on attrition intents can be examined.

REFERENCES

Arbuckle, J. L. (2008). *Amos 17.0 user's guide*. USA: Amos Development Corporation.

Arnold, H. J., & Feldman, D. C. (1982). A multivariate analysis of the determinants of job turnover. *Journal of Applied Psychology*, *67*(3), 350-360.

Bandura, A., (1977). Self-efficacy: Toward a unifying theory of behavioural change. *Psychological Review*, *84*(2), 191-215.

Bandura, A. (1986). S*elf-efficacy beliefs in human functioning:* S*ocial foundation of thought and action*. (Englewood Cliffs, Prentice Hall).

Bandura, A., & Adams, N. E. (1977). Analysis of self-efficacy theory of behavioural change. *Cognitive Therapy and Research*, *1*(4), 287-31.

Billings, R., & Wemmems, V. (1983). *The role of alternatives in process models of withdrawal.* Proceedings of the 26th Annual Conference of the Midwestern, Academy of Management.

Brockner, J. (1988). *Self-esteem at work*. Lexington. MA: Lexington Books.

Byrne, B. M. (2006). *Structural equation modelling with EQS: Basic concepts, applications and programming*. Mahwah, NJ: Erlbaum.

Byrne, B. M. (2010). *Structural equation modelling: Basic concepts, applications and programming*. London: Lawrence Erlbaum Associates.

Cammann, C., Fichman, M., Jenkins, D., & Klesh, J. (1979). *The Michigan organisational assessment questionnaire.* Unpublished Manuscript, University of Michigan, Ann Arbor, Michigan.

Chow, W., & Chan, L. (2008). Social network, social trust and shared goals in organisational knowledge sharing. *Information and Management, 45*(7), 458-465.

Cohen, C. Y., & Spector, P. E. (2001). The role of justice in organisations: A meta-analysis. *Organisational Behaviour and Human Decision Process*, *86,* 278-321.

Dailey, R. C., & Kirk, D. J. (1992). Distributive and procedural justice as antecedents of job dissatisfaction and intent to leave. *Human Relations*, *45,* 305-317.

Elanain, A. M. H. (2010). Testing the direct and indirect relationship between organisational justice and work outcomes in a non-western context of the UAE. *Journal of Management Development*, *29*(1). 05-27.

Fields, D., Pang, M., & Chiu, C. (2000). Distributive and procedural justice as predictors of employee outcomes in Hong Kong. *Journal of Organisational Behaviour, 21,* 547-562.

Folger, R. & Greenberg, J. (1989). Procedural justice: An interpretative analysis of personnel systems. *Research in Personnel and Human Resources Management*, *3,* 141-183.

Gist, M. E. (1987). Self-efficacy: Implication for organisational behaviour and human resource management. *Academy of Management Review*, *12*(3). 472-485.

Hair, J. F., Black, B., Babin, B., Ralph, A., & Ronald, T. (2006). *Multivariate data analysis* (6th ed.). London: Prentice-Hall.

Harrington, D. (2009). *Confirmatory factor analysis*, New York: Oxford University Press.

Hashmi, M. R., & Ghanizadeh, A. (2011). Emotional intelligence and self-efficacy: A case of Iranian EFL University students. *International Journal of Linguistics*, 3 (1). 1-16.

Hendrix, W. H., Robbins, T., Miller, J., & Summers, T. P. (1998). Effects of procedural and distributive justice on factors predictive of turnover. *Journal of Social Behaviour and Personality*, *13,* 611-632.

Herzberg, F (1966). *Work and nature of man*. (The World Publishing Company. New York).

Hill, T., Smith, N. D., & Mann, M. F. (1987). Role of efficacy expectations in predicting the decision to use advanced technologies: The case of computers. *Journal of Applied Psychology*, *72,* 307-313.

Hom, P. W., Griffeth, R. W., & Sellaro, C. L. (1984). The validity of Mobley's (1977) model of employee turnover. *Organisational Behaviour and Human Decision Processes*, *34,* 141-174.

Hurter, N. (2008). *The role of self-efficacy in employee commitment*. Unpublished Thesis, University of South Africa, South Africa.

Judge, T. A., & Bono, J. E. (2001). Relationship of core self-evaluation traits: Self-esteem, generalized self-efficacy, locus of control and emotional stability: A meta analysis. *Journal of Applied Psychology*, *86*(1), 80-92.

Kanter, R. M. (2006). *Confidence: How winning and losing streaks begin and end*. (New York. NY: Crown Publishing).

Khatri, N., Budhwar, P., & Fern, C. T. (1999). *Employee turnover: Bad attitude or poor management.* Singapore: Nanyang Technological University, http://www. ntu. edu. sg/nbs/sabre/working_papers/12-99. Pdf (Retrieved on 22 June, 2012).

Lindsley, D., Brass, D., & Thomas, J. (1995). Efficacy-performance spirals: a multilevel perspective. *The Academy of Management Review, 20*(3), 645-678.

Locke, E. A., Frederick, E., Lee, C., & Bobko, P. (1984). The effect of self-efficacy, goals and task strategies on task performance. *Journal of Applied Psychology*, *69*(2). 241-251.

Loi, R., Hang-Yue, N., & Foley, S. (2006). Linking employees' justice perceptions to organisational commitment and intention to leave: The mediating role of perceived organisational support. *Journal of Occupational and Organisational Psychology*, *79,* 101-120.

Magner, N., Johnson, G. G., & Elfrink, J (1994). Evidence on the relationship between procedural and distributive justice in performance appraisal and accounting faculty attitudes and performance. *Journal of Accounting Education*, *12*(4), 325-341.

Maslow, A. (1954). *Motivation and personality*. (Harper and Row. New York. NY).

Michaels, C. E., & Spector, P. E. (1982). Causes of employee turnover: A test of the Mobley, Griffeth, Hand and Meglino Model. *Journal of Applied Psychology*, *67,* 53-59.

Mowday, R. T., Koberg, C. S., & McArthur, A. W. (1984). The psychology of the withdrawal process: A cross-validational test of Mobley's intermediate linkages model of turnover in two samples. *Academy of Management Journal*, *27,* 79-94.

Porter, L. W., Steers, R. M., Mowday, R. T., & Boulian, P. V. (1974). Organisational commitment, job satisfaction and turnover among psychiatric technicians. *Journal of Applied Psychology*, *59,* 603-609.

Price, J. L., & Mueller, C. W. (1986). A causal model of turnover for nurses. *Academy of Management Journal*, *24,* 543-565.

Raykov, T., & Marcoulides, G. A. (2006). On hierarchical linear model reliability estimation from the perspective of structural equation modeling. *Structural Equation Modeling*, *13*(1), 130-141.

Rigotti, T., Schyns, B., & Mohr, G (2008). A short version of the occupational self-efficacy scale: Structural and construct validity across five countries. *Journal of Career Assessment, 16,* 238-255.

Schumacker, R. E. & Lomax, R. G. (2010). *A beginner's guide to structural equation modelling*. London: The University of Alabama.

Schwarzer, R. & Jerusalem, M. (1995). Generalized self-efficacy scale. In J. Weinman. S. Wright and M. Johnston. *Measures in Health Psychology: A User's Portfolio, Causal and Control Beliefs,* Windsor, UK: NFER-NELSON.

Smith, F. J. (1976). Index of organisational reactions (IOR). *JSAS Catalogue of Selected Documents in Psychology*, *6*(1), 1265.

Tabachnick, B. G., & Fidell, L. S. (2007). *Using multivariate statistics* (5th ed.). USA: Pearson Education.

Verma, A., & Sharma, B. (2013). Construct validation of self-efficacy scale. *The IUP Journal of Soft Skills, 7*(4), 15-26.

Wai, C., Teresa, T., & Robinson, C. D. (1998). Reducing staff turnover: A case study of dialysis facilities. *Health Care Management Review*, *23*(4), 21-42.

Weiss, D. J., Dawis, R. V., England, G. W., & Lofquist, L. H. (1967). *Manual for the Minnesota satisfaction questionnaire: Minnesota studies in vocational rehabilitations.* Minneapolis: Industrial Relations Center, University of Minnesota.

Wood, R. E., & Bandura, A. (1989). Impact of conception of ability on self regulatory mechanisms and complex decision making. *Journal of Personality and Social Psychology*, *56*(3), 407-415.

Zenk, G. K., & Eckhardt, W. (1970). Comment on militarism, personality and other social attitudes. *The Journal of Conflict Resolution*, *14*(1), 121-124.

APPENDIX 1

Table 7: Recommended Cut-off Values for SEM Fit Indices

Fit Indices	Cut off Values from Literature	References
Absolute Fit Measure		Byrne (2010); Hair *et al*. (2006); Raykov and Marcoulides (2006); Tabachnic and Fidell (2007); Arbuckle (2008); Chow and Chan (2008); Harrington (2009); Schumacker and Lomax (2010).
CMIN/DF	1-2, Sometimes 1-5	
RMR	$\leq 0.05, \leq 0.08$	
RMSEA	$\leq 0.05, \leq 0.08$	
Incremental Fit Measures		
CFI	≥ 0.90	
TLI	≥ 0.90	
GFI	≥ 0.90	

Source: Literature Review