American Journal of Applied Sciences 10 (12): 1546-1552, 2013

ISSN: 1546-9239

© 2013 R. Muthuveloo et al., This open access article is distributed under a Creative Commons Attribution

(CC-BY) 3.0 license

doi:10.3844/ajassp.2013.1546.1552 Published Online 10 (12) 2013 (http://www.thescipub.com/ajas.toc)

# **Antecedents of Employee Engagement in the Manufacturing Sector**

<sup>1</sup>Rajendran Muthuveloo, <sup>1</sup>Ola Khalil Basbous, <sup>1</sup>Teoh Ai Ping and <sup>2</sup>Choi Sang Long

<sup>1</sup>Graduate School of Business, Universiti Sains Malaysia, Penang, Malaysia <sup>2</sup>Faculty of Management and HRD, Universiti Teknologi Malaysia, Malaysia

Received 2013-07-21, Revised 2013-10-04; Accepted 2013-10-23

#### **ABSTRACT**

The purpose of this study is to find the antecedents that influence employee engagement, as the organizational performance deteriorated due to high turnover and related issues such as high absenteeism, low loyalty and productivity. This exploratory research was conducted among employee working in manufacturing sector to test the relationship between the antecedents comprising of employee communication, employee development, reward and recognition and extended employee care. The data was gathered through structured questionnaire. The researcher used statistical inference, more precisely Multiple Regression to test the relationship between variables. The result indicates that there is a significant relationship between antecedents comprising of employee communication, employee development, reward and recognition and extended employee care. Among the antecedents, employee development forms the most significant contributor. This study was based on manufacturing companies in general, hence the attributes unique to a particular industry within manufacturing cannot be uncovered. The data for this research though structured questionnaire was collected directly from employees working in various manufacturing sector across Penang, Malaysia. It provides the first hand information on relationship between Antecedents and Employee engagement.

**Keywords:** Employee Engagement, Employee Communication, Employee Development, Reward and Recognition, Extended Employee Care

## 1. INTRODUCTION

Employee engagement has materialized as a serious driver of business success in today's competitive market. Further, employee engagement can be a determining aspect in structural success. Not only does engagement have the prospective to considerably affect employee retention, output and allegiance, it is also a vital link to customer satisfaction, company reputation and overall stakeholder value.

Recently there has been a vast concern to engage employee. A lot have claim that employee engagement expect employee outcomes, financial performance and organizational success (Bates, 2004; Baumruk, 2004; Harter *et al.*, 2002; Richman, 2006). Moreover employees who are engaged are more likely to stay with

their current organization and commit to their organization (Ramsay and Finney, 2006).

Apparently, employees who are not engaged will affect the organizational performance through higher absenteeism, higher turnover and lower productivity, recruitment and training cost. With the current worldwide economics falling, management is zooming into organization efficiency and diminishing the operating cost in order to be sustainable in the marketplace. On the other hand, high level of employee engagement helps the organization to focus in attracting new talent in labor market Vance (2006).

# 2. PROBLEM STATEMENT

Over the past 25 years, the great changes in the global economic have had important implications for

Corresponding Author: Rajendran Muthuveloo, Graduate School of Business, Universiti Sains Malaysia, Penang, Malaysia



organizational commitment (Muthuveloo and Che Rose, 2005) and relationship between employees and employers as well as employee engagement. Employees realize that they are not able to work for single employers until they retire. For this reason, employees have felt less commitment to their employers with reduced expectations of reciprocity Vance (2006). Previous study also higlighted the importance of personal characteristics and perceptions of the role, job organization and how these influence organizational commitment, which subsequently determines organizational outcomes (Muthuveloo and Che Rose, 2005). Moreover a consultant studies estimate that only 14-30% of the employees are engaged (Welbourne, 2007). Even though a flow of interest in developing engagement, people still until now disagree about what employee engagement is, how to get it and what it will look like when it achieved (Welbourne, 2007).

This study is important as it will provide insight information to organizations in developing strategies to enhance employee engagement at various level of the organization. It will provide the elements that may affect employee engagement.

#### 3. LITERATURE REVIEW

#### 3.1. Employee Engagement

The CLC (2004) and Blessing (2013) define employee engagement as emphasise on cognitive connection among employee to work and subsequently behaviours that the employees express on job satisfaction and their effect on how difficult an employee is willing to work.

Some researcher focuses on the emotional attachments. Gubman (2004) and Bates (2004) defined employee engagement as an emotional attachment that the employee holds to their work, organization and manager. Baumruk (2004) support the emotional and cognitive approaches by defining engagement as the state that employees are emotionally committed.

While other focus on the outcomes of behaviour, Shaffer (2004) and Towers (2005) define engagement as willingness that the employee holds to spend optional effort on their job. Walker (2000) found that the emphasis on employee commitment is to keep employee staying with their company.

# 3.2. Type of Employees

There were three groups of employees according to Fleming *et al.* (2006). The first one is the "Engaged

Employee" who is ardent about his job, have a sense of personal responsibility and obligation to what they should do to their company. The second group of employee is the "Non Engaged Employees" those kind of employee do not have energy during performing their job. The third and last group is "Actively Disengaged Employees" those employee are unhappy with their job and always trying to let everyone know that, in addition they keep trying to make those engaged employee disengaged.

#### 3.3. Social Exchange Theory (SET)

The social exchange theory SET offers a theoretical basis to explain why employees choose to become more or less engaged in their job. SET contends that responsibilities are generated through a series of interactions between parties who are in a state of joint interdependence. A basic tenet of SET is that relationships grow over time into trusting, loyal and mutual pledges as long as the parties stand by certain "rules" of exchange. Hence, one way for individual to repay their organization is through their level of engagement. That is, employees will decide to engage themselves in different level as an answer to the resources they obtain from their organization. Bringing oneself more fully into one's work parts and dedicating greater amounts of cognitive, emotional and physical resources is a very insightful way for individuals to respond to an organization's actions.

Hence, employee engagement consist a psychological and emotional connection between employees and their organization which could be turned into negative or positive behaviour at work.

# 3.4. Employee Communication Vs Employee Engagement

Good employee communication will help employee to understand their role and hence contribute to the organization success (Clampitt, 2009). The importance of employee communication in any organization has been proven when the CIPD survey reported that the most two significant drivers of employee engagement are having opportunity to feed upwards and keeping well-informed about what is happening in the organization.

It is very apparent that engagement starts with employees' clear understanding of what is happening in the organization (being informed). Employees should be kept well up-to-date about the alterations that touch their work groups so that they aren't disorganized or surprised when those variations are introduced.



# 3.5. Reward and Recognition Vs Employee Engagement

People like to be acknowledged for their exceptional offerings and contribution. Interestingly, even though a lot of organizations offer formal rewards and recognition programs for employee ideas and contributions, many employees are still ambitious for more day-to-day informal recognition (Bernthal *et al.*, 1999). Employees who sense they are listened to, supported and recognized for their contributions are expected to be more engaged (Bernthal *et al.*, 1999). The U.S. Department of Labor approves that absence of employee appreciation plays a serious role in employees' decisions to quit the job and leave their organizations (Bernthal *et al.*, 1999).

# 3.6. Employee Development Vs Employee Engagement

ASTD research established that employee desire opportunity to growth and advancement in their organization have a straight effect on engagement whereby 65% of the respondents answered that the "quality of training and learning opportunities" positively stimulate employee engagement to a high or very high extent-the sturdiest response of the survey. DDI's 2004 Selection Forecast study found that many employees quit their jobs for better growth and development opportunities, often presented by other organizations.

# 3.7. Extended Employee Care Vs Employee Engagement

Extended Employee Care is very important to achieve high level of employee engagement, thus improve the employee performance. Kahn (1990) found that there were three psychological conditions associated with engagement or disengagement at work: safety, meaningfulness and availability. That means were more engaged at work in situations that offered them more psychological safety and psychological meaningfulness and when they were more psychologically available. Also May *et al.* (2004) found that safety, meaningfulness and availability were strongly related to employee engagement.

#### 3.8. Dependent Variable

The dependent variable in this study is employee engagement. The literature reviewed showed that there is

a relationship between the antecedents of employee engagement and employee engagement.

### 3.9. Hypotheses

The literature review gave an overview of the antecedents that may have an influence on employee engagement. These antecedents comprising of employee communication, employee development, reward and recognition and extended employee care. Hence, there are mainly four independent variables, which given rise to four hypotheses.

# **Hypothesis 1:**

H1: There is significance relationship between employee communication and employee engagement

# **Hypothesis 2:**

H2: There is significance relationship between reward and recognition and employee engagement

# **Hypothesis 3:**

H3: There is significance relationship between employee development and employee engagement

# **Hypothesis 4:**

H4: there is significance relationship between extended employee care and employee engagement

#### 4. METHODOLOGY

# 4.1. Research Design

The purpose of this study is hypothesis testing, I.E. to test the relationship between the dependent and independent variables. The study will be focused on the individuals in the organization. The investigation will be done using regression. The sample will be based on probability, which is the sample size will present the population. The research is performed with minimum interference that is no controlled environment. The research is performed in one time. The data will be collected using questionnaire. The measurement will done using liker scale, nominal scale for most of the measurements. The data analysis is performed using hypothesis testing.

The unit of analysis is individual; the sample is employees working in manufacturing companies. The



sample was picked randomly across different levels in different organizations around Penang. The researcher personally approached the organization and explained to the employees about the study.

The questionnaire used 5- point liker scale for most of the questions. Sample size greater than 30 and less than 500 is suitable for most researches and also generally the number of samples should be 10 times the number of variables studied (Sekaran and Bougie, 2010).

# 4.2. Pilot Study

The questionnaire was constructed based on the literature review and the pilot study was distributed to 25 respondents. The sample used for the pilot study was not included in the final study. The reliability was tested and Cronbach Alpha was found to be more than 0.7, which indicates the questionnaire was reliable.

# 4.3. Final Study

In the final study, the questionnaires were distributed to the organizations around Penang. Some of the questionnaires were self-administered by the researcher. A total of 150 questionnaires were distributed and feedback from 100 respondents was obtained. The collected questionnaires were subjected to factor analysis and then followed by reliability analysis to test the validity and the reliability of the questions.

## 4.4. Findings and Analysis

#### 4.4.1. Demographic Analysis of the Respondents

As depicted in **Table 1-7**, there were a total of 100 employees in various groups who provided their responses for this study. The demographic profile of the respondents is explained below.

#### 4.5. Age

The 100 respondents who took part in the study were classified into five groups. Respondents who were lesser than 25 years constituted 11% of the total sample, while respondents between the age of 25 to 35 years constituted 59%, whereas the respondents who were more than 35 years and less than or equal 45 years constituted 24%, while respondents who were more than 45 years and less or equal to 55 years constituted 6%, whereas none of the respondents were more than 55 years.

#### 4.6. Gender

In respect to the gender, there were 43 male and 57 female who participated in the study. Generally it can be conclude there is no gender bias.

#### 4.7. Social Status

In respect to the social status, there were 49 of the respondents single, while 51 were married who participated in the study. Generally the data was equally respondent by both married and single.

#### **4.8.** Race

Out of the total respondents who participated in the study were classified into four groups. Respondents who were Malay constituted 32% of the total sample, while Chinese were constituted 52%, whereas Indian and Others constituted 11 and 5% respectively.

#### 4.9. Academic Qualification

The respondents were classified into four groups. The majority of the respondents who participated in the study were with good education background. The respondents who were holding degree were constituted 66% of the total sample, followed by those who were holding Master/PHD 26%. While the respondents who were holding Diploma and Secondary were constituted 7 and 1% respectively.

## 4.10. Department

The respondents were classified into 6 groups. The respondents who were working in Human Recourse department were constituted 4%, while others respondents who were working in IT department were constituted 15%, whereas those who were working in Engineering department were constituted 31% and the respondents who were working in Finance and Quality and other department were constituted 5 and 4 and 41% respectively.

### 4.11. Job Tenure

Job Tenure refers to the number of years the person has been working in the organization. The researcher found that the respondents who were lesser than 2 years constituted 28% and those between 2 to 5 years constituted 15%, while others who has been working more than 5 years and less or equal to 7 years constituted 27%, whereas others respondents who has been working more than 7 years and less than or equal 10 years constituted 10%, finally those who were working more than 10 years constituted 20%.



Tabl	գ 1	Δ	σe
1 adi	ет	. A	26

Demographic profile	Descriptive	Frequency	Percentage
Age	x<25	11	11
	$25 \le x \le 35$	59	59
	$35 < x \le 45 \text{ years}$	24	24
	$45 < x \le 55 \text{ years}$	6	6
	x>55 years	0	0

# Table 2. Gender

Demographic profile	Descriptive	Frequency	Percentage
Gender	Male	43	43
	Female	57	57

# Table 3. Social status

Demographic Profile	Descriptive	Frequency	Percentage
Social Status	Single	49	49
	Married	51	51

# Table 4. Race

Demographic Profile	Descriptive	Frequency	Percentage
Race	Malay	32	32
	Chinese	52	52
	Indian	11	11
	Others	5	5

#### Table 5. Race

Demographic profile	Descriptive	Frequency	Percentage
Academic qualification	Secondary	1	1
	Diploma	7	7
	Degree	66	66
	Master/PhD	26	26

# Table 6. Department

Demographic profile	Descriptive	Frequency	Percentage
Department	Human	4	4
	Resource		
	IT	15	15
	Engineering	31	31
	Finance	5	5
	Quality	4	4
	Others	41	41

#### Table 7. Job Tenure

Demographic profile	Descriptive	Frequency	Percentage
Job tenure	x< 2 years	28	28
	$2 \le x \le 5$ years	15	15
	$5 < x \le 7 \text{ years}$		
	$7 < x \le 10$ years	27	27
	x> 10 years	10	10
		20	20



# 4.12. Factor Analysis

Factor analysis is a statistical technique which is used to find the variables observed are related to an unobserved variables generally called as Factors. Using this technique we generally summarize the variance into smaller set, which contain the key information of the variables.

#### 4.13. Reliability Analysis

We perform reliability analysis for each dependent and independent variables similar to the way we performed factor analysis.

## 4.14. Multiple Regression Analysis

Multiple regression analysis MRA is not just one technique but a family of techniques that can be used to explore the relationship between one continuous dependent variable and number of independent variables or predictor. Multiple regression is based on correlation, but allows more sophisticated exploration of the interrelationship among a set of variables. Multiple regressions can be used to address a variety of research questions. It can tell the researcher how well a set of variables is able to predict a particular outcome.

#### 4.15. Analyzing using Multiple Regression

The data was analyzed using multiple regression analysis. The researcher found all the antecedents of employee engagement were significance and its value was lesser than 0.05. Hence, the antecedents which are significant in multiple regression analysis are employee communication, reward and recognition, employee development and extended employee care. Moreover the researcher found that among all the independent variables employee development is the most contributors to employee engagement ( $\beta = 0.272$ ).

#### 4.16. Interpretation of Analysis

From the result of multiple regression analysis, we can conclude that the antecedents have a positive influence on employee engagement, as shown in Fig. 1. Since the antecedents comprising of employee communication, reward and recognition, employee development and extended employee care. We can conclude the following:

- Higher employee communication, higher employee engagement
- Higher reward and recognition, higher employee engagement
- Higher employee development, higher employee engagement
- Higher extended employee care, higher employee engagement

#### 4.17. Findings

The finding of this research approves that employee engagement is very important to the organization, the results shows that the antecedents of employee engagement is influence employee engagement and has significant impact on the level of engagement among the employees. Moreover, the results indicate that employee development is the most contributor factor to employee engagement. Hence, it is very useful for the organization that seeks to increase the level of engagement among its employees to invest in employee development. It is very favorable for the organization to spend more on programs that develop the skills of the employees and carry out suitable workshops and training curriculum that enhance the skills and abilities of the employees.

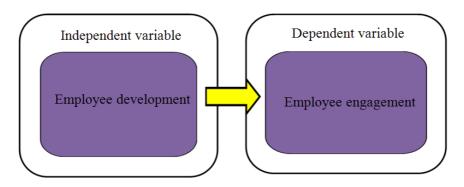


Fig. 1. Final framework



# 5. CONCLUSION

This study gives an idea about employee engagement particularly in manufacturing sector. Hence, it will be useful for future research to consider other kind of industry. Moreover, it will be beneficial for the future research to include other variables to measure employee engagement and conduct the research in undeveloped country. In addition, since employee development is the most significant contributor towards employee engagement the future research can study in depth on the influence of employee development on employee engagement.

### 6. REFERENCES

- Bates, S., 2004. Getting engaged: Half of your workforce may be just going through the motions. HR Mag.
- Baumruk, R., 2004. The role of employee engagement in business success (report of a Hewitt Associates/Michael Treacy study). Workspan, 47: 48-53.
- Bernthal, P.R., S.M. Rioux and R.S. Wellins, 1999. Leadership Forecast: A Benchmarking Study. 1st Edn., Development Dimensions International, pp. 37.
- Blessing, W., 2013. Employee Engagement Research Report. Princeton, NJ.
- Clampitt, P.G., 2009. Communicating for Managerial Effectiveness. 1st Edn., Los Angeles, Sage, ISBN-10: 1412970881, pp. 287.
- CLC, 2004. Driving performance and retention through employee engagement. Corporate Leadership Council, Corporate Executive Board.
- Fleming, J.H., C. Coffman and J.K. Hartner, 2006. Manage your human sigma. Eng. Manage. Rev., 34: 52. DOI: 10.1109/EMR.2006.1679076
- Gubman, E., 2004. From engagement to passion for work: the search for the missing person. Human Resour. Plann., 27: 42-46.
- Harter, J.K., F.L. Schmidt and T.L. Hayes, 2002. Business-unit-level relationship between employee satisfaction, employee engagement and business outcomes: A meta-analysis. J. Applied Psychol., 87: 268-279. PMID: 12002955

- Kahn, W.A., 1990. Psychological conditions of personal engagement and disengagement at work. Acad. Manage, J., 33: 692-692. DOI: 10.2307/256287
- May, D.R., R.L. Gilson and L.M. Harter, 2004. The psychological conditions of meaningfulness, safety and availability and the engagement of the human spirit at work. J. Occupat. Organ. Psychol., 77: 11-37. DOI: 10.1348/096317904322915892
- Muthuveloo, R. and R. Che Rose, 2005. Antecedents and outcomes of organisational commitment among Malaysian engineers. Am. J. Applied Sci., 2: 1095-1100. DOI: 10.3844/ajassp.2005.1095.1100
- Ramsay, C.S. and M.I. Finney, 2006. Employee engagement at Intuit. Intuit Inc., Mountain View, CA.
- Richman, A., 2006. Everyone wants an engaged workforce how can you create it? Workspan, 49: 36-39.
- Sekaran, U. and R. Bougie, 2010. Research Methods for Business: A Skill Building Approach. 5th Edn., John Wiley and Sons, ISBN-10: 0470744790, pp. 488.
- Shaffer, J., 2004. Measurable payoff: how employee engagement can boost performance and profits. Human Capital Institute.
- Towers, P., 2005. Reconnecting with employees: Quantifying the value of engaging your workforce. Research Report. London, UK.
- Vance, R.J., 2006. Employee Engagement and Commitment: A Guide to Understanding, Measuring and Increasing Engagement in Your Organization. SHRM Foundation, pp. 45.
- Walker, I., 2000. Halfway out the Door: The Walker Information and Hudson Institute National Employee Relationship Report. Indianapolis, Walker Information, Inc.
- Welbourne, T.M., 2007. Employee engagement: Beyond the fad and into the executive suite. Leader Leader, 44: 45-51. DOI: 10.1002/ltl.231

