

EMPLOYEE STRESS MANAGEMENT AND ORGANIZATIONAL PERFORMANCE: EVIDENCE FROM HEALTHCARE SECTOR IN NIGERIA

EGBERI, Agbarha Kelvin

Department of Business Administration and Management School of
Business Studies ,
Delta State Polytechnic, Ozoro, Delta State, Nigeria

and

OLUFOLAHAN, Omayeli Mary

Department of Business Administration and Management School of
Business Studies,
Delta State Polytechnic, Ozoro, Delta State, Nigeria

ABSTRACT

This paper evaluated the relationships between employee stress management and the performance of healthcare firms in Nigeria via ex-post facto research design. Data of employee stress was gauged using dummy variables of vacation and health disclosures while organizational performance by market share, and earnings per share, which were sourced from the annual reports and accounts of selected healthcare firms from 2012-2019. Data sourced were analyzed by means of both descriptive and inferential statistics and findings revealed a significant relationship between employee stress management dimensions and market share and earnings per share. Impliedly, employee stress management contributes significantly to organizational performance of healthcare firms in Nigeria. In view of the findings, it was recommended that employee stress audits should

be carried out frequently by management of organizations so as to determine whether stress levels lead to decline in organizational performance. In fact, organizations should reduce stress by way of managing it in order to improve performance dimensions of market share and earnings per share; management of organization can realize this by allowing sufficient periods for yearly leave and vacation for employees.

Keywords: Employee stress management, Organizational performance, Healthcare sector

INTRODUCTION

Organizational performance irrespective of the industry predominantly depends on physical and emotional conditions of employees. Organizational performance in the views of Traverse and Cooper (2020) is usually determined by physical and emotional conditions of employees, hence influencing the level of relaxedness and concentration in the work environment. Moreover, the way in which employees sense, analyze and evaluate stress is dependent on employees' mental wellbeing. More worrisome is the fact that the perceived stimuli resulting from employee stress-related outcomes have become more challenging for organizations to manage (Blumenthal, 2014; Olulana, 2015; Manabete, John Makinde & Duwa, 2016; Duguet, 2016).

In contemporary organizations, employee stress management has appeared as an increasingly demanding chore for organizations management and is peculiar to healthcare and manufacturing firms. According to Adeoye, Aliu and Soladerin (2012), and Hubbard (2019), employees are engaged in tasks characterized by stressful work-related activities and these stress-related activities in the views of Plattner and Mberengwa (2014), have rippling effects on organizational performance, since 'bad' stress may negatively influence organizational performance while 'good' stress may have positive influence. Amazingly, employees of organizations, particularly those in healthcare sector are usually confronted with more stress than others.

Nevertheless, Manabete, *et al.* (2016) Ashfaq and Muhammad (2013) reiterated that due to the stress employees face in the work environment, it makes them unsettle, thus leading to low performance. Given the supposed negative effect of employee stress, Akomolafe and Ogunmakin (2014) emphasized the need for organizations to effectively management stress faced by employees. Chovwen (2013), and Ekundayo (2014) see employee stress management as a process of

controlling emotional and physical conditions of employees within an organization so as to forestall mental disorders. Evidently, stress impact on the physical and emotional wellbeing of employees, which result to decline in organizational performance (Obiora & Iwuoha, 2013; Chemdhok & Monga, 2013; Sun & Chiou, 2014); work engagement (Holzemer, 2011; Laiba, Anum, Muhammad, Naseem & Kashif, 2011; Raheem, Nawaz & Imamuddin, 2014; Olusegen, Oluwasayo & Olawoyin, 2014).

The foremost cause of employee stress as Sun and Chiou (2014) notes it is derived from work overload. Inexplicably, rather than focusing on positive outcome of employee stress management on organizational performance, extensive attention has been on negative outcomes of employee stress on performance, even though stress could equally stimulate people to work better (Raddy & Anuradha, 2013; Omolara, 2014). Thus, lack of ability by organizations to engage in effective stress management has made employees unveil some forms of depressions, anxiety as well as job dissatisfaction (Manabete *et al*, 2016; Akingbola & Adigun, 2010).

In the healthcare sector for instance, employee stress management is becoming a major aspect of study in management literature since the sector is a very sensitive and vital sector in most viable economies of the world. The performance dimensions affected by poor stress management as noted by Artz, Norman, Hatfield and Cardina (2010) encompass market share, earnings per share, returns among others.

Ali, Raheem, Nawaz and Imamuddin (2014) maintained to maintain effective employee stress management; organizations have resort to providing vacations for employees and even engaging in health disclosure. More importantly, since healthcare sector could be poorly influenced by stress leading to declined performance, there is therefore the need to carry out an investigation on whether employee stress management will contribute to organizational performance in Nigeria. To actualize this purpose, the following hypotheses were tested:

H₀1: Employee stress management has no significant relationship with earnings per share in the Healthcare Sector in Nigeria.

H₀2: Employee stress management has no significant relationship with market share in the Healthcare Sector in Nigeria.

LITERATURE REVIEW

Theoretical Foundation

The theoretical framework of this paper is anchored on Occupational Stress and Transactional Stress paradigms. The occupational stress paradigm focuses on structural traits of employees' interaction with the work environment. The occupational stress paradigm was postulated by Karasek and French (1971). However, several researchers have indicated that the goodness of fit between employees and work environment often offers a better clarification of behaviour than individual or situational disparities (Raheem, Nawaz & Imamuddin, 2014). The paradigm contends that stress occurs due to lack of fit between employees and the work environment.

On the other hand, transactional stress paradigm centres on the cognitive processes and emotional reactions of employees' interaction with the work environment. The paradigm was postulated by Siegrist (1997) and contends that employee stress results due to mismatch between employees' interaction with the work environment. The effect of this mismatch, usually result to decline in performance of organizations.

The relevance of both paradigms (occupational stress and transactional stress paradigms) to the current study is that in order to improve organizational performance, employees must have the right mental and emotional wellbeing as well as skills that can help them cope with stress when they surface in the work environment. More so, the paradigms support the view that when employee stress is effectively managed, organizational performance is enhanced.

Conceptual Review

Employee stress is a complex phenomenon since it is intangible; however, the management of it is also a complex process for organizations. Employee stress has been considered to result from numerous dynamics, which could be external (those not connected with the work environment but impose stress on employees) and internal (those linked with the work environment - poor work conditions, work overload, lack of job security and career advancements etc.) (Ayodele, 2014; Bamidele, Ogunleye & Olatunji, 2014); in addition, Bewell, Yakubu, Owotunse and Ojih (2014) note that work and family demands and work flexibility are important dynamics of work-related stress for employees.

According to Shahid, Latif, Sohail and Ashraf (2015), and Syed, Khan, Kant

and Khan (2013), work-related stresses may be responsible for the decline in organizational outcomes like performance, lack of motivation and commitment, increased absenteeism and turnover. Given that employee stress cannot be easily quantified by organization, its measurement has been lacking in literature. In this paper, employee stress was assessed by means of dummy variables, zero (0) and one (1) on the basis of employee vacation and health disclosures by organizations. Consequently, for organizations that discloses health related matters and accord employees vacation are characterized by one (1) while those without by zero (0).

Organizational Performance Dimensions Employed

In management literature, several dimensions have been employed to measure the performance of organizations, which according to Gunday, Ulusoy, Kilic and Alpkan (2011), as well as Hans (2011) is cumbersome to have a single measure. Isogawa, Nishikawa and Ohashi (2012) believed that the performances of organizations fall under three specific areas: financial performance (return on asset, earnings per share etc.); market performance (sales, market share etc.); and shareholders returns (total shareholders return, economic value added etc.). In this paper, two vital areas were assessed financial (earnings per share) and market (market share: Tobin's Q) performance.

First, earnings per share (EPS) is a vital organizational performance dimension; EPS is measured as profits after tax while subtracting preference dividend and minority interests divided by the number of ordinary shares ranking for dividend. Interestingly, there is no empirical evidence on the relationship between employee stress management and organizational performance measure of EPS.

Second, market share is one of the primary dimensions organizations employ in assessing how well they have performed in their industry as against competitors (Jefferson, Huamao, Xiaojing & Xiaoyun, 2020). Market share is the percentage of sales organizations breeds out of aggregate sales by all competitors combined in a given industry. Remarkably, prior studies in developed nations indicate that employee stress management significantly contribute to market share of organizations (Artz, *et al*, 2010; Therrien, Therrien, Doloreux & Chamberlin, 2011; Traverse & Cooper, 2020). The nation of the use of market share in this study is to ascertain if market share is affected by employee stress management as obtainable in developed nations.

METHODOLOGY

This paper adopts the ex-post facto research design and secondary data was the major source of data collection. Twelve (12) healthcare firms were sampled out of the number of healthcare firms in Nigeria. Data of employee stress management was measured via dummy variables of vacation and health disclosures; one (1) for organizations that discloses health related matters and accord employees vacation while zero (0) and for those that do not. Organizational performance dimensions of market share and earnings per share were employed.

The data were sourced from the annual reports and accounts of selected healthcare firms from 2012-2019. The choice of the employee stress management variables were informed by the studies of Hans (2011), and Ali, Raheem, Nawaz and Imamuddin (2014). On the basis of this, the following models were estimated:

$$\begin{aligned} eps &= f(\text{employee stress management}) \text{ eq. 1} \\ \text{market share} &= f(\text{employee stress management}) \text{ eq. 2} \end{aligned}$$

Assuming a linear relationship between variables in equations 1-2, the explicit equations is re-written as

$$\begin{aligned} eps &= \alpha_0 + \beta_1 evc_{it} + \beta_2 ehd_{it} + E_t \text{ eq. 3} \\ mkh &= \alpha_0 + \beta_1 evc_{it} + \beta_2 ehd_{it} + E_t \text{ eq. 4} \end{aligned}$$

Where: *eps* = earnings per share of sampled healthcare firm; *mkh* = market share of sampled healthcare firm; *evc* = employee vacation (dummy – a measure of stress management); *ehd* = employee health disclosure; *it* = individual healthcare firms at time *t*; β , α = regression coefficients; E_t = stochastic error term.

Data obtained were analyzed by means of both descriptive (mean, median, standard deviation, minimum, maximum values and correlation) and inferential statistics (Ordinary Least Square). The statistical analysis was carried out using STATA 16.0.

DATA ANALYSIS, RESULTS AND DISCUSSION
Table 1: Descriptive Results of Employee Stress Management & Organizational Performance

Parameters	<i>evc</i>	<i>ehd</i>	<i>Eps</i>	<i>mkh</i>
Mean	.1039	.2194	2.9881	2.3324
Median	.1087	.2084	2.6453	2.2493
Standard. Dev.	.0637	.0766	1.0075	1.0129
Minimum Values	0	0	1.4421	1.9303
Maximum Values	1	1	3.0832	2.4474

Source: Authors Computation via STATA 16.0

Table 1 show descriptive results of dimensions of employee stress management (*evc* – employee vacation; *ehd* – employee health disclosure) and organizational performance (*eps* – earnings per share; *mkh* - market share). The results revealed that mean values of *evc*, *ehd*, *eps*, and *mkh* are .1039, .2194, 2.9881 and 2.3324 with medians of .1087, .2084, 2.6453 and 2.2493 respectively. The highest mean was reflected in *eps* and lowest, *evc*.

The minimum and maximum values for dimensions of employee stress management are zero (0) and (1) while *eps* is 1.4421 and 3.0832 and *mkh* 1.9303 and 2.4474. Besides, the small standard deviation values of variables are clear indication of match between employee stress management and organizational performance. The results are further depicted by mean and standard deviation plots.

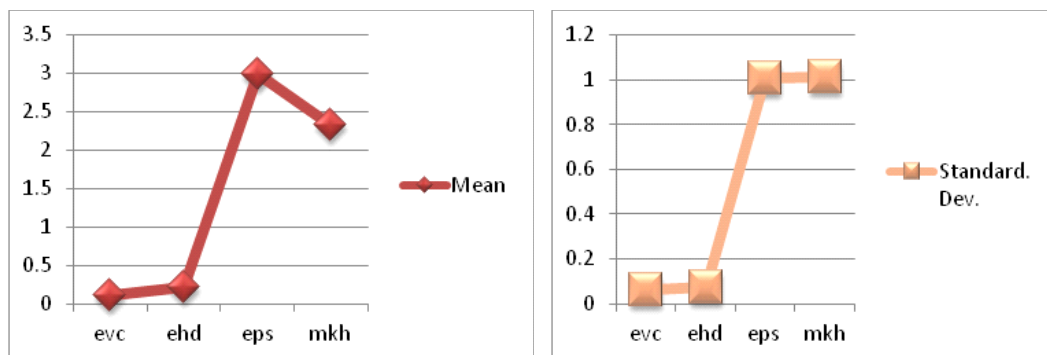


Figure 1: Descriptive Results of Employee Stress Management & Organizational Performance

Source: Authors Computation via STATA 16.0

Table 2: Correlation Results of Employee Stress Management & Organizational Performance

Variables	<i>Evc</i>	<i>ehd</i>	<i>psE</i>	<i>mkh</i>
<i>Evc</i>	1.0000			
<i>Ehd</i>	0.0638	1.0000		
<i>Eps</i>	-0.0834	0.4391	1.0000	
<i>Mkh</i>	-0.0543	0.2776	0.4421	1.0000

Source: Authors Computation via STATA 16.0

Table 2 show the correlation results of dimensions of employee stress management (*evc*, *ehd*) and organizational performance(*eps*, *mkh*). The results indicate that employee stress management negatively correlates with organizational performance. More so, the result revealed that highest correlation value is between *evc* and *eps*; however, did not indicate presence of multicollinearity among pairs of independent variables. According to Gujarati (2003); Nachmias and Nachmias (2009), when correlation coefficients do not exceed 0.8, there is the absence of multicollinearity problem. Consequent upon this the above, the dataset are suitable for conducting further statistical tests.

Table 3: Post-estimation Results (Variance Inflation Factor – VIF)

Variables	<i>VIF</i>	<i>1/VIF</i>
<i>eps</i>	1.22	0.8197
<i>mkh</i>	1.09	0.9174
Mean VIF	1.16	

Source: Authors Computation via STATA 16.0

Table 3 is the post-estimation results (VIF) for the dependent variables; the result showed that the mean VIF (1.16) did not exceed the standardized VIF threshold (1.16 < 10.0), an indication that there is the absence of heteroskedasticity problem among variables of the study.

Table 4: Regression Results for Employee Stress Management (*evc*, *ehd*) and Organizational Performance (*eps*)

<i>Equation</i>	<i>Obs.</i>	<i>df</i>	<i>RMSE</i>	<i>R-sq.</i>	<i>F</i>	<i>P</i>
<i>eps</i>	96	3/96	10.339	.883	15.31	.0000
	Coef.	Std. Err.	t	P>/t/	95% Conf. Interval	
<i>evc</i>	1.4949	2.3990	-4.12	.000	1.4421	
<i>ehd</i>	.73300	3.0033	-7.22	.000	1.9303	
<i>_cons</i>	.39939	1.8493	12.93	.000	2.4474	
					3.0832	
					1.3393	
					2.4949	

Source: Authors Computation via STATA 16.0

Table 4 shows the regression results of dimensions of employee stress management (*evc*, *ehd*) and organizational performance (*eps*). The R-squared is 0.883, indicating that the independent variable explained about 88.3 per cent of the systematic variation in the dependent variable. In fact, the results revealed a significant relationship between dimensions of employee stress management (*evc*, *ehd*) and organizational performance (*eps*) (f-ratio 3, 96 = 15.31).

In view of the result, we hence reject the null hypothesis and accept the alternate hypothesis which implies that there is significant relationship between employee stress management and earnings per share. In addition, the t-values (*evc* = -4.12; *ehd* = -7.22) are clear indications of negative relationships between employee stress management and earnings per share.

Table 5: Regression Results for Employee Stress Management (*evc*, *ehd*) and Organizational Performance (*mkh*)

<i>Equation</i>	<i>Obs.</i>	<i>df</i>	<i>RMSE</i>	<i>R-sq.</i>	<i>F</i>	<i>P</i>
<i>mkh</i>	96	3/96	3.3929	.817	14.92	.0000
	Coef.	Std. Err.	t	P>/t/	95% Conf. Interval	
<i>evc</i>	1.2220	2.2833	-6.01	.000	1.3393	
<i>ehd</i>	.48494	1.3993	-8.45	.000	1.4456	
<i>_cons</i>	.49393	1.0393	17.22	.000	2.0332	
					3.1292	
					1.0393	
					1.9393	

Source: Authors Computation via STATA 16.0

Table 5 shows the regression results of dimensions of employee stress management (*evc*, *ehd*) and organizational performance (*mkh*). The R-squared is 0.817, indicating that the independent variable explained about 81.7 per cent of the systematic variation in the dependent variable. Again, the results showed a significant link between dimensions of employee stress management (*evc*, *ehd*) and organizational performance (*mkh*) (f-ratio 3, 96 = 14.92).

In view of the result, we thus reject the null hypothesis and accept the alternate hypothesis which implies that there is significant relationship between employee stress management and market share. In addition, the t-values (*evc* = -6.01; *ehd* = -8.45) are clear indications of negative relationships between employee stress management and market share. The results corroborate the viewpoints of Traverse and Cooper (2020) Manabete, *et al* (2016); Duguet (2016); Adeoye, *et al* (2012); Hubbard (2019) that employee stress management negatively affects organizational performance.

CONCLUSION AND RECOMMENDATIONS

In this paper, the relationships between employee stress management and the performance of healthcare firms in Nigeria was evaluated via ex-post facto design. Data of employee stress was measured using dummy variables of vacation and health disclosures while organizational performance by market share, and earnings per share, which were obtained from annual reports and

accounts of selected healthcare firms from 2012-2019. Data sourced were analyzed by using both descriptive and inferential statistics

Findings revealed a significant relationship between employee stress management dimensions and market share and earnings per share. Impliedly, employee stress management contributes significantly to organizational performance of healthcare firms in Nigeria. In view of the findings, it was recommended that employee stress audits should be carried out frequently by management of organizations so as to determine whether stress levels lead to decline in organizational performance.

In fact, organizations should reduce stress by way of managing it in order to improve performance dimensions of market share and earnings per share; management of organization can realize this by allowing sufficient periods for yearly leave and vacation for employees. More so, organizations' management should provide conceivable stress measures, which addresses workload in the work environment.

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