

# Work-related stress and trait-based performance of academic staff in Federal Polytechnics of South East Nigeria

By

Eni, Chioma Ijeoma (Ph.D) Department of Business Administration and Management, Federal Polytechnic, Oko

Email: <a href="mailto:chiomaeni@gmail.com">chiomaeni@gmail.com</a>

## Abstract

The study investigated work-related stress and trait-based performance of academic staff in federal polytechnics in South East, Nigeria (Federal Polytechnic, Oko, Federal Polytechnic Nekede, Akanu Ibiam Federal Polytechnic Unwana Afikpo). Structured questionnaire was the principal tool used in eliciting information from three hundred and fifteen (315) respondents drawn from the study population. Descriptive statistics and spearman rank correlation were used in the analysis of data. The result of spearman rank correlation shows a negative correlation between work-related stress and trait based performance of academic in federal polytechnics in South East, Nigeria. However, the rate at which association exists between the two variables-work related stress and trait-based performance is not significant. The researcher concludes that if the issue of stress management is not given the attention it desires, the health and performance of the lecturers would be jeopardized in such a way that the resultant effects are complaints from parents, employers and other stakeholders on the status of service delivery, thereby damaging overall image of the institution. The researcher recommends that the management of the polytechnics should reduce the excess work load by engaging within available resources more lecturers either on full or part time.

**Keywords:** Word related stress, trait based performance, academic staff, federal polytechnics, South East Nigeria.

## Introduction

The stress experienced by different occupation types and job roles has been discussed in many studies with a number of different occupations being described as experiencing above average level of stress, such as teachers (Brown and Uehara, 2008). In a study by Baker (2004), it was reported that teachers had higher levels of stress at work, almost double the rate (40%) when compared with other professionals.

Stress is the product of an imbalance between environmental demands and individual capabilities. Job stress is seen as a physiological state of the individual which is influenced by a wide variety of environmental factors known as stressors.



Work-related stress is the response people may have when presented with work demands and pressure that are not matched to their knowledge and abilities and which challenge their ability to cope (WHO, 2016). However, Aroosiya and Wussanes (2016) see work stress as the harmful physical and emotional responses that occur when job requirements do not match the workers capabilities, resources and needs.

It is important to understand that pressure at work by itself cannot be totally avoided in a modern business world and is not necessarily destructive. On the contrary, when a worker is experiencing an adequate and manageable amount of pressure, he or she might feel alert and inspired to do the job and to learn. Nevertheless, the perception of an acceptable amount of pressure is very individual and once the limit is exceeded the consequences on employees health and performance can be dramatic (WHO, 2016).

Job performance of employees is the most critical subject which plays an important role in accomplishing organizational performance (Wang, 2015). Ismail, Abdraham and Zainababidin (2014) described job performance as the ability of individuals to achieve their respective work aims, then meet their expectations, achieve benchmarks or accomplish their organizational goals.

Stress has both positive and negative impacts on performance. In recent times, stress has become a major issue that has seriously affected academic staff in tertiary institutions all over the world. Scholars have come with the view that stress in an academic institution can have positive and negative consequences if not properly controlled (Smith, 2002).

#### **Statement of Problem**

In recent times, stress has become a major issue that has seriously affected academic staff in tertiary institutions all over the world. Unfortunately in our higher educational institutions, series of problems disrupt the smooth operation of academic activities, affect employee performance and the overall institutional performance. Some of these challenges are stress related. These problems emanate either from the institution or the government, all having negative effects on their effectiveness in teaching and learning process. The institutional problems include rigid institutional policies, heavy workload, and poor working conditions. On the other hand, the governmental problems include, ever changing higher education reforms and policies, inadequate budget for higher education sector,; quality control and accreditation concerns. These constitute potential sources of stress to polytechnic lecturers.



Stress related outcomes do have serious consequences on individual's mental, psychological and physical health. The cost of stress is seen in increase in the number of absenteeism, the decline in work performance, the negative attitude of lecturers and premature death. It is against this background that the study was carried out with a view to providing answers to the highlighted problems.

## **Objective of the study**

To ascertain the association between work-related stress and trait-based performance of academic staff in Federal Polytechnics of South East Nigeria?

## **Research question**

What is the extent of association between work-related stress and trait-based performance of academic staff in Federal Polytechnics of South East Nigeria.

# Hypothesis

Ho: There is no significant association between work-related stress and the trait-based performance of academic staff in Federal Polytechnics of South East Nigeria.

#### Literature Review

Stress is a general term applied to pressures people feel in life. The presence of stress at work is almost inevitable and is becoming a major problem in work places around the world. When stress becomes excessive, employees develop various symptoms that can affect their work performance and health and even threaten their ability to cope in the environment. (Newstrom and Davies 2002) Moorhead and Griffin (2004) define stress as being a person's adaptive response to a stimulus that places excessive psychological or physical demands on the individual. The stimulus generally is called a stressor, which is any factor that causes stress. Robbins (2003) summarizes stress as being a dynamic condition in which an individual is confronted with an opportunity, constraint, or demand related to what he or she desires and for which the outcome is perceived to be both uncertain and important.

Stress is the product of an imbalance between environmental demands and individual capabilities. Job stress is seen as a physiological state of the individual which is influenced by a wide variety of environmental factors known as stressors. Stress is a dynamic and reciprocal



relationship between the person and environment (Omolara, 2008). Stressors can range from catastrophic events to irritating incidents. However, stressors do not elicit a stress response in the individual until the person appraises it as exceeding the available resources. It also allows the possibility that a given level of stress leads to different effects across people, and across time (Dinham, 2004).

Work- related stress is the response people may have when presented with work demands and pressures that are not matched to their knowledge and abilities and which challenge their ability to cope (Leka, Griffola and Cox, 2004;WHO,2016).

Lecturer's job performance can be defined as an index of lecturer's effectiveness, which refers to relationship between the characteristics of teaching and its effect on educational outcome in classroom teaching (Alabi, Murtala and Lawal, (2012).

The parameters for measuring job performance include: Foresight, Sense of judgement, Command of language, Human relations, Sense of responsibility, Reliability under pressure, Drive and determination, Leadership quality, Effectiveness and efficiency, Regularity and punctuality, professional/technical knowledge(Hammer2007;Owolabi2005).

# **Trait -based performance**

Opatha (2002) indicates that trait-based information is a key variable of employee performance. Traits-based information identifies a subjective character of the employees. A trait is a characteristic that an individual possess.

Kotawatta (2007) indicates that job knowledge, cooperation, dependability, interpersonal relations, and communication skills are variables of trait-based performance. Trait has some legitimate relationship to the job of an academic staff and therefore has some value in appraisal.

## Job Knowledge

The lecturer's knowledge- base in the subject is fundamental to the creation and enhancement of the students' opportunity to learn well. Thorough knowledge of the subject is essential to accurate instruction and clear communication of content to student. Competence include not only content knowledge but also the ability to organize, integrate, adjust and adapt this content in ways that make it accessible and thought provoking to the learner. This dimension also includes the ability to advance scholarship and generate research. It also implies



advancement of knowledge through discovery, integration, dissemination and application of knowledge (White, 2008).

## Cooperation

This indicates maintaining harmonious and effective work relationship with co-workers. Academic staff must be able to adapt to changing priorities and demands. They must be willing to share information and resources with others in order to promote positive and cooperative work environment(Alawamlah, 2004).

## **Dependability and Reliability**

Dependability and reliability mean that an employee demonstrates responsible behaviours at work (Teece, Pisano and Shuen, 2017). It is very important that an academic staff possess these competencies. Trusted employees have more opportunities for growth and promotion. Dependable employees respect deadlines and make every effort to meet them(Kadarsah, 2007). Dependability is an important trait to be possessed by an academic staff because it enhances a wide variety of job performance categories. Regardless of the situation, a reliable employee will do everything possible to make sure that his/her performance is steady. A reliable employee is unstopped by obstacles, pressures and demands that would iustifiably derail others(Mansour, Mahnaz and Hassan, 2016).

## **Interpersonal relations and Communication Skills**

Interpersonal skills are related to the way you communicate and interact with people. People with strong interpersonal skills are often more successful in both their professional and personal lives(Mergen, Grant and Widrick 2010)..

Communication is concerned about how effectively the employee conveys information and ideas both orally and in writing. Academic staff should be able to listen carefully to both staff and students and seek clarification to ensure clear understanding. It is essential that the lecturer communicates ideas clearly and interestingly to the learners(Hammer,2007).



#### **Theoretical Review**

Stress results from the complex interactions between a large system of interrelated variables, there are several psychological theories and models that address occupational stress, (Mark and Smith, 2008). However this study is anchored job demand resource model.

## **Job-Demand Resource Model**

This model was propounded by Arnold Bakker and Evangelina Demorotti in 2007. Job-Demand Resource model posits that strain are a response to imbalance between demands of one's job and the resources he or she has to deal with those demands. Job demands are the physical, psychological, social or organizational aspects of a job that require sustained physical and/or psychological effort or skills. Therefore, they are associated with the expenditure of time and energy (Balducci, Schufell and Fraccaroli, 2011). On the other hand, job resources are the physical, psychological, social or organizational aspects of the job that aid in achieving work goals; reduce job demands and the associated physiological and psychological cost, stimulate personal growth, learning and development (Balducci, Schaufeli and Fraccaredi, 2011).

## Methodology

Descriptive research design was utilized in this study. Data comprised of primary and secondary data. The research population comprised all academic staff of federal polytechnics of South East Nigeria (Federal Polytechnic, Oko, Federal Polytechnic, Nekede, Akanu Ibiam Federal Polytechnic, Unwana Afikpo). From a total population of one thousand four hundred and sixty five (1465) a sample size three hundred and fifteen (315) was determined with the aid of Taro Yameni's formula. Two hundred and seventy two (272) copies of completed questionnaire were used in the analysis of data. The researcher used literature based self developed questionnaire titled Work related stress and trait based performance questionnaire (WRSATBPQ).

## **Operational measures of variables**

Two main variables are included in the proposed research model encompassing work related stress and trait-based performance.



#### **Work-related stress**

Work-related stress was operationalized into seven major dimensions such as work load (WL), poor working condition (PWC), time pressure (TP), task of adaptation to new technology (TANT), committee meetings/administrative role (CMAR), career development task (CDT) and attending to students and colleagues (ASC). The questionnaire assessed dimensions of work related stress and employee performance.

# **Trait based performance**

Trait based performance was operationalized into job knowledge, cooperation, dependability, interpersonal relations and communication skills.

Data analysis technique – Descriptive statistics were used in the analysis of data while spearman rank correlation was used in testing the hypothesis.



## **Results**

Table 1: Responses on the extent of work stress among academic staff in Federal Polytechnics of South East Nigeria.

S/No	Questions	VHE	HE	NE	LE	VLE	N	Mean	SD
$X_1$	To what extent is work load severe in the institutions	26 (9.6%)	57 (21.0%)	24 (8.8%)	105 (38.6%)	60 (22.1%)	272	2.00	1.082
$X_2$	The pressure of an adaptation to new technology is challenging to a	6 (2.2%)	34 (12.5)	41 (15.1)	77 (28.3)	114 (41.9)	272	1.45	0.967
X <sub>3</sub>	Involvement in other activities such as attending of panels, committees and other meetings are demanding to a extent	3 (1.1%)	54 (19.9%)	64 (23.5%)	66 (24.3%)	85 (31.3%)	272	1.44	1.088
X <sub>4</sub>	Marking and collation of results are challenging owing to population of students to a extent	23 (8.5%)	8.8 (32.4%)	7 (2.6%)	78 (28.7)	76 (27.9%)	272	2.16	1.011
X <sub>5</sub>	Challenges of career development is stressful to a extent	8 (2.9%)	77 (28.3%)	59 (21.7%)	76 (27.9%)	52 (19.1%)	272	1.72	1.177

Source: Researcher's Field Survey.

Table 1 shows the responses on question items  $X_1 - X_5$  on the extent of work related stress among academic staff in Federal Polytechnics in South East Nigeria. The frequencies, percentages, mean and standard deviations of the responses are shown in the table.



**Table 2: Responses on extent of trait-based performance** 

S/No	Questions	VG	G	U	P	VP	N	Mean	Variance
$X_6$	Creativity	63	159	17	2	31	272	2.81	1.225
		(23.2%)	(58.5%)	(6.3%)	(0.7%)	(11.4%)			
$X_7$	Reliability	13	63	6	178	12	272	2.24	0.500
		(4.8%)	(23.2%)	(2.2%)	(65.4%)	(4.4%)			
$X_8$	Dependability	11	39	12	70	140	272	1.62	0.856
	even under	(4.0%)	(14.3%)	(4.4%)	(25.7%)	51.5%)			
	pressure								
$X_9$	Competence	9	54	42	83	84	272	2.65	1.137
		(3.3%)	(19.9%)	(15.4%)	(30.5%)	(30.9%)			
$X_{10}$	Inter-personal	61	74	2	81	54	272	2.51	1.144
	and	(22.4%)	(27.2%)	(0.7%)	(29.8%)	(19.9%)			
	communication								
	skills								

Source: Researcher's Field Survey.

Table 2 shows the responses on items 6-10, on extent of trait-based performance. The frequencies, percentages, mean and variance are shown in the table.

The result of the spearman rank correlation test is presented in table 3 as follows.

**Table 3 Correlations** 

			TBP	WRSAS
	ТВР	Correlation Coefficient	1.000	033
		Sig. (2-tailed)		.521
Spearman's rho		N	272	272
Spearmansino	WRSAS	Correlation Coefficient	033	1.000
		Sig. (2-tailed)	.521	
		N	272	272

Source: Researcher's computation

The result in table 3 shows that there is a negative correlation between work-related stress and trait- based performance in Federal Polytechnics in South East Nigeria. However, the rate at which association exists between the two variables - work related stress and trait based performance is not significant. Thus we reject H<sub>A</sub> and accept H<sub>o</sub> that there is no significant association between work -related stress and trait- based performance



## 5.2 Conclusion

The high stress level experienced by Polytechnic lecturers is capable of increasing risks of health problems. Lecturers who perceive their jobs as stressful record a decrease in performance that impacts significantly on students, institutions and the nation at large. The performance of academic staff may be decreased in such a way that the quality of education offered to students are affected. The resultant effects are complaints from parents, employers and other stakeholders on the status of service delivery, thereby damaging overall image of the institution.

Since the performance of academic staff as teachers, researchers and administrators determine the quality of the graduates and the contributions they make to the society, the issue of stress management needs urgent consideration.

Based on the findings of this study, if the issue of stress management is not given the attention it desires ,the health and performance of the lecturers would be jeopardized .However the commitment of educational stakeholders towards the welfare of academic staff will reduce work- related stress. The resultant effect would be improvement in the quality of education and the provision of talented and competent work force in the country.

## 5.3 **Recommendations**

- 1. The management of the Polytechnics need to reduce the excess work load by engaging within available resources more lecturers either on full or part time.
- 2. Relaxation centres, such as staff club house need to be provided, well equipped and well maintained. This will enhance their inter-personal relations as well as reducing their job stress thereby improving their trait- based performance.
- 3. The management of the Polytechnics need to develop organizational policies that give individuals more control over their work activities, develop support systems, shared goals and directions. In this regard, older lecturers should find ways of delegating their jobs to younger assistants in order to reduce the effect of stress. They should also find ways of adapting to changing priorities and demands.



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