

TITLE PAGE

**DEMOGRAPHIC VARIABLES AND WORK STRESS AMONG ACADEMIC
ADMINISTRATORS OF UNIVERSITIES IN SOUTH EAST NIGERIA**

BY

**NWOSU PATIENCE OKWUDIRI
PG/Ph.D/11/59163**

**A THESIS PRESENTED TO THE DEPARTMENT OF EDUCATIONAL
FOUNDATIONS, FACULTY OF EDUCATION, UNIVERSITY OF NIGERIA, NSUKKA.
IN FULFILMENT OF THE REQUIREMENTS FOR THE AWARD OF THE DEGREE
OF DOCTOR OF PHILOSOPHY (Ph.D) IN EDUCATIONAL ADMINISTRATION AND
PLANNING**

**SUPERVISOR
DR. A.I. OBOEGBULEM**

JANUARY, 2016

APPROVAL PAGE

**THIS THESIS HAS BEEN APPROVED FOR THE DEPARTMENT OF EDUCATIONAL
FOUNDATIONS, FACULTY OF EDUCATION, UNIVERSITY OF NIGERIA NSUKKA**

BY

Dr. A.I. Oboegbulem
Supervisor

Internal Examiner

External Examiner

Prof. C.J.A. Onwuka
Head of Department

Prof. U.C. Umoh
Dean, Faculty of Education

CERTIFICATION

Nwosu, Patience Okwudiri, a postgraduate student in the Department of Educational Foundations, with registration number: PG/Ph.D/11/59163 has satisfactorily completed the requirements for the research work for the degree of Doctor of Philosophy (Ph.D) in Educational Administration and Planning. The work embodied in this thesis is original and has not been submitted in part or full for any other Diploma or degree programme of this university or to any other institution of learning.

Nwosu, Patience Okwudiri
Student

Dr. A. I. Oboegbulem
Supervisor

DEDICATION

This work is dedicated to the Almighty God, who gave me the enablement to pursue this programme and carry out this research. I remain forever grateful. Thank you Lord.

ACKNOWLEDGEMENTS

The researcher gives oodles of gratitude to the Almighty God, who in His infinite mercies gave her the enablement to carry out this research. Immense gratitude is extended to the Vice Chancellor and entire Management of Taraba State University, Jalingo, for granting the researcher study leave and the opportunity to pursue this programme.

The researcher profusely appreciates her wonderful supervisor, Dr. A.I. Oboegbulem, for her sincerity of purpose, expert advice, mentorship, love and for sparing no efforts towards the successful completion of this work. She played the tripartite role of a mother, a friend and an academic adviser. Her husband Prof. S.I. Oboegbulem is equally appreciated for all his advice and encouragement.

The researcher specially appreciates Dr. E.N. Nwosu, who despite her tight schedule, found time to read and edit this work. Her sincere encouragement gave impetus to the successful completion of this work. She has been more of a sister than a friend. Her labour of love can never be forgotten. Equally appreciated is her loving husband, Comrade Romanus Aye, for his sincere encouragement. Appreciated also in this regard, is the efforts of Rev. Dr. L.K. Ejionueme, who always found time to read and edit this work. His indefatigability and dedication were clearly manifested in making this research work possible. Also remembered, are the contributions of Prof. P.C. Enemuo, Dr. J. J. Agah, Dr. B.C. Madu, Dr. S. C. Ugwoke, and Dr. Victor Nwachukwu, for reading through this work and making inputs where necessary. The researcher's special thanks equally extend to the head of Department, Prof. C.J.A. Onwuka, Prof. Joy Nwoji, Prof. N.O. Ogbonnaya, Prof. S.A. Ezeudu, Prof. A.N. Okolo, Prof. P. N. Onwuasoanya, Dr. J. C. Omeje, Dr. F. M. Onu, Dr. T. O. Oforka, Dr. A. I. Akaneme and Mr. Christian Ugwuanyi, for their unalloyed support, during the course of the study. The researcher's gratefulness also extends to Mr. Charles Njoku, and his mother, Mrs. Veronica Njoku, for their

sincere love, care and encouragement in the course of running this programme, which were quite noteworthy. Mr, Edet Udoakang is also appreciated in this regard for his financial and moral support.

The researcher is also grateful to her Research Assistants: Rev, Sis. Clementina Kanu, Isaac Mbaji, Henry Ajuzie, Charles Njoku, Deborah Ibe, Anna Alfred, Izuchukwu Akamigbo, Chibuzo Nwankwo and Innocencia Chidebelu, for their untiring efforts and perseverance in the course of administering and retrieving the research instrument. The researcher's gratitude also extends to the following friends and well wishers whose advice and encouragement were noteworthy: Prof. S.A.N.D. Chidebelu, Dr. Peter, Ikemefuna Ezeaku, Dr. Catherine Asashim, Dr. Iniobong Nkang, Dr. Joseph Lucas, Dr. Solomon Iyekekpolo, Dr. Johnson Agbo, Dr. Garba Hassan, Dr. Fred Ayokhai, Rev. Faith Estons, Mrs. Eucharua Ugwuja, Dr, Ukpai Eni, Dr. Prince Egwuasi, Dr. Anietie Tom, Dr. G.O. Okagu, Dr. Paul, T. Haaga, Thomas Akobi, Miss Uche Asogwa, Miss Ngozi Attama, Miss Faith Mesagan, Miss Rita Asomadu and Joseph Ogar

The researcher equally appreciates the assistance of the deans, heads of departments and directors of Institutes/Centers of university of Nigeria, Nsukka, Federal University of Technology, Owerri, Nnamdi Azikiwe University, Awka, Michael Okpara University of Agriculture, Umudike, Umuahia, Federal University, Ndofu-Alike, Ikwo, Ebonyi State, Abia State University, Uturu, Enugu State University of Science and Technology, Imo State University, Owerri and Chukwuemeka Odumegwu Ojukwu University, Uli, who constituted the subjects for this research work.

Finally, the researcher sincerely appreciates her loving husband and kids, for the understanding they showed in the course of running this programme and carrying out this research work. The researcher prays that, God will do for all of you, what you cannot do for yourselves, in Jesus Name, Amen!

TABLE OF CONTENTS

Title page	i
Approval page	ii
Certification	iii
Dedication	iv
Acknowledgements	v
List of tables	ix
List of figures	xi
Abstract	xii
Table of contents	
CHAPTER ONE: INTRODUCTION	1
Background of the Study	1
Statement of the Problem	14
Purpose of the Study	15
Significance of the Study	16
Scope of the Study	18
Research Questions	18
Hypotheses	19
CHAPTER TWO: REVIEW OF LITERATURE	20
Conceptual framework	21
Concept of stress	21
Concept of work stress	30
Concept of administration	57
Concept of university administration	60
Concept of academic administrators of universities	63
Concept of demographic variables	67
Schematic diagram of the relationship between the variables	81
Theoretical Framework	82
The General Adaptation Syndrome (GAS) Theory	82
The Person-Environment (P.E) Fit Theory	84
The Transactional Model of Stress	85
Getzels and Guba's theory of organizational behaviour	85

Review of Empirical Studies	87
Studies on work stress factors	87
Studies on work stress and job performance	90
Studies on demographic variables and work stress	94
Studies on stress management strategies	99
Summary of Literature Review	102
CHAPTER THREE: RESEARCH METHOD	105
Design of the Study	105
Area of the Study	105
Population of the Study	107
Sample and Sampling Technique	107
Instrument for Data Collection	107
Validation of the Instrument	108
Reliability of the Instrument	108
Method of Data Collection	109
Method of Data Analysis	110
CHAPTER FOUR: RESULTS	111
CHAPTER FIVE: DISCUSSION OF RESULTS, CONCLUSIONS, EDUCATIONAL IMPLICATIONS, RECOMMENDATIONS AND SUMMARY	145
Discussion of Findings	145
Conclusions	162
Educational Implications of the Findings	163
Recommendations	165
Limitations of the Study	166
Suggestions for Further Research	167
Summary of the Study	167
REFERENCES	171
APPENDICES	
Appendix A: Letter of introduction to the respondents	193
Appendix B: Instrument for data collection.	194
Appendix C: Computation of trial testing	198

Appendix D: Population of academic administrators of universities in South East, Nigeria.	205
Appendix E: Output of data analysis.	206

LIST OF TABLES

TABLES	PAGE
Table 1: Mean ratings of academic administrators of federal and state universities in South East, Nigeria, on factors that induce work stress.	112
Table 2: Mean ratings of academic administrators of universities in South East, Nigeria, on the impact of work stress on job performance based on institutional ownership.	114
Table 3: t-test analysis of the significant difference between the mean ratings of academic administrators of universities in South East, Nigeria, with regards to the impact of work stress on job performance based on institutional ownership.	116
Table 4: Mean ratings of academic administrators of universities in South East, Nigeria, on the impact of work stress on job performance based on gender.	120
Table 5: t-test analysis of the significant difference between the mean ratings of academic administrators of universities in South East, Nigeria, with regards to the impact of work stress on job performance based on gender.	122
Table 6: Mean ratings of academic administrators of universities in South East, Nigeria on the impact of work stress on job performance based on age.	125
Table 7: ANOVA of the significant difference between the mean ratings of academic administrators of universities in South East, Nigeria, with regards to the impact of work stress on job performance based on age.	128
Table 8: Mean ratings of academic administrators of universities in South East, Nigeria On the impact of work stress on job performance based on work experience.	129
Table 9: t-test analysis of the significant difference between the mean ratings of academic administrators of universities in South East, Nigeria, with regards to the impact of work stress on job performance based on work experience.	132
Table 10: Mean ratings of academic administrators of universities in South East, Nigeria on the impact of work stress on job performance based on educational qualification.	136

Table 11: t-test analysis of the significant difference between the mean ratings of academic administrators of universities in South East, Nigeria, with regards to the impact of work stress on job performance based on educational qualification.	138
Table 12: Mean ratings of academic administrators of universities in South East, Nigeria, on the stress management strategies employed in dealing with work stress.	142

LIST OF FIGURES

Fig 1: Schematic diagram of the inter-relationship between the concepts.	81
--	----

Abstract

The study investigated demographic variables and work stress among academic administrators of universities in South East Nigeria. Seven research questions and five null hypotheses guided the study. The ex post facto research design was employed in the study. The population of the study comprised 786 academic administrators in all the ten public universities in South East, Nigeria. All the 786 academic administrators were used as sample for the study, so there was no sampling because of the manageable size of the population. A researcher-developed questionnaire titled Demographic Variables and Work Stress Questionnaire (DVWSQ) was used for data collection. The instrument was face-validated by three experts, two from Educational Administration and Planning, and one from Measurement and Evaluation, all from Faculty of Education, University of Nigeria, Nsukka. Cronbach Alpha was used to ascertain the internal consistency of the instrument, which yielded reliability indices of 0.85 for part 1, 0.79, 0.78, 0.85 and 0.72 respectively for part 11 (clusters A, B, C, D), 0.79, 0.79 and 0.72 respectively for part 111 (clusters A, B, C). Data collected were analyzed using mean ($\bar{X}$) and standard deviation (SD) to answer the research questions, while t-test statistics and Analysis of Variance (ANOVA) were used to test the null hypotheses at 0.05 level of significance. The results of the study revealed that academic administrators of federal and state universities suffer from work stress emanating from factors such as lack of adequate resources, combining academic responsibilities with administrative duties, pressure of meeting up with the semester calendar, demand of official work on their private time, stagnation in promotion, among others. It was also found that work stress impacted on the job performance of academic administrators through: burn out, which reduced their efficiency at work, sleep difficulties which made them unable to respond quickly to demands placed on them, difficulties in concentration, leading to aggressiveness to staff and students, forgetting important things, which made them incapable of meeting up with work schedules, among others. The responses of academic administrators on the impact of work stress on their job performance differed significantly ($p < 0.05$) based on institutional ownership, with federal universities having a higher mean rating. The responses also differed ($p < 0.05$) based on educational qualification, with Ph.D holders having higher mean ratings. The responses of the academic administrators did not differ significantly ($P > 0.05$) based on gender, age and work experience. The study further showed that the academic administrators dealt with work stress through the adoption of stress management strategies such as: engaging in regular exercises, getting adequate sleep, taking vital medications, engaging in leisure activities, delegating responsibilities to subordinates, allocating time to specific tasks according to their degree of importance, among others. Based on the findings, the researcher recommended among others that: university management should continually motivate academic administrators and other academic staff, by providing them with the necessary infrastructural facilities needed to carry out their jobs, such as conducive offices, adequate classrooms, instructional resources, among others. Management of federal and state universities should always promote an awareness of health knowledge in their institutions, by regularly organizing seminars and workshops for the academic administrators and other academic staff, on the strategies for coping with work stress, using physical health experts, social workers, guidance counsellors and stress management experts. More academic staff should be employed to reduce the excessive responsibilities placed on the shoulders of the academic administrators (especially Ph.D holders), so as to counter the impact of the stress emanating from performance of both academic and administrative responsibilities. Educational implications of the study were also highlighted based on the findings of the study.

CHAPTER ONE

INTRODUCTION

Background of the Study

The pressures of modern life, coupled with job demands and family responsibilities can lead to emotional imbalances collectively labeled as stress. Stress-related problems have become so severe that they disrupt an individual's ability to function effectively, especially in trying to balance work and family responsibilities. Human beings have needs and are saddled with many responsibilities, and there is deep hunger in people to satisfy these needs. As efforts are geared towards meeting those needs, people find themselves in stressful situations. Thus, regardless of one's capacity and resourcefulness in dealing with problems, human beings live in a world where survival is a constant daily challenge, thereby making stress inevitable.

Stress has a plethora of definitions. Mcshane and Glinow (2003) viewed stress as an adaptive response of the body to a situation that is perceived as challenging or threatening to a person's well-being. Oboegbulem (2007) defined stress as a feeling which occurs when an individual's working or living conditions or circumstances make demands beyond the individual's capacity to handle such a situation physically or emotionally. Koolhas (2011), lending credence to Oboegbulem's definition, states that stress is a condition where an environmental demand far exceeds the natural regulatory capacity of an individual. Drawing inferences from the definitions above, it could be deduced that stress involves interplay of different factors within an individual which could predispose such an individual to react in some way- a reaction that could produce tension. Stress is defined in this study as the psychological and physical state that results, when the resources of an individual are not sufficient to cope with the demands and pressures of a situation, such that the individual begins to feel tensed. It is the

adverse reaction of an individual to excessive pressure emanating from within or outside the person that could produce tension.

Stress knows no barriers. It attacks everybody. For instance, students may experience stress in trying to cope with academic demands; people in business may be stressed in their drive to buy, sell, render services and make profits; housewives may suffer stress in their management of home affairs; civil servants may contend with stress in their bid to get tasks completed on schedule; teachers and educational administrators at all levels of the educational system may encounter stress in the discharge of their academic and administrative responsibilities. It therefore follows that stress has become a general issue that affects individuals everywhere. However, this study is interested in stress in workplaces, with particular reference to universities. Stress at work is referred to as work stress.

Work stress may be defined as a situation that arises when there is discrepancy between the demands of a workplace and an individual's ability to carry out and complete those demands (Cooper, Dewey & Michael, 2001). Akimboye, Akimboye and Adeyemo (2002) viewed work stress as the physical, mental and emotional wear and tear, brought about by the incongruence between the requirements of a job, capabilities, resources and needs of the employees to cope with job demands. Implicit in the above definitions is that work stress is not just the idea of physical labour, but also the wear and tear on people's mental health, occasioned by job demands. It is a combination of factors in the work life of an individual which if unnoticed and uncontrolled, may progressively lead to poor health, which may also affect the individual's job. Work stress is defined in this study as the physical and emotional responses that occur when the requirements of a job do not match with the capabilities, resources and needs of the worker. It occurs when an individual experiences an overload of stressors stemming from the work environment.

Work stress could emanate from a number of factors that may be intrinsic or extrinsic to the job. Some factors that are intrinsic to the job include: long hours of work, work overload, time pressure, poor physical work conditions, among others (Michie, 2002). Some extrinsic factors as noted by Khan and Igbal (2013) include: job security, salary, promotion, relationship with co-workers and supervisors, among others. Other work stress factors, according to Sherring and Knight (2009) may include: inadequate salaries and wages, lack of promotion, lack of job security, poor relationship at work, paucity of resources, lack of involvement in decision making, interface between work and home, among others. Taiwo (2005) identified some stress factors relating particularly to the academic system to include: workload pressure, competition for research funding, pressure to conduct researches for promotion, combination of teaching and administrative responsibilities, low morale resulting from the erosion in the prestige of academic work, among others.

Work stress can have extreme negative consequences on individuals. Research reports from the National Institute for Mental Health (NIMH) (2013) revealed that it accounts for over 70% of deaths among workers. Another report from the National Institute for Occupational Safety and Health (NIOSH) (1999) showed that most employees view their jobs as the number one stressor in their lives and jobs. Oboegbulem and Onwurah (2011) noted that research works in the area of stress, have shown that some workers have committed suicide as a result of depression in their places of work. Thus, work stress may have far-reaching effects on the employees and the organizations in which they are employed

The effects of work stress on an individual could be physical or psychological. Physically, work stress can trigger or exacerbate different forms of ill health on the victim such as: muscle aches, stomach aches, headaches, constipation, diarrhea, insomnia, dizziness, loss of appetite, among others (Caple, 2001). The author also maintained that work stress can also lead to scarier

physiological disorders which can easily lead to death, such as: rising blood pressure, elevated cholesterol levels, immune system dysfunction, coronary heart diseases, respiratory disorders, among others. Psychologically, work stress affects workers mentally, emotionally and behaviorally. The mental effects may include forgetfulness, hallucinations, schizophrenia among others. The emotional effects may include depression, anxiety, sadness, anger, among others. The behavioural effects may include restlessness, withdrawal, substance abuse, among others (Caple, 2001). These effects on workers may result to job dissatisfaction, absenteeism, lateness to work, workplace accidents, breakdown in interpersonal relations with colleagues, among others, which may also be associated with low job performance (Fairbrother & Warn, 2003).

However, it is pertinent to point out that the effects of work stress may not always be negative. Work stress may also impact on an employee's job performance positively. There is a positive side of stress that can improve job performance known as eustress, which refers to stress associated with positive feelings and a healthy physical state (Kupriyanov & Zhadnov, 2014). Mcshane and Glinow (2003) defined eustress as healthy, positive, outcome of stressful events and the stress response. Some examples of eustress according to the authors may include: giving birth to a child, falling in love, starting a new job, among others. The authors averred that eustress is related to well-being and positive attitudes which may increase work performance. They however, quickly added that, continuously increased level of work stress can tend towards a situation where the quality of an individual's health and consequently, job performance can be adversely affected. This study focused on the negative impact of stress known as distress.

Work stress is prevalent in today's fast-paced society, affecting employees in many nations around the world. Thomas, Matherne, Buboltz and Doyle (2012) reported that many studies carried out in the United States, Europe and Asia indicate that work stress is very prevalent among workers. Cases of stress are not restricted to America, Europe and Asia. The situation is

the same in African countries like Nigeria, Ghana, Cameroon, among others, as reported by Clifford (2005). In Nigeria, for example, some studies have been conducted on teachers' stress, such as Oboegbulem (2001) who reported that stress was prevalent among primary school teachers in South East Nigeria. Akpochafo (2012) reported that primary school teachers in Delta State, Nigeria, suffered severe work related stress, among others. Stress at work is known to affect various employees irrespective of their professions, including university employees.

Stress has been observed to be prevalent among university staff especially the academic staff. Noordin and Jusoff (2009) noted that academic staff of universities face high degree of stress that could affect their satisfaction, physical or mental health, which may ultimately impact on their job performance. Taylor (2008) reported that new research into stress levels at universities shows that 97.24 percent of academics very strongly agree that their job is very stressful. Ashley (2008) asserted that the university sector is failing to meet standards of psychosocial working conditions which may be detrimental to the goals of university education. A survey of people working at universities in the United Kingdom, as reported by Lezard (2011), revealed that 81 percent of the academics found their jobs very stressful in 2010 compared to 74 percent in 2008. It therefore follows that universities seem to be getting a reputation as stressful places to work and the problem also seem to be getting worse. This situation also seems to be the case in Nigerian universities. Ofoegbu and Nwadiani (2006) observed that despite the nation's acceptance of the importance of university education and the role it plays in satisfying manpower needs, there is growing evidence that there are no universities in Nigeria, private or public, federal or state, that will genuinely claim to enjoy the basic facilities for teaching and research. Ekundayo and Ajayi (2009) noted that the Nigerian university system has been in a state of anxiety and frequent crises such as financial crisis, infrastructural deterioration, brain drain syndrome, paucity of resources, among others. Nwadiani and Akpotu, (2012) stated that salaries

and general conditions of service are uninspiring, while the attainment of the basic necessities of life has become a mirage. Thus, the work-life of academics in Nigerian universities is seemingly becoming very frustrating, which may contribute in creating stress for them.

Universities in the South East Nigeria are not exempted from the above scenario, which arises probably from observed uncomfortable conditions of the environment in which the staff, especially the academic staff, operate. Chiaha, Eze and Ezeudu (2013) lamented that universities in the South East, unlike other universities in Nigeria, have suffered the crunch of the three-year civil war which made them lag behind developmentally, economically and academically. Egu, Ememe, Obike and Obiuto (2014) noted that recreational facilities for students and lecturers, free medical services for staff and their families, conference sponsorship, good housing facilities for staff, research packages, overseas trips for conferences, sponsorship for further academic pursuits, among others, which used to be the attraction to higher institution teaching are gradually eroding away. The authors further lamented that in universities in the South East, there has been the problem of sharp rise in students' population growth due to unbridled desire for education. This, according to the authors, has led to astronomical upsurge in university enrolment, without corresponding growth in facilities such as basic instructional facilities, recreation and hygiene, lack of staff welfare packages and the colossal problem of stagnation and delay in promotion, among others. These could expose the lecturers to much stress capable of forcing them to deviate from normal functioning, thereby adversely affecting academic activities.

In South East, Nigeria, there are ten public universities made up of five federal and five state-owned universities. These universities strive towards the attainment of their objectives by establishing different faculties, departments and institutes/centers, and the recruitment of academic staff to teach various courses within the various academic programmes. These faculties, departments and institutes/centers are placed on the shoulders of a group of academic

staff designated as ‘academic administrators’ who perform both academic and administrative duties.

Administration may be defined as the cooperative human efforts aimed at achieving set objectives, or the activities of a group cooperating to accomplish common goals (Ikeanyibe, 2009). Administration is defined in this study as the authoritative art of getting things done through the coordination of efforts of others. It is the act of directing people towards accomplishing a goal. Thus, anybody that does the work of administration in an organization is an administrator. Administration in the educational parlance may be defined as a process of achieving the goals of education through the prudent, effective and efficient co-ordination of available human and material resources (Nkang, 2002). An educational administrator therefore organizes and manages the activities that enable effective running of an educational institution. An example of educational administrator is a university administrator. It therefore follows that a university administrator is one who holds an administrative position in a university system.

In the university system, there are two types of administrators: the non-academic and academic administrators. The non-academic administrators are those administrators that carry out pure administrative duties without being involved in teaching and research. Apart from the Vice-Chancellor and his/her deputies, others include: the Registrar, Deputy Registrars, the Senior Assistant Registrars, the Assistant Registrars, the Admission officers, the Bursar, the Director of Works, Chief Medical Officer, Chief Security Officer, among others. On the other hand, the academic administrators are those administrators who combine administrative duties with academic responsibilities of teaching, research and publishing. They include: deans of faculties, heads of academic departments, directors of institutes/centers and others (Maree, 2000).

The dean is typically the head of a faculty, which may include several academic departments (Maree, 2003). According to Graham (2013), deans of faculties occupy a unique

place among academic administrators as the facilitating link among departmental chairpersons, directors of institutes and centers, faculty members, staff, students, university leadership and external bodies. Some of their functions include: developing and updating academic plan for the faculty within the larger framework of the university, overseeing all faculty governance, such as: development, approval and reviews of all the departmental programmes, staffing, promotion and tenure of staff, liaising with the heads of departments to schedule courses in line with applicable university policies and established procedures, among others. The heads of departments follow after the Dean and are also very important as the heads of basic academic units in the university. They work with the deans to achieve faculty and university objectives and are accountable to the deans. Some of their functions include: managing funds, staff and other resources of the departments effectively and efficiently within the budget and in compliance with financial regulations, engaging in research and teaching among others. The directors of centers/institutes also occupy unique place in academic administration. In some universities, academic directors may include director of distance learning programme, director of centre for entrepreneurship studies, director of counseling centre, director of institute of education, among others, depending on what is available in a particular university. They generally act as the facilitating link among deans of faculties, other school directors, departmental heads, faculty and departmental members, staff, students and university leadership among others (Academic Regulations of the various universities, 2013/2014 Academic session).

Following the myriad of responsibilities as stated above, the academic administrators may not be exempted from stress at work as they seem to be caught in a vortex of competing interests and tasks which are becoming more difficult as the days go by. These interests and tasks are made up of daily administrative and academic responsibilities. Thus, more responsibilities and duties seem to be crammed into the academic administrators' job which could translate into

new sources of stress. In other words, it could be said that the academic administrators may be more vulnerable to stress than other lecturers because they find themselves not only doing those things other lecturers do (teaching, research and publishing), but they equally carry out the administrative responsibilities of their faculties, departments and centres. These competing roles could cause stress for the academic administrators, particularly when they find it difficult to cope with the challenges of living up to the expectations of their jobs. Bamasaiyi's study as cited in Peretomode (2012) revealed that educational administrators in Nigeria are being subjected to stress and tension within the Nigerian educational system. Essien (2010) reported that some school administrators in Nigeria have been made ineffective by stressful situations and that some have even slumped and died while on duty. Thus, the diverse challenges as observed in universities in the South East could lead to frustrations which may give rise to stress, with adverse consequences on the health and well being of the academic administrators and, in extreme cases, may result to death. There is therefore the need to investigate work stress among academic administrators of universities in South East, Nigeria.

It has been observed that the impact of work stress among workers may also be mediated by some other factors such as demographic variables. Demographic variables are defined as background variables that contain information necessary to define homogenous sub groups to establish causal relations between attitudes and societal facts and to define differences between scores on scales (Braun & Mohler, 2004). Demographic variables are defined in this study as varying characteristics or social statistics of an individual, sample group or population expressed in a statistical manner. They describe the context in which a person acts. Scholars such as Garrossa, Jimenez, Liang and Gonzalez (2006), observed that demographic variables may be important factors to be considered in the experience of work stress among workers. Ramya and Mallika (2013) noted that demographic variables may influence the way and manner work stress

affects employees. Examples of demographic variables include: age, income level, language, birth rate, death rate, location, gender, family size, marital status, work experience, religion, institutional ownership, ethnicity, occupation, employment status, academic qualification, among others. The demographic variables in focus in this study are institutional ownership, gender, age, work experience and educational qualification.

Ownership may be defined as the state or fact of owning something that belongs to one (Hornby, 2001). Ownership in this study is defined as the right of possession, control, management and use of a thing or property. It is the act or right of possessing something. An institution may be defined as an organization founded on a religious, educational, professional or social purpose (Hodgson, 2006). Institution is defined in this study as an organization or establishment founded for a specific purpose. Some examples of institutions are financial institutions, religious institutions, educational institutions, among others. The university is an example of educational institution. Institutional ownership, in this study, refers to university ownership or management. In Nigeria, there are three types of universities based on ownership. These are federal, state and private universities. The federal universities are established, owned and run by the federal government, the state universities are established, owned and run by the state governments, while the private universities are established, owned and run by private individuals and organizations. This study focuses on federal and state universities. Some scholars have expressed opinions concerning institutional ownership and work stress. For instance, Triantoro, Othman and Wahab (2012) averred that ownership of university may have an influence on increasing job complexity on academic staff, which may lead to the possibility of forming different levels of stressful working conditions. Ejue (2013) opined that work stress may be more pronounced among workers in state universities than their counterparts in federal

universities. However, Nwadiani and Ofoegbu (2001) posited that there is no university whether private, state or federal that may be immune to the forces of work stress.

Gender may be defined as social and historical constructs for masculine and feminine roles, behaviours, attributes and ideologies, which connote some notion of biological sex (Azikiwe, 2002). In this study, it goes beyond male and female perception but rather conceived as a social construct, social attributes and opportunities associated with being male or female. Thus, gender is related to how men and women are perceived and expected to think and act as men and women, because of the way society is organized, not because of biological differences. There are various opinions concerning gender and work stress by scholars. For instance, Antoniou, Polychroni and Vlachakiss (2006) opined that men may more likely suffer pressure arising from work stress than females. Matud (2004) observed that women may experience more stress than men and may handle stress better. However, researchers such as Winefield and Jarret (2001) hold that an individual may suffer from the effects of stress at work irrespective of gender differences.

Another demographic variable that may influence work stress among employees is age. Nauert (2010) defined age as the number of years that someone has lived, or the number of years that something has existed. Age is defined in this study, as the period of time that has elapsed since the birth of an individual, or the length of time that an individual has existed. Blaug, Kenyon and Lekki (2007) posit that age is one of the range of factors that may affect an individual's stress situation. However, Garrossa et al (2006) stated that there may be no age at which a person may be exempted from work stress and its impact.

Work experience may be another demographic factor to be considered in the experience of work stress. Ibia (2006) defined work experience as knowledge that arises from being on a job and interacting with and learning from the circumstances of the job. Work experience is defined

in this study as the knowledge an individual accumulates in the course of doing a particular work over a period of time. It therefore follows that work experience in a university setting can be seen as years of personal involvement with teaching and research in a university. According to Okore (2011), academics vary in their years of teaching experience, which represent how mature people are in their careers and how ready they are to embrace change. While Klassen and Chiu (2010) opined that increase in years of work experience may likely lead to increased work stress among workers, Charturvedi and Purushotamam (2009) hold the view that increase in years of work experience may lead to better ability in coping with work stress among workers..

Educational qualification may be defined as the extent of one's educational attainment represented in the quality of certificates which the individual has obtained from educational institutions (Legender & Kraft, 2003). Educational qualification is defined in this study, as the degrees obtained by an individual which certify the completion of specific academic programmes. Some scholars like Wilson, Pritchard and Revalee (2005) observed that people with higher educational qualification may likely experience fewer stressful situations and manage stress better than those with lower educational qualifications. Yet, other scholars like Gallow and Mattews (2003) are of the view that people with lower educational qualification may suffer lower levels of stress and may be better stress managers than those with higher educational qualification.

Since it has been stated that stress is a global problem that affects individuals in their personal lives and work places, which has invariably created set-backs for both organizations and their workers, there is the need to examine stress management strategies that would enable the workers manage the phenomenon of work stress. Stress management, according to Ahmed, Lemkau and Hershberger (2011), is defined as efforts involved in trying to control and reduce the tensions that occur in stressful situations. Thus, stress management involves various

strategies intended to help people deal more effectively with stress. Ukpai (2002) defined stress management strategies as the cognitive and behavioural efforts aimed at managing specific external or internal demands appraised as taxing the resources of an individual. Stress management strategies are defined in this study, as the techniques or measures used to reduce the actual amount of stress caused by a potential stressor. They involve a wide range of techniques or activities aimed at controlling an individual's level of stress for the purpose of improving everyday functioning. Some of these strategies include: physiological strategies such as engaging in regular exercises, getting adequate sleep, among others, cognitive and psychological strategies such as use of laughter, relying on supportive colleagues, among others, and interpersonal and organizational management strategies such as delegating responsibilities to subordinates, avoiding scheduling too many appointments, among others (Bower & Segerstrom, 2004).

In South East, Nigeria, as in other parts of the country, the ability of the universities to successfully achieve the laudable aims and objectives of university education, to a large extent, depends on the quality, effectiveness and performance of the academic staff, especially the academic administrators (deans of faculties, heads of departments and directors of institutes and centers). The academic administrators may find it difficult to achieve these objectives if they are predisposed to stress at work, with the observed consequences on their well-being and job performance. There is therefore the need to examine the factors that induce them to work stress, the impact of work stress on their job performance and the strategies that can be adopted for managing stress at work. Since it has also been observed that the experience of work stress and its impact could be mediated by demographic variables, there is also the need to examine the impact of work stress on academic administrators' job performance based on the demographic variables of institutional ownership, gender, age, work experience and educational qualification. This is the cardinal thrust of this study.

Statement of the Problem

Over the past few decades, universities in Nigeria - both public and private, Federal and State, have undergone substantial changes and growth, thus making effective management to become very challenging. The administrators, especially the academic administrators, seem to be caught in a vortex of competing interests and tasks which are becoming more demanding. Apart from their normal duties of teaching, research and publishing, they equally shoulder the numerous administrative duties of their faculties/departments/centers. The ability of the academic administrators to withhold, contain and contend with the responsibilities and challenges of their positions largely depend on their capacities and capabilities, which could also invariably depend on the environment in which they operate.

The environment in which the academic administrators of universities, including those in the South East, operate are filled with challenging situations which are stressful to their well being. Some of the benefits which used to be the attraction to higher institution teaching such as free medical services for staff and families, good housing facilities for staff, conference sponsorship, research packages, overseas trips for conferences, sponsorship for further academic pursuits, among others, are gradually eroding away. There are also noticeable conditions of lack of instructional resources and recreational facilities, overcrowded offices and lecture rooms, poor hygienic conditions, delay in promotion of staff, among others. Despite all the challenges, the lecturers, especially the academic administrators, are still expected to perform optimally in their jobs, made up of the combination of both academic and administrative duties. These are capable of predisposing them to stress at work, with its attendant consequences on their well being and productivity.

Against the backdrop of the dire consequences of work stress such as health-related problems, which may include burn out, high blood pressure, elevated cholesterol levels, loss of

memory, migraines, sleep difficulties, among others, which may lead to poor concentration, absenteeism, job dissatisfaction, diminishing productivity and consequently poor performance of students, academic administrators of universities in South East, Nigeria have no alternative than to address the sources of work stress in their lives and identify ways of managing work stress. They equally need to know the impact of work stress on their job performance, which (as has been observed), may be mediated by demographic variables. Although some studies have been done on the relationship between these variables and work stress, no study, known to the researcher, related the variables to the impact of work stress on job performance, especially among academic administrators of universities in South East, Nigeria. It is against this background that this study investigated demographic variables and work stress among academic administrators of universities in South East, Nigeria.

Purpose of the Study

The main purpose of the study was to investigate demographic variables and work stress among academic administrators of universities in South East Nigeria. Specifically, the study sought to:

- (1) Find out the factors that induce work stress among academic administrators of federal and state universities in South East Nigeria.
- (2) Determine the impact of work stress on academic administrators' job performance in universities in South East Nigeria based on institutional ownership.
- (3) Determine the impact of work stress on academic administrators' job performance in universities in South East Nigeria based on gender.
- (4) Ascertain the impact of work stress on academic administrators' job performance in universities in South East Nigeria based on age.

- (5) Examine the impact of work stress on academic administrators' job performance in universities in South East Nigeria based on work experience.
- (6) Find out the impact of work stress on academic administrators' job performance in universities in South East Nigeria based on educational qualification.
- (7) Identify the stress management strategies employed by academic administrators of federal and state universities in South East Nigeria in dealing work stress.

Significance of the study

The findings of this study have both theoretical and practical significance. The theoretical significance of the study hinges on the Person-Environment (P.E) fit theory of stress as developed by French, Rodgers and Cobb in 1974. The theory emphasizes that stress is more likely to occur when there is discrepancy between the motives of a person and the supplies of the environment, or between the demands of a job and the abilities of an individual to meet those demands. Thus, work stress arises from misfit between a person and the job environment. The relevance of this theory to the study is that work stress among academic administrators could ensue when there is a mismatch or discrepancy between them, their expectations and the demands of their jobs. The findings of the study may agree or disagree with this claim, against the backdrop of the impact of work stress on job performance among academic administrators.

On the aspect of practical significance, the study will be of immense benefit to the following: the academic administrators of universities, the entire university community (academic and non-academic staff), university authorities, university students, the general public and future researchers.

The academic administrators of universities in South East Nigeria will be the prime beneficiaries of the findings of this study as it will reveal the main sources of stress, the problems work stress poses to their work and well-being, and the implications of their demographic

characteristics in the experience of work stress. The findings will also equip them on various management strategies to cope with work stress.

The findings will serve as a source of reference to the entire university community (made up of academic, non- academic staff and students) as it will inform them on various strategies that could be employed to manage work stress. This could be achieved through organizing seminars/workshops on stress management for the university communities.

The findings of the study will enable the management of federal and state universities to recognize factors that induce academic administrators to work stress, taking into account how federal and state, males and females, older and younger, experienced and less experienced, more educated and less educated academic administrators perceive stress at work. The recognition of these factors would enable them take necessary intervention steps to reduce the job stressors, such as organizing stress management seminars where medical experts are used as resource person to educate the academic administrators and other staff on the dangers of work stress.

University students will also benefit from the findings of this study. The findings will expose the various management strategies that can be adopted to cope with work stress. These strategies can be made available to them through the organization of peer-educators programme or peer counseling sessions for students on stress management strategies that will help them cope with stress

The general public will also benefit from the findings of this study as it will sensitize them on the causative factors of work stress, impact of work stress and on ways of managing work stress, through exposition of the various strategies. This could be achieved through organizing public enlightenment campaigns in the university campuses on health consequences of stress and stress management strategies, by the management of the universities.

The study is expected to contribute immensely to scholarship as it will add to the body of existing literature on stress, thereby providing more intellectual illumination, and invariably guide future researchers who might want to explore other related areas of the subject matter.

Scope of the study

This study covered all the public universities in South East, Nigeria made up of five federal and five state universities. The study covered all the academic administrators made up of Deans of Faculties, Heads of Departments and Directors of institutes and centers. The content scope focused on demographic variables such as institutional ownership, gender, age, work experience and educational qualification of academic administrators. The content scope also covered factors that induce work stress, impact of work stress on job performance of academic administrators and stress management strategies employed by academic administrators, in dealing with work stress.

Research Questions

The following research questions guided the study:

- (1) What are the factors that induce work stress among academic administrators of federal and state universities in South East Nigeria?
- (2) What is the impact of work stress on academic administrators' job performance in universities in South East Nigeria based on institutional ownership.
- (3) What is the impact of work stress on academic administrators' job performance in universities in South East Nigeria based on gender?
- (4) What is the impact of work stress on academic administrators' job performance in universities in South East Nigeria based on age?
- (5) What is the impact of work stress on academic administrators' Job performance in universities in South East Nigeria based on work experience?

- (6) What is the impact of work stress on academic administrators' Job performance in universities in South East Nigeria based on educational qualification?
- (7) What are the stress management strategies employed by academic administrators of federal and state Universities in South East Nigeria in dealing with work stress?

Hypotheses

The following null hypotheses were formulated to guide the study and were tested at 0.05 level of significance.

- H₀₁ There is no significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on institutional ownership.
- H₀₂ There is no significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on gender.
- H₀₃. There is no significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on age.
- H₀₄. There is no significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on work experience.
- H₀₅ There is no significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on educational qualification.

CHAPTER TWO

REVIEW OF LITERATURE

This chapter reviewed literature related to the study under the following sub-headings: conceptual framework, theoretical framework, review of empirical studies and summary of literature review.

Conceptual framework:

Concept of stress

Concept of work stress

Concept of administration

Concept of university administration

Concept of academic administrators

Concept of demographic variables

Schematic diagram of the relationship between the variables

Theoretical framework:

The General Adaptation Syndrome (GAS) Theory of Stress.

The Person- Environment (P.E) Fit Theory of Stress.

The Transactional Model of Stress.

Theory of Organizational Behavior.

Review of Empirical Studies:

Studies on work stress factors.

Studies on work stress and job performance.

Studies on demographic variables and work stress.

Studies on stress management strategies.

Summary of literature Review

Conceptual Framework

Concept of Stress

The word 'stress,' according to Mahmood, Qurat, Nudrat and Zahoor (2013) is derived from a Latin word 'stringere' which means 'to draw tight.' It had been in use in physics and biological sciences to refer to the internal distribution of a force exerted on a material body or harmful environmental agent that could result in strain and cause illness (Kiel, 2004). According to Ivancevich and Matteson (2000), the modern concept of stress is traceable to a French Physiologist named Claude Bernard, who recognized the potential dysfunctional consequences of upsetting the balance of, or stressing the body. Bernard contended that the internal environment of the human body must maintain a degree of consistency or dynamic equilibrium, despite changes in the external environment in order to resist diseases. However, the modern usage of stress is credited to the Hungarian Scientist, Hans Selye, (1907-1982), who gave the earliest definition of stress as 'the non-specific response of the body to any demand placed upon it.' Hans Selye is regarded today as 'the father of stress research' (Luthans, 2000).

Stress has become a word not only used in physics, medicine, psychology and management sciences but also in every day speech. Oboegbulem (2007) posits that stress has become part of everyone's vocabulary and most people, including students in the primary, secondary and tertiary institutions, have some subjective notion of what it means to be stressed. Thus, stress has become a popular concept for explaining a wide range of behaviours that appear to defy explanations. Indeed, it has become fashionable in the Nigerian society to attribute erratic and unexplainable behaviour of people to the fact that they are stressed (Ofoegbu & Nwadiani 2006).

Stress has been variously defined. Cooper (2000) conceived stress as an imbalance between the resources and supplies that individuals believe they possess and the perceived

threats or demands related to a given situation. Coleman (2000) views stress in line with Cooper by observing that stress occurs when the demands of the environment clearly exceed the resources of the person to handle them. Egor in Ofoegbu and Nwadiani (2006) sees stress as the way individuals respond to conditions that scare, threaten, anger, bewilder or excite them. In their own contribution, Williams and Cooper (2002) related stress to an outcome of a process where the challenges and demands of the pressures of life, work or home are felt by the individual. Clarke and Cooper (2004) aver that stress is a process in which environmental agents or forces threaten the well-being of an individual in the society. Fawole (2006) holds the view that stress occurs when there are demands on a person which taxes or exceeds his or her adjusting recourses. Erkuu and Chafra (2006) maintained that stress is a situation, where the well-being of individuals is detrimentally affected by their failure to cope with the demands of their environment.

The various definitions of stress can be linked to stress being viewed subjectively, with the experience varying from person to person, which has resulted in other terms like stressor, strain, burnout, pressure and anxiety/tension being incorporated and at times treated synonymously with stress (Jones & Fletcher, 1999). According to the authors, ‘stressor’ means any external or internal agent which facilitates the development of stress or produces stress. Cooper and Marshall in Ugwuagu (2006) defined stressors as those external or internal forces resulting in a state whereby an individual would be described as being under stress. Oboegbulem (2004) contributes that stressors are the agents which actually produce stress. Such stressors, according to the author, tend to produce in the individual not only physical and psychological reactions which are usually distressful or depressing, but also symptoms of emotional and psychological instability. Thus, while stress is the condition, stressors are the agents or factors which create stress.

“Strain” is viewed by Wiggins (2001) as undesirable or unhealthy responses from workers that occur as a result of stress. Thus, while a stressor is an event or set of conditions that cause stress, strain is the body’s long-term reaction to chronic stress. “Burnout” refers to the wearing out from the pressure of work. It could also be referred to as emotional exhaustion that results as day- to -day work stressors take their toll on employees (Happell, Martin & Pinikahana, 2003). Maslach (2003) corroborates the definition of Happell et al, by describing burnout as the physical, mental and emotional exhaustion resulting from chronic job attrition.

Explaining the concept of stress, Oboegbulem and Onwurah (2011) submit that stress can be explained in terms of its closely-related concepts: anxiety, conflict and frustration. According to the authors, “anxiety” is an emotion characterized by a feeling of anticipated danger, tension and distress. It is a state of being anxious or of expecting a strong or dominating blend of uncertainty and agitation; an abnormal and overwhelming sense of apprehension and of fear, often marked by such physical symptoms as tension, sweating, palpitation and increased pulse rate. “Conflict” is an emotional state characterized by indecision, restlessness, uncertainty and tension resulting from incompatible inner needs or drives of comparable intensity. “Frustration,” according to the authors, occurs in a situation in which the pursuit of a goal is thwarted, or when an individual wants something and cannot have it.

Synthesizing the multifarious definitions of stress, it could be inferred that stress could be looked at from different factors within the individual (intrinsic) and the environment (extrinsic) which actively interact with one another to produce tension. Thus, stress emanates when an individual is incapable of rising up to the demands placed upon him/ her by these factors, such that he/she experiences emotional, cognitive and psychological imbalances which may lead to illness or deviation from normal functioning. Implicit in the definitions also is that the extent to which a demand is stressful depends on several factors. First, it must be perceived by the

individual. Second, it must be interpreted by the individual in relation to his/her ability to meet the demand, circumvent, remove or live with the constraint, or effectively use the opportunity. Third, the individual must perceive the potential consequence of successfully coping with the demand or constraint as more desirable than the expected consequences of leaving the situation unaltered. Stress therefore emanates when the demands of the environment far exceeds the resources of the person to handle them, or, when an individual is incapable of rising up to the demands of living, working and other situations. Stress is defined in this study as the psychological and physical state that results when the resources of an individual are not sufficient to cope with the demands and pressures of a situation, such that the individual begins to feel tensed. It occurs when a person perceives that demands exceed the personal and social resources the individual is able to mobilize. It therefore follows that stress is moderated by the amount and the nature of coping resources possessed by the individual to deal with the perceived stressors.

Causes of stress

The causes of stress are many and varied. In general, it is said that anything that can trigger off a feeling of stress in people are known as 'stressors'. Stressors are considered to be the highest or leading causes of stress and can practically be anything from common events like divorce, separation, marriage, getting engaged, death of a loved one, new workplace, redundancy, environmental changes such as too much cold or heat, noisy environment, too much work, noisy children, recalcitrant problems and many more (Edwards, 2013). Osif (2008) observed that stressor is considered to include work pressure, harassments at work, exposure to traumatic events, lack of autonomy and support and exposure to workplace and occupational violence. Scholars have classified the different types of stressors into three categories which include: catastrophic events, major life events and daily hassles/microstressors.

Catastrophic events have been defined by Michailidis and Asimenos (2002) as sudden, often life-threatening calamities or disasters that push people to the outer limits of their coping capacities. According to Pastorino and Doyle (2009), catastrophic events are unforeseen and unpredictable and as such, are completely out of the control of the individual. The authors gave examples of catastrophic events to include: devastating natural disasters such as major floods or earthquakes, wars, fire outbreaks, automobile accidents, violent physical attacks, sexual assaults, among others.

Concerning major life events, McGrath in Essien (2010) remarked that these are powerful events that challenge the adaptive abilities of individuals in the same way as the catastrophic events but affect fewer people. Greenberg (2001) refers to it as personal stressor which can produce immediate reaction. Auerbach and Gramling (2003) noted that most stressful major life events involve major life challenges such as death of a loved one, divorce, rape, losing one's job and major personal disabilities or illnesses.

On daily hassles or micro stressors, Pastorino and Doyle (2009) hold that this category of stressor is the most common type of stressor in the daily life of an individual. Auerbach and Gramling (2003) noted that much of the stress in the lives of individuals result from having to deal with daily hassles pertaining to jobs, personal relationships and everyday living circumstances. Beach, Burns and Sheffield in Essien (2010) gave instances of daily hassles as living in a noisy neighborhood, traffic jams, encounters with irritating personalities, misplacing or losing one's valuables, making decisions, meeting deadlines at work or school, conflicts with other people, lack of motivation, job dissatisfaction, threat to life and property, financial hassles. among others.

Types of stress

There are different types of stress which can cause physical, emotional or psychological strain on individuals. Ikeotuonye in Essien (2010) identified four types of stress. These are normal stress, acute stress, chronic stress and crisis stress. According to the author, 'normal stress' occurs when the arousal of stress is mild and short-lived. This is experienced with minor problems of everyday life. It can occur after a day's job and could easily be overcome after a brief rest. 'Acute stress' manifests when the state of stress is intense but short-lived, such as experiencing one-minute serious air turbulence while in an air plane. 'Chronic stress' happens when the state of stress is prolonged and the individual's adaptive capacities are taxed for a relatively longer period, for instance long lasting illness. 'Crisis stress' is caused by stressful life events such as loss of a loved one, financial difficulty, among others.

Scholars further categorized stress into four types: eustress, distress, hypostress and hyperstress. According to Fevre, Matheney and Kolt (2003), eustress refers to stress experienced in moderation or low level that would be enough to activate and motivate people towards achieving goals and success in life's challenges. Ugoji and Isele (2009) defined eustress as a type of short-term stress that provides immediate strength. According to the authors, eustress arises at points of increased physical activity, enthusiasm and creativity. Oboegbulem and Onwurah (2011) also described eustress as a feeling of happiness, euphoria and elation. The authors further contended that a feeling of elation, euphoria, happiness and excessive excitement could place a lot of tension on the cardiovascular system and consequently stress the body positively. It therefore follows that eustress is a positive stress or good stress that arises when motivation and inspiration are needed to achieve goals. Examples of eustress, according to Chandran (2013), are: the extra strength and energy one feels before a big presentation or meeting, the feeling of

excitement when one wins a game or race, the accomplishment of a challenge, the happy feeling of being loved, among others.

Distress is the opposite of eustress and refers to the degree of physiological, psychological and behavioural deviation from healthy functioning (Sanjay, 2012). Salposky (2004) defined distress as a negative stress or stress disorder that is caused by adverse events which often influence a person's ability to cope. Oboegbulem and Onwurah (2011) defined distress as a feeling of anxiety and frustration, which could manifest in the form of anger against self, anger against place of work, anger against institutions and anger against family and friends. The authors further maintain that distress is dangerous to the body and is accompanied by extreme fatigue. Distress is therefore defined as the negative stress brought about by constant readjustments or alterations in a routine that creates feelings of discomfort. Examples of events that could lead to distress, according to Chandran (2013), include: death of a loved one, financial problems, heavy workload, strained relationship, chronic illnesses, among others.

Another type of stress is hypostress. McEwen (2004) defined hypostress as a feeling that arises when an individual is bored or unchallenged. Thus, hypostress is one of those types of stress experienced by a person who is constantly bored. Oboegbulem and Onwurah (2011) averred that this type of stress occurs in the form of feelings of boredom due to lack of stimulation. It describes a state of low morale and little or no encouragement from anybody. It therefore follows that people who experience hypostress are often restless, uninspired and consequently depressed. For instance, a factory worker who performs repetitive tasks might experience hypostress, because the work will be monotonous. The opposite of hypostress is hyperstress.

Hyperstress occurs when an individual is pushed beyond what he or she can handle, which results from being overloaded or overworked. When an individual is hyperstressed, even

little things can trigger a strong emotional response on such a one. Hyperstress thus manifests in the form of hyperactivity, nervousness, poor attention and anxiety, resulting in the systematic failure of most bodily functions. People who are most likely to suffer from hyperstress are: working mothers who have multi-task of juggling between work and family commitments, people who are under constant financial strains and generally, people working in fast-paced environment (American Psychological Association, (APA), 2013).

Symptoms and effects of stress

Stress has far-reaching effects on people. Although it may not be considered as killing and dreadful like Acquired Immune Deficiency Syndrome (AIDS), cancer, tuberculosis and other terminal diseases, stressful situations have debilitating effects on people's health and performance generally (Ukpai, 2002). Woolfolk and Lehrer (2004) opined that the symptoms and effects of stress are quite real and may occur anywhere in the body, may be mild or severe, can last for years and can significantly impair an individual's daily life.

However, stress may affect individuals differently depending on their various interpretations of the stressors or stimulus. Moorhead and Griffin (2001) maintain that stress is caused by a stimulus which can be either physical or psychological, and that individuals may react or respond to the stimulus in different ways. On a general basis, stress affects individuals physiologically or physically, mentally and behaviourally, with the symptoms or manifestations varying enormously among individuals (American Psychological Association, (APA) (2013).

Stress affects the human body physiologically or physically. According to Lazarus (1996), stress reaction results from an outpouring of adrenalin- a stimulant hormone into the blood stream. The adrenalin, with other stress hormones, produce a number of changes in the body which are intended to be protective. The result often is called "the fight or flight response" because it provides the strength and energy to either fight or run away from danger. Larson and

Swierzewski (2007) explained that the body's response to stress is initiated and controlled by the central nervous system (brain and spinal cord). In response to a stressful situation, the brain first signals the inner portion of the adrenal gland called 'the adrenal medulla' to release hormones that will initiate the 'flight-or-fight' response. Next, the brain triggers the release of other hormones such as adrenalin and cortisol to sustain the response. Thus, the body is readied to meet the immediate threat by activating the essential fighting organs like heart, respiratory systems and muscles (Caple, 2002). Common somatic (physical) indications of physical stress, as noted by Turner and Turner (2005), include: sleep disturbances or changes in sleeping habits, muscle tension, headaches, palpitation or increased heart rate, shallow breathing, increased perspiration, diminished sexual drive, increased blood sugar levels, increased frequency of urine, fatigue and gastro-intestinal problems such as dyspepsia, constipation and diarrhea. Oboegbulem (2007) warns that a prolonged case of any of the symptoms may result to heart attack, hypertension, migraine headaches, ulcer, among others.

On mental effects of stress, Babu (2007) holds that mental stress can arise due to various conflicts at work and home, which if not managed correctly, can lead to impaired logical thinking and various mental illnesses. Other manifestations of mental stress on individuals, as submitted by Edwards (2013) include: nervousness, forgetfulness, anxiety, inability to concentrate, indecisiveness, inability to think clearly, feelings of frustration and helplessness, negative self-concept or loss of self confidence and many more. Babu (2007) concludes that unresolved mental stress can translate into physical illnesses known as 'psychosomatic illnesses' induce people to become alcoholic addicts, show signs of anorexia or loss of appetite, lead to drug and nicotine dependency, and many more.

Behavioural effects of stress showcases the way in which a person acts and behaves when under the influence of stress, which can be seen outwardly (Edwards, 2013). According to the

author, people under stress have a greater tendency to engage in unhealthy behaviours such as excessive use or abuse of alcohol and drugs, cigarette smoking and making poor nutritional choices. The author maintains that such unhealthy behaviours can further increase the severity of symptoms related to stress, often leading to a vicious cycle of symptoms and unhealthy behaviours. Larson and Swierzweski (2007) acknowledge that people under stress tend to be anti-social and this can cause strains on relationships with family, friends, co-workers or even strangers. Other indications of behavioural stress, according to Marmot (2006), include: increased arguments, aggressiveness at the least provocation, tendency to over-react, violent behaviours, crying, substance abuse and mannerisms like nail biting, hair pulling, among others.

However, Chandran (2013) summarizes that, the experience of stress is highly individualized and that what constitutes overwhelming stress symptoms or manifestations for one person may not be perceived as stress by another. Larson and Swierzweski (2007) emphasized that some people are more prone to stress than others and that personality traits such as excitability, impatience, aggression and pessimism may increase the risk for stress in individuals. However, scholars have also observed that stress may not always have negative effect. According to Chandran (2013), a little stress may be beneficial in that it can help individuals keep on their toes, ready to rise to a challenge. Wiley (2000) holds the view that it is impossible to live without experiencing some degree of stress at some point in one's life time. Adeyemo and Ogunyemi (2010), supporting Wiley, asserted that stress is an unavoidable characteristic of life and work. It therefore follows that individuals are not exempted from stress and stress at work. Stress at work is designated as work stress

Concept of work stress

Work stress as a concept has been variously defined. Cooper et al (2001) defined work stress as a situation that arises when there is discrepancy between the demands of a workplace

and an individual's ability to carry out and complete those demands. Kyriacou (2001) defined work stress as the experience of negative feelings such as frustration, worry and anxiety, perceived to arise from work related factors. Michie (2002) sees work stress as an individual's reaction to the characteristics of the work environment that appear threatening to such a one. Netemeyer, Maxham and Pulig (2005) simply referred to it as job-related nervousness and anxiety which affect human's physical and emotional health. According to Bridger, Kilminster and Slaven (2006), work stress means stress related to the work environment which poses demands that the individual is not ready to comprehend and as a result cause strain. Thomas et al (2012) described work stress as involving an interface between occupational structure and the specific organizational culture present in a given environment.

Arising from these definitions, work stress may be regarded as a multifaceted problem which can be linked to the organizational, physical or social characteristics of work and work environment. The definitions further reveal that work stress can be experienced when the demands from the work environment exceed the employees' ability to cope with or control them. Thus, both individual and job characteristics play roles in producing work stress. Work stress, also referred to as occupational stress, job stress, work-related stress or workplace stress, is defined in this study as the physical and emotional responses that occur, when the requirements of a job do not match with the capabilities, resources and needs of the academic administrator. It emanates when job-related factors interact with the worker to either disrupt or enhance his or her psychological or physiological conditions such that the individual's mind or body begins to feel tensed. It is stress arising from one's interactions specific to career responsibilities within the scope of employment, which may also have some implications on the job performance of the individual. Work stress could arise as a result of causative agents (stressors) which are referred to in this study as work stress factors or factors that induce work stress.

Work stress Factors

Work stress factors are those social and organizational elements that may lead to the occurrence of work stress in workplaces (Al-Omar, 2003). According to Ugwuagu (2006), no institution shapes people's personality as much as their jobs; their daily work and the reward they derive from their jobs affect their self-esteem, their social relations and their physical and mental health. The author further stated that an easy going person can be driven to sadness or serious aggression by pressure-laden jobs.

Work stress can be caused or exacerbated by a range of factors. Several features of the working environment have been identified as factors that can induce work stress. Some of these factors, according Mahmood et al (2013), are intrinsic to the job, some are related to the employee's role within the organization, some to career issues, some to relationship at work, some to organizational structure/climate, among others. According to a report by Health and Safety Executives (HSE) (2005), the key sources of stress at work include: the demands inherent in the job, such as workload and work patterns; task ambiguity, a perceived lack of control at work, with little involvement in decision making, a perceived lack of support from colleagues and managers, and poor management of change. . According to Sherring and Knight (2009), some work stress factors are related to the employees' role in the organization, career development, relationship at work, the structure and climate of the organization, among others Sherring and Knight (2009) identified the following as stressors associated with work among administrators: administrative responsibility, interpersonal relations, interpersonal conflicts and role expectations, poor management, poor working environment, lack of job satisfaction, lack of control or conflicting demands. Brief, Schuler and Van-sell in Ugwuagu (2006) indicated nine classes of factors that induce work stress namely: organizational policies, organizational

structure, organizational processes, working conditions, interpersonal relationships, job demands, career concerns, individual characteristics and general sources.

Other scholars further delineated a number of factors relating particularly to the academic system where the academic administrators belong. For instance, Winefield and Jarret (2001) highlighted some of these factors to include: lack of resources, workload pressure, inadequate or unclear communication, job insecurity and feeling undervalued. Taiwo (2005) identified professional status, poor working conditions, time pressures and teaching loads, while Nasir (2001) identified: research and publishing demands, evaluation processes, reductions in autonomy and professional competitiveness. Recent research has surfaced factors such as competition for research funding, low morale arising from erosion in the prestige of academic work, combination of teaching and administrative responsibilities, research and publishing demands, career concerns and students' disciplinary problems (Peretomode, 2012). For the purpose of this study, the researcher has categorized these factors into five areas of concern which are factors associated with: working conditions, workload pressure, career concerns/professionalism, research and publishing demands and relationship at work/interpersonal relations. These areas of concern are discussed briefly below.

Scholars have noted that certain physical working environmental factors, especially unsatisfactory working conditions, can affect the well-being of workers. Working conditions refers to the extent to which the physical environment is comfortable and supportive of productivity (Ukpai, 2002). Okeke (2002) observed that the work environment of lecturers may account in no small measure for lack of concentration and incongruous behavior on the job. Oboegbulem (2004) identified these factors as being organizational in origin or organizational stressors, which result from the failure of schools or educational institutions to organize themselves properly to meet the expectations of the general public, as well as those of the

teachers and their students. Sackey, Boahemaa and Sanda (2011), supporting Oboegbulem, averred that this source of stress develops as a result of flawed organizational structures and ineffective organizational development. Potential stressors in the physical environment include unpleasant or dangerous physical conditions such as overcrowding, noise, air pollution or ergonomic problems, conditions such as extreme cold or heat, hazards, unsatisfactory service conditions such as inadequate/ irregular salaries, job insecurity, lack of infrastructural facilities and supplies such as modern instructional materials or teaching aids, inadequacy of teaching staff, inadequate classroom spaces, overcrowded offices and more (Chandra & Sharma, 2010). Alexandros-stamatios, Matilyn and Cary (2003) opined that lack of resources and inadequate facilities have the ability to precipitate work stress among workers.

Several scholars observed that issues relating to organizational structures and organizational climate define working conditions in workplaces. Organizational structures/climate that are conducive are usually visible in form of happiness and enthusiasm on the faces of staff members, job satisfaction, decorum and orderliness. On the other hand, opposing characteristics such as violence, conflict, disagreement and negative behaviours are the counter-productive elements of a poor organizational climate (Nelson 2009). According to Paruk and Singh (2013), organizational climate could be assessed based on leadership styles, which are exemplified by quality of staff communication, quality of staff consultations/interpersonal relationships and the decision-making processes. Storey and Billingham (2001) noted that the extent to which a person can take part and influence decision-making processes, and ability to communicate effectively can have significant effect on the individual and his/her productivity at work. Kazmi, Amjad and Khan (2008) argued that poor communication or lack of effective communication in a workplace could cause unresolved conflicts that may induce work stress among employees. Some stressors under this category of factors, as noted by Ogundele (2005),

are authority structure or management hierarchy, exemplified by inadequate or ambiguous disciplinary policy of the school system (obnoxious policies), bureaucratic interference and bottlenecks, office politics and struggles for power, staff rules and regulations, poor reward systems, lack of freedom, among others.

Factors relating to workload pressure have been identified by some scholars as capable of inducing work stress. Workload is defined as all the activities that take the time of an individual and are related to professional duties and responsibilities (Robbins, 2001). Workload therefore means the amount of work assigned to or expected from a worker in a specified time period. It is the intensity of job assignments. Workload pressure, according to Ukpai (2002), refers to having much work to do in order to meet deadlines. Kirch (2008) defined workload pressure as tension that arises when job demands exceed an individual's ability to deal with them. Workload pressure therefore refers to excessive burden of work that is beyond control. It is a situation, where a worker is performing to maximum capacity but cannot meet all the role demands. According to Kelderman (2009), institutions of higher education have experienced significant financial losses and in response to decreased funding have tried to save money by laying-off employees, consequently, the employees who remain may be overwhelmed by increased workloads because they have to perform their jobs and those of their former co-workers, which could result in stress at work. It has been argued by some scholars that academic staff of universities, especially the academic administrators, experience debilitating workload pressure. This pressure refers to stress arising from the performance of their day-to-day academic and administrative duties which manifests in multiplicity of tasks such as implementing curriculum, addressing grievances, attending workshop training and seminars, conducting examinations, marking of scripts, collation and submission of examination results, demands to meet targets and deadlines, long hours of teaching, evaluating staff members' performances, writing reports and

other paper work as well as monitoring all other faculty and departmental activities, among others (Khan, 2001). Also, pressure arising from work-family imbalance adds to the workload as noted by Anyakoha (2013). The author stated that striking a workable and healthy balance between work and family responsibilities is a challenge, which leads to stress and may threaten the well being of an individual. Ugwu (2013) noted that inability to balance work and family roles may lead to situation where job demands start encroaching on a worker's private time and vice versa, which could lead to stress

Scholars have observed that conflict arising from the juxtapositioning of teaching and administrative responsibilities could predispose the academic administrators to work stress. Logan (2012) holds that the combined responsibilities of teaching, research and publishing add weight to an already heavy load which can be very damaging to job performance. Smith (2007) observed that more administrative responsibilities and having more students to teach contribute to the stress experienced by academic administrators. Cobb in Essien (2010) referred to this factor as responsibility for things and responsibility for people. According to the author, responsibility involving people include their work schedules, their rewards and their future, while responsibility for things involves working with budgets, equipment and projects. Oraegbunam (2004) posits that individuals who have greater responsibility for other people spend so much time interacting with people in meetings, responding to memos, meeting deadlines for report submissions and suffer interruptions from frequent telephone calls from both external and internal sources arising from performance of jobs, which may result in fewer amounts of working time, thereby crippling their capacity to perform optimally.

Scholars such as Bashir et al (2013) have noted that issues relating to the handling of students' disciplinary problems in universities add more workload for the academic administrators thereby creating stress for them. Oboegbulem (2004) referred to students'

disciplinary problems as the type of behaviour exhibited by students which are not in consonance with the school rules and regulations. Similarly, Onwurah (2004) viewed disciplinary problems in terms of behaviours or actions which deviate from the acceptable mode of conduct. Some disciplinary problems among students, as observed by Raji (2005), include: drug abuse, cultism, examination malpractices, rape, violent demonstrations, hooliganism, lesbianism and homosexuality, among others. Klin in Smith (2007) argued that workload pressure is bad for lecturers (academic administrators inclusive), as it reduces their productivity, damages research and consequently lowers students' academic performance in universities

Factors associated with career concerns and demands of professionalism could constitute sources of work stress among employees (Wiggins, 2001). Mcmillan and Morris (2007) averred that, career concerns involving poor staff development programmes, mid-career crisis/ stagnated or thwarted careers, unmet expectations, job insecurity, status incongruence, thwarted ambition and pressure associated with issues of promotion such as under-promotion, over-promotion and delayed promotion could predispose academics to work stress. According to the authors, promotion is normally a positive way of rewarding employees for their efforts and service, so as to boost their morale and motivate them to work harder. Brook in Oboegbulem (2004) emphasized that over- promotion occurs when a person has reached the peak of his abilities, with only a slim possibility of further development, but is given responsibility exceeding his talent or capacity for work, while under-promotion occurs when one is not given responsibility commensurate with one's abilities, performance level or productivity. Kanungo in Chandra and Sharma (2010) averred that, when workers believe that there is a separation between their jobs and other work-related contests (such as lack of promotion), it creates a sense of frustration that eventually manifests in a behavioural state of apathy. Also demands of professionalism typified in trying to keep abreast of educational changes, adopting teaching strategies and approaches

have been noted by Nelson (2009) as a source of stress among academics. Okeke (2002) averred that academics remain professionally alive through engaging in research and publication, research endeavours and reading current related professional literature to be held in the highest standard of integrity. Foot and Venne, in Sackey et al (2011), asserted that when employees perceive barriers to career advancement or a lack of career opportunities to enhance their development, they are likely to feel tentative about their future in the organization, which in turn may induce work stress

Some factors relating to the public image and expectations of the teaching profession (academic system), have been observed to induce feelings of being undervalued, as the society places high expectations on the academics. Oboegbulem and Onwurah (2011) argued that the waning public image of education, as reflected in the low priority which education is accorded at the national, state and sometimes local levels, has led to a loss of reputation or diminution of self esteem and respectability. It has also prompted demands for increased academic productivity at a time when all levels of financial support for education have been drastically reduced. Consequently, the teaching profession has become more and more stressful and less and less rewarding. According to Peretomode (2012), these feelings of being undervalued could place academics (academic administrators inclusive) under pressure and can become a source of stress, which may negatively affect their ability to carry out their jobs.

Scholars have observed that another source of stress among academics (academic administrators inclusive) may be pressure emanating from research and publishing demands. According to Brown and Uehara (2008), academic administrators are broadly experiencing increased work stress due to teaching, research and publishing responsibilities, especially for promotion, which often result to increase in absenteeism and decreased productivity. Archibong, Bassey and Effiom (2010) opined that, the demand to generate knowledge through research and

their related publications often lead to overwhelming pressures and challenges which may lead to stress among academic staff of universities. Makinde and Alao, in Salami (1994), noted that academic staff of universities (academic administrators inclusive) are expected to attend seminars and conferences, conduct researches in their fields of specialization and publish the outcomes of their researches, all of which may put much stress on them and may lower their efficiency at work. Peretomode (2012) further noted that sourcing for funds to attend conferences, carry out researches and publish the outcome of the researches may predispose the academics to stress at work.

Issues concerning interpersonal relationship at work have been identified as being able to constitute a factor of work stress. According to Mkpa (2005), interpersonal relationship refers to a reciprocally interrelated process between self and others, or between an individual and others. Viernes and Guzman (2005) viewed interpersonal relationship in the workplace as an individual's relationship and interaction with his or her colleagues. Ugwuagu (2006) viewed interpersonal relationship as a cluster of activities involved when two or more people interact with one another in a specific setting, or in a social milieu either in the home, school or work place. Interpersonal relationship at work therefore, simply refers to an individual's interaction with others in a workplace. Mkpa (2005) maintains that a difficulty in interpersonal functioning is a result of destructive interpersonal experiences, while facilitative functioning is a result of harmony in the place of work. According to Manshor (2003), learning to live or work with other people is one of the most stressful aspects of life, which can cause confusion, anxiety, depression and feelings of alienation, with adverse consequences on job performance. Colligan, Colligan and Higgins (2006) supporting Manshor, aver that relationships at work could be positive or problematic and can have various implications for job performance among employees. According to the authors, common stressors in this category include harassment, discrimination,

biased opinions, hearsay, derogatory remarks, among others. Nnabuike et al (2012) posit that interpersonal stress in the university environment results from difficulties in developing and maintaining relationships with other people such as colleagues, students or even subordinates. The authors maintained that workers experience more negative moods when they have distressing interactions with their coworkers. Thus, where people are not supportive of individual colleagues, subordinates and even superiors, stress at work could ensue, which may have adverse consequences on job performance.

Impact of work stress on job performance

Job performance has been defined by Campbell (1990) as part of human resources management that defines whether a person performs his or her job well. Udo (2002) sees job performance as the manner in which a task or activity is carried out satisfactorily or unsatisfactorily for monetary rewards. Ukpai (2002) referred to job performance as an act of carrying out specific daily tasks in an organization. Viswesvaran, Schmidt and Ones (2005) viewed job performance as actions, behaviours and outcomes that employees engage in or bring about that are linked with and contribute to organizational goals. Husain (2010) refers to job performance as the outcomes and accomplishments valued by the organization or system that an individual works in.

Explaining job performance, Levey (2001) holds that it is the result of three factors working together: skill, effort and the nature of the work. According to the author, skills include knowledge, abilities and competencies the employee brings to the job; effort is the degree of activity the employee puts forth toward getting the job done; while the nature of work is the degree of accommodation of these conditions in facilitating the employee's productivity. Job performance is seen in this study as an action or achievement considered in relation to whether an employee has successfully carried out his/her responsibilities as assigned by the organization

or not. It depicts work related activities expected of an employee and how well those activities are executed, or how well an individual is meeting the organization's expectations. It therefore follows that the impact of work stress on job performance delineates the ways in which work stress affects or influences the ability of employees (academic administrators) to carry out their assigned responsibilities.

However, some authors in their conceptualization of performance have clarified that performance does not have to be directly observable actions of an individual, but can consist of mental productions such as ability to make decisions, communication skills, interpersonal skills and others (Chochalingam, 2002). Campbell (1990) argued that job performance is not a unified construct, and that many jobs have different performance standards. Tubre, Arthur and Benneth (2006) agreed with Campbell that what constitutes individual work performance differs from job to job, and as a result, countless measures of job performance have been used in literature. Some measures of job performance as gleaned from the works of scholars such as Erez and Judge (2001) include: meeting goals and targets, ability for team work, communicating effectively, making timely and appropriate decisions, ability to use time well, ability to meet deadlines, punctuality to work, ability to relate with superiors, colleagues and subordinates. Merrill, Pope, Anderson, Coberley, Grossmeier and Whitmer (2013) identified measures such as adherence to organizational policy, rules and procedures, commitment to job, ability to maintain personal discipline, perform supervisory roles, complete job tasks on time, generate ideas, learn new tasks and technologies, accept extra responsibilities among others.

Some scholars have delineated some actions that are seen as counterproductive measures of job performance. For instance, Cote and Miner (2006) identified measures such as: absenteeism, truancy, too many unnecessary complaints and tardiness. Faith and Tesluk (2012) identified doing tasks incorrectly and too many accidents in carrying out tasks. Hakala (2008)

identified insulting or gossiping about co-workers, fighting or arguing with co-workers, aggression, substance abuse, while Koopmas, Bernaards, Hildebrandt, Schanfeli, Devet and Vanderbeck (2011) delineated measures such as; lateness to work, lateness to appointments, inability to meet deadlines, difficulty in concentration, among others.

It has been observed that work stress may impact differently on the job performance of employees. Epstein and Shonz, in Ugwuagu (2006), noted that while some workers display decreased accuracy and efficiency of performance under stress, others display increased accuracy and efficiency in job performance. Thus, work stress may impact on an employee's job performance either positively or negatively. As has been stated earlier, stress affects individuals physiologically (physically), mentally and behaviourally. However, in this study, the impact of work stress focuses specifically on the negative aspects of stress, with reference to job performance and will therefore be looked at through the following lenses: increased health challenges, job tension, low morale/ low job satisfaction and poor work relationships. It is imperative however, to point out that these effects or impact (as observed from literature) are not clear-cut or mutually exclusive of one another, but sometimes overlap. Thus, a particular impact may be reflected in pluralistic situations.

Scholars observed that work stress may lead to increase in health challenges, which consequently may manifest in reduced efficiency. Thong and Yap (2000) hold that work stress regularly contributes to burnout, risk of accidents and illnesses like hypertension, coronary heart disease, ulcers, diabetes, weak immune system and severe depression, among others, leading to the inability of employees to carry out their job demands. Faragher, Cass and Cooper (2005) maintained that work stress can lead to burnout, which manifests in physical exhaustion, insomnia, depression, drug and alcohol use, depersonalization and perceived lack of personal accomplishment in work places. Wadsworth, Simpson, Moss and Smith (2003) noted that work

stress could predispose employees to work-related accidents leading to the sustenance of various degrees of injury and increase in health care costs, which consequently, may negatively affect their performance in their jobs. In a survey of head teachers by the National Association of Head Teachers (NAHT) in Pakistan, in the year 2000, as reported by Gandapur and Rehman (2008), 40 percent of the head teachers reported that they visited their doctors with stress-related problems in the previous year, 20 percent said that they drank too much, 15 percent believed they were alcoholics, while 25 percent suffered from serious stress-related health problems including hypertension, insomnia, depression and gastrointestinal disorders. Ford (2004) maintained that diseases engendered by work stress could make workers to stop working for long periods, exposure to traumatic events, disability, increased cost of health care and interpersonal conflicts, thereby militating against the realization of organizational objectives.

Another possible impact of work stress on job performance, as noted by some scholars is job tension. Cooper (2000) averred that work stress engenders much job tension which manifests in depression and anxiety, forgetfulness, making careless mistakes, more turnover rates, higher alcohol and drug use, unexpected behaviour, high rate of smoking, difficulty in concentration and difficulties in communication. According to Ukpai (2002), difficulty in concentration and communication suggests that an employee is not fully absorbed in his/her duties which may lead to job performance deficits. Patterson (2012) reasoning in line with Ukpai, noted that in work places, work stress impacts on employee job performance through job tension, marked by concentration difficulties, inability to complete tasks by moving from one assignment to another, difficulties in retaining and recalling information, indecision, aggressiveness to colleagues, changes in thinking style and ‘presenteeism’ ‘Presenteeism’ according to the author, is a situation that arises, when employees keep working despite feeling under pressure, such that though they may be physically present at work, may not be able to fully perform their duties and

are more likely to make errors which adversely lower organizational productivity. Venegas, Axelsson and Vanagiene (2004) observed that work stress leads to feelings of job tension, frustration, disorganization, aggressiveness and depression and consequently poor performance at work. Peretomode (2012) noted that tension occasioned by work stress could have adverse effects on workers.

It has further been noted among scholars that work stress may lead to low motivation and job dissatisfaction among employees. Oboegbulem (2004) holds that the impact of occupational stress may manifest in job dissatisfaction and negative feelings about work, such as are associated with absenteeism and rapid turnover of staff leading to low performance targets. Thomas et al, (2012) argued that work stress contributes to organizational inefficiency which manifests in high staff turnover, absenteeism, and, low morale, reduction in creative ability, loss of work interest, decreased job satisfaction and diminished organizational commitment. According to Olaleye (2002), people experiencing work stress may not be satisfied with their jobs in a way that often leaves them feeling apathetic thereby affecting job performance in negative dimensions. Nelson (2009) asserted that work stress engenders low motivation and job dissatisfaction, leading to absenteeism and consequently, decline in job performance. Conley and Woosley (2000) observed that work stress is associated with low job satisfaction, absenteeism, low involvement, low expectancies and task characteristics with a low motivating potential and tension, which all affect the productivity and efficiency of workers.

In organizations, work stress may lead to a lot of behavioural problems, manifesting in poor work relationships, gradual loss of self-confidence and consequently poor quality of performance among workers (Ukpai, 2002). Keshavarz and Mohammadi (2011) argued that poor work relationships among workers lead to decreased capacity to perform, dampened initiative, reduced interest in working, increased rigidity of thought, lack of concern for the organization

and a loss of sense of responsibility. Patterson (2012) noted that work stress predisposes employees to the risk of being more irritable with colleagues and makes the worker to withdraw to himself/herself suffering quietly, thereby dampening the desire to carry out responsibilities especially group tasks. Khurshid, Butt and Malik (2011) hold that stress at work may result to impaired working relationship with superiors, colleagues and subordinates irrespective of age, education and background.

However, some scholars have noted that work stress may not always be bad or negative but can rather affect employees positively. Schermerhorn in Ukpai (2002) observed that low to moderate levels of stress may act in a constructive manner to increase effort, stimulate creativity and encourage diligence in one's work. McShane and Glinow (2003) stated that there is a positive side of stress called eustress, which refers to healthy, positive, constructive outcome of stressful events and the stress response. The authors argued that eustress is the stress experienced in moderation enough to activate and motivate people, so that they can achieve goals. Selye in Essien (2010) posited that positive stress motivates people to take action, helps them to fulfill and achieve set goals and objectives and is necessary to cope with sudden demands and challenges. Also contributing, Lox, Martin- Ginis and Petruzzelo (2006), stated that there are potentially positive outcomes from stress, such as motivation and preparatory behaviors that can be beneficial to job performance. Essien (2010) posited that an optimum amount of stress can always act as energizer or motivator and propel people to apply more efforts in job performance. Chandran (2013) argued that:

Stress can actually increase our performance. Instead of wilting under stress, one can use it as an impetus to achieve success. Stress can stimulate one's faculties to delve deep into and discover one's true potentials. Under stress, the brain is emotionally and biochemically stimulated to sharpen performance (p. 3)

It therefore follows that work stress which may negatively impact on an individual's job performance may actually be an energizer for another individual. Hashim and Kayode (2010)

observed that an understanding of both the nature, the sources of stress and its impact on school administrators (academic administrators), can provide useful basis for providing appropriate stress management strategies which can be applied to reduce stress. Thus, there is the need to examine stress management strategies.

Stress Management strategies

The term management has been defined in various ways by scholars. According to Obi (2003), it is the process designed to ensure the cooperation, participation, intervention and involvement in the effective achievement of a given objective. Peretomode in Okagu (2012) defined management as a social or interactional process involving a sequence of coordinated events such as planning, organizing, coordinating and controlling, or the carrying out of policies and decisions to fulfill a purpose and the controlling of the day- to- day running of an organization for the achievement of goals. Implicit in the above definitions is that, management is dynamic and does not consist of formulas of fixed patterns, but is continuous, and directs/ controls the nature, extent and pace of activities in an organization. Management is defined in this study as the coordination of human and material resources in order to achieve set objectives. Thus, management involves innovation, creative problem solving, reformulating goals and priorities and redeploying resources.

Strategy may be defined as a pattern, ploy and perspective that relates to how one intends to realize one's goals (Mintberg, 2001). John and Fox in Ibe and Obidoa (2013) defined strategy as a plan on how to achieve something. Similarly, Joseph and Linfield in Ibe and Obidoa (2013) perceived strategy as plan, method or series of maneuvers for obtaining a specific goal or result. Strategy is defined in this study as a plan that is intended to achieve a particular purpose .It therefore follows that management strategies may be seen as the actions or initiations directed

towards finding solutions to a particular problem. An example of a management strategy is one designed towards coping with work stress or stress management strategies.

Stress management strategies may be defined as the behavioural, cognitive and psychological components of an individual's response to stressful circumstances (Lazaridou, Reppa & Fris, 2008). Bellingrath, Weigl and Kudieka (2009), hold that stress management strategies involve the processes through which stressful situations are managed. Oboegbulem (2004) defined stress management strategies as coping actions, behaviours or attitudes which an individual exhibits when faced with certain psychological and social demands that task his adaptive resources. Stress management strategies are defined in this study as the tactics used to reduce the actual amount of stress caused by a potential stressor. It involves a range of skills for managing emotional, cognitive and physiological reactions.

The need for healthy stress management strategies, according to Amadi (1999), arises from the fact that negative stress is a block to the attainment of human potentialities and one cannot accomplish much with severe headache, pains all over the body or with sleepless nights. However, Nnuro (2012) posits that managing stress is not about learning how to avoid or escape the pressures and turbulence of modern living, but about learning to appreciate how the body reacts to these pressures and how to develop skills which enhance the body's adjustment. Scholars such as Raitano and Kleiner (2004) agree that coping with or managing stressful situations can decrease the level of stress and lessen its negative effects on the emotional, physical or psychological well-being of an individual.

Numerous stress coping techniques are presented in literature. However, these Stress management techniques fall under strategies that may be divided into three major categories which are physiological activities, cognitive and psychological activities and interpersonal/organizational management activities (Swent, 2001,).

Stress management strategies categorized as physiological in nature are divided into three specific areas. The first area consists of activities which engage the individual in some sort of physical exercises or work, the second is centered on those practised specifically for the purpose of relaxation such as meditation and other relaxation techniques, while the third category has to do with the use of dieting, seeking professional counseling/ treatment and the use of alcohol or drugs. Some of these activities are explained briefly below.

Physical exercise may be defined as anything an individual does that causes him/her to breath heavily for more than three to five minutes, arouses the whole body, requires use of muscles and makes the heart beat more rapidly (Miller, 1999). It is defined in this study as any bodily activity that enhances or maintains physical fitness and overall health and wellness of an individual. Ivancevich and Matteson (2000) observed that participating in exercises and other athletic events such as walking, jogging, cycling, and swimming and many others have been found to be positive forces in physical health and well being. A successful exercise programme, according to Greenberg (2002), should be personal, meaning that it should be pleasing and manageable to the individual. Oboegbulem (2007) stated that a well- structured exercise, even if tasking, can considerably reduce bodily tension and depression, restore energy, increase mental alertness, burn off muscle tension built up from stress, and give a fulfilling and an exciting sense of well-being. Charlesworth and Nathan in Essien (2010) observed that regular exercise has been associated with the physiological benefits of a greater ability to concentrate, a reduced risk of heart attack, more energy, a firmer appearance, reduced anxiety and hostility, elevated mood, improved immune response, better sleep and better control of body weight. Ivancevich and Matteson (2002) reported that studies show reductions in a host of stress emotions after individuals undertook regular exercises which included: lowering of anxiety, depression, nervous tension, hostility and enhancement of positive emotions including joy and state of near euphoria.

Pearl (2012), while advising that people should exercise regularly irrespective of gender or age, observed that exercising regularly will make people live longer and manage stress better.

Relaxation may be defined as what one does, which one finds enjoyable, in the course of taking some rest, probably after work or after some serious physical or mental effort (Pelletier, 1997). Oboegbulem (2007) noted that relaxation is an activity that induces calm and reduces tension, anxiety and worry, particularly the sort that makes one feel pretty tight or still in the muscles. Relaxation is defined in this study as an activity or recreation that provides abatement or relief from bodily or mental effort. It involves the refreshment of body and mind.

Several techniques of relaxation exist in literature such as transcendental relaxation/meditation, Benson's relaxation response, Edmund Jacobson's progressive relaxation and biofeedback (Essien, 2010). The author further identified some steps or processes involved in relaxation which include: sitting quietly in a comfortable position, closing ones eyes, deeply relaxing ones muscles, maintaining a passive attitude and allowing the relaxation process to enter one's system at its own pace, trying to ignore distractions when they come by not dwelling upon them. Oboegbulem (2007) advised that relaxation techniques should be practised once or twice daily, but certainly not within two hours after meal so that the digestive system will not interfere with the elicitation of the relaxation response. Other forms of relaxation include having a good and adequate sleep (about six to eight hours a day), listening to music/singing, stretching, massaging the body, breathing exercises, among others (Pearl, 2012). Pelletier (1997) summarizes that relaxation fights the harmful effects of stress by affecting a person's well-being physically and emotionally.

Meditation is a non-calculation mood indicating an altered state of consciousness that is free of anxiety, tension or distress, which may occur spontaneously or with the aid of a technique (Essien, 2010). Meditation refers to anything that redirects the mental process away from daily

concerns. According to Pelletier (1997), there are many forms of meditation but there are two basic methods which are commonly practiced. One method is the restriction or focusing of attention on an object of meditation. The other is opening up of attention, in which the meditator stays in a state of undistracted receptivity to external and internal stimuli, making the individual to concentrate and gain mastery over attention. The author further explained that the idea of meditation is to focus one's thoughts on one relaxing thing for a sustained period of time. This rests the individual's mind by diverting it from thinking about the problems that have caused stress, thereby giving the body time to relax, recuperate and clear away toxins that may have built up through stress and mental or physical activity. The biggest appeal of meditation is the promise of becoming more relaxed most of the time.

Diet has been observed to be one of the physiological strategies involved in the management of stress. Albrecht in Essien (2010) defined diet as the sum total of the substances an individual introduces into the body. Diet is defined in this study as the usual food and drink consumed by an individual. A good diet should consist of a balanced combination of foods that supply the basic ingredients of nutrition, moderate quantities of food, vitamin supplements taken in moderation, minimal use of junk food, little or no alcohol, no tobacco, no hard drugs, rare or no use of patent medicines and no use or moderate use of caffeine (Essien, 2010). Somer (2007) delineated the guidelines for eating right which include: maintaining a healthy weight, eating a variety of foods, eating regular meals including breakfast, avoiding too much fat, saturated fat and cholesterol, eating foods with adequate fiber, beans and fruits, avoiding stressor foods like tea, coffee, alcohol, cola, too much salt or sodium, avoiding sugar and not abusing the use of vitamins. According to Yates (1999), diet to some extent determines how an individual will respond and recover from stress. Essien (2010) argues that there is a direct relationship between stress management and nutrition and that diet, to some extent, determines how an individual will

respond and recover from stress. Greenberg (2002) stated that taking balanced diet will help prepare an individual to cope with stress. The author argued that how an individual eats may compound or reduce the negative effects of stress. Somer (2007) posits that a person who maintains a healthy diet instead of resorting to drugs or alcohol is more likely to manage stress better.

Communicating with one's doctor has also been noted as being important in management of stress. According to Swent (2001), seeking professional advice and talking to one's doctor openly allows one to be provided with the best stress treatment possible. The author argued that taking prescribed drugs (vital medications) assists people in managing stressful situations.

The cognitive or psychological strategies involve activities or attitudes that could be characterized as a philosophy of living or be utilized to cope in a positive manner with tensions. They include techniques such as: positive reappraisal, laughter, social support, engaging in recreation activities and use of religious or spiritual support. The use of positive reappraisal involves having positive attitude to situations and problems, such as redirecting one's thoughts to good things that have occurred in the past, that are occurring in the present or yet to occur, It also involves leaving the scene of the stressful situation, disregarding the stressful event/divert thinking/mental visualization and doing something that gives fun to one (Ahmad & Salim, 2009).

Another activity categorized as a cognitive strategy is laughter/humour. Provine (1996) observed that laughter is the most powerful, pervasive and important medicine for humans. Swent (2001), supporting Provine, averred that laughter is a wonderful medicine and may be one of the cheapest, best and more easily practised techniques available to humans today. Restak (2013) hold that laughter (humour) reduces levels of stress hormones such as cortisol, enhances the immune system and provides a workout for the muscles of the diaphragm and face, thereby

easing tension. The author concludes that laughing during stressful situations can put a psychological distance between an individual and the stress.

Social support is a resource that enables individuals to cope with stress. According to Barrera (2000), individuals who have supportive social relationships are usually able to rely on others to aid them in dealing with stressful situations or conditions, while those who lack supportive social relationships are vulnerable to the effects of stress. Pidd (2004) argues that having access to resources that provide a sense of interpersonal connectedness via social support helps to alleviate the degree of stress experienced by employees. Ivancevich and Matteson (2002) listed purposes served by social support to include: re-establishing confidence, maintaining high performance, gaining new competencies and achieving specific objectives. The authors further explained that during times of intense stress, when an individual may be functioning at a low level of competence, a good support system can help re-establish competence. Thus, developing new skills or dealing with new situations requires the support of people who can serve as models and provide emotional support. Oboegbulem (2007) maintained that a good social support system should include: those to depend on in a crisis situation, those with whom to discuss and share concerns and confidence, those to feel close to, those who can make one feel competent, valued and respected, those with whom one can exchange useful, vital and confidential information, those with whom one can share one's optimism and good news, as well as natural feelings of empathy.

On the benefits of social support as a stress management strategy, Coleman (2000) stated that research indicates that when employees enjoy high levels of social support, perceived stressors have little or no relationship with ill health. On the contrary, when social support is low, symptoms of physical and psychological illness often appear. Johnson, Cooper, Cartwright, Donald, Taylor and Millet (2005) hold that talking to co-workers, friends and family members

can help one find support in dealing with stress. Fomby and Cherlin (2007) supporting Johnson et al noted that social support can buffer the health-damaging effects of stress by reducing negative emotional and behavioural responses to stressful situations.

Scholars observed that engaging in recreational activities may be used to reduce stressful situations. Recreation involves the refreshment of one's mind or body through activities that amuses or stimulates. Some of these activities include: engaging in one's favorite hobby such as singing, dancing, taking a walk, taking computer lessons or music lessons, playing sporting activities such as hockey, badminton, table tennis, spending time with/visiting friends and family, among others (American Psychological Association (APA) (2013). Pearl (2012) asserted that engaging in recreational activities will go a long way towards banishing stress.

Another area considered as a cognitive activity or attitude involves the use of religious beliefs/spiritual support in coping with stress. Salami (1994) holds that saying prayers and keeping faith in God can be used to reduce stress. Ugwuagu (2006) averred that becoming a born-again christian could change the way a person appraises many formerly stressful situations, through providing him/her with stress-reducing self-statements and with images of how a good Christian should act. Swent (2001) found from a study that solving problems with the help of God, prayer, church activities, and living a religious life were responses that indicated that many administrators utilized their religious beliefs as a means of reducing job stress.

Scholars further observed that strategies involving the use of interpersonal and organizational activities can be used to cope with stressful situations both at individual and organizational levels. These include those activities relating to the utilization of skills which increase one's effectiveness on the job. Activities in this category include: skills involving the use of effective communication skills, time management, delegation of responsibilities, use of

decision making skills, and allowing close staff relationships to occur. Some of these activities are discussed briefly below.

Stress-reducing communication skills involve the ability to discuss problems or hassles in a clear, non-emotional and constructive way (Ugwuagu, 2006). The author holds that if someone's behaviour is a stressor to another, he/she can make the situation more stressful by becoming emotional and verbally attacking the person, but he can make the situation less stressful by discussing the problem in a calm and clear way. Cole (2002) averred that increasing formal organizational communication with employees reduces the uncertainty by lessening role ambiguity and by resolving conflicts between supervisors and subordinates. Riggio (2003) noted that proper organizational communication can prevent workers from experiencing job stress arising from job uncertainty and feelings of isolation from what is going on in the organization. The author maintained that communication comes naturally to humans and that the simple act of discussing one's problems can be extremely helpful in the healing process for stress.

Delegation of responsibilities has been noted by some scholars as an activity that can be used to manage stress among administrators both at the individual and at the organizational level. According to Kuttyta (2015), delegation of responsibility can be defined as the sharing of power or authority with another for the performance of certain tasks and duties. Delegation of responsibility can therefore be seen as the assignment of responsibility or authority to another person, especially from a superior to subordinate. Colligan et al, (2006) asserted that the resultant influence of high participation rate, collaborative planning and delegation of responsibilities provides a positive effect on stress reduction, improves work performance, job satisfaction and decreases psychosomatic disorders.

Several scholars have reasoned that providing a supportive, team-oriented work environment and increasing employees'sense of control by involving them in decision making,

especially in issues that directly concern them can be used to reduce stress both for the individual administrator and also for the organization (Batista-Taran & Reio, 2011). Harris, Harris and Harvey (2008) observed that involving subordinates in the decision-making process lead to higher levels of job satisfaction, organizational commitment, job performance and ability to cope with stressful situations.

It has also been observed that allowing close staff relationships to occur can be used in reducing stress among employees. According to Mkpá (2005), a harmonious relationship in the workplace is one that exudes cooperation, love, tolerance, understanding, mutual support and encouragement. Cooper in Ugwuagu (2006) maintains that good relationship between members of a work group is a central factor in individual and organizational health. Interpersonal strategies employed in management of work stress include: allowing close relationships to occur among members of an organization, respecting the feelings of colleagues and subordinates, listening to other people's opinion, desisting from blaming others, leading by example (doing what you expect from others), showing empathetic understanding to subordinates, maintaining cordial relationship among colleagues, staff and others (Silver, Strong & Perini, 2007).

Employees in workplaces can also manage stress through time management. Ekundayo, Konwea and Yusuf (2010) defined time management as the efficient and effective utilization of time to achieve organizational goals. Time management is defined in this study as the act of planning and exercising conscious control over the amount of time spent on specific activities. According to Obi (2003), time management involves identifying tasks to be performed, planning and scheduling organizational activities, prioritizing such activities, allocating time to the tasks according to their degree of importance in enhancing productivity. Ukpai (2002) maintains that time should be used wisely by avoiding time wasters such as interruptions, procrastinations and lack of organization. Some strategies for effective time management include: delegating as

much work as possible, identifying the time of the day when work is most effectively done and scheduling difficult work at that time, developing a time management system which works for one, having an effective system for coping with paperwork, setting up priorities, avoiding procrastinations, learning to say no when necessary, among others (Akomolafe, 2005). According to Ugoji and Isele (2009), one way to help in developing time management skills is to always try to use a calendar or planner and checking it faithfully before committing to anything. The authors concluded that good time management skills are critical for effective stress control.

Keeping a stress diary as a management strategy for work stress, is based on the premise that the better the understanding a person has of a phenomenon, the better equipped he/she will be to deal with it (Ivancevich & Matteson, 2000). According to the authors, some people realize that they always have headache after drinking alcohol, with such knowledge, some avoid drinks and others take some drugs after drinking to reduce the effect of the alcohol on them. Thus, by keeping track of all causes of stress that have affected an individual, he/she would be able to avoid running into such situations again and equally be in a better position to find ways to manage them. In keeping a stress diary, the following information are recorded: the time and place where the event took place, the intensity of the stress felt, duration of the stress felt, the event, situation or people causing the stress, the triggering event or what led to the stressful situation, the person's reaction to the stressful situation (Essien, 2010). Khanka (2000) opined that studying, exploring and maintaining stress diary can be used to control various types of stress which individuals experience in the course of performing their jobs.

Since it has been stated that stress cannot be avoided, identification of effective coping strategies may provide academic administrators with the tools which can be used to reduce the amount of stress in their environment and to moderate the effects of stress on them. To this end, Ulrich (2000) advises that in order to develop an effective stress management programme, it is

first necessary to identify the factors that are central to a person controlling his/her stress and to identify the intervention methods which effectively target these factors.

Concept of administration

Administration as a concept has been variously defined. Mbikpom (1999) defined administration as the process of harnessing both human and material resources for the purpose of achieving organizational goals and objectives. Bessong, Udo and Ogbe (2011) see administration as the formalized system which is intended to control, supervise, plan and make decisions about the various activities of an organization on the basis of established authority. According to the authors, effective administration depends on sound leadership. Miewald in Peretomode (2003) holds that administration is the means by which formal goals are achieved through co-operative human effort. Peretomode (2003) viewed administration as being concerned with the performance of executive duties, the carrying out of policies and decisions to fulfill a purpose and the controlling of the day-to-day running of an organization. Ogbonnaya in Mgbodile (2003) synthesized the concept of administration as: the ability to make people, activities and things function so that objectives are achieved; using men, materials and funds in an organization to achieve objectives; directing and controlling the affairs of an organization. Hall (2000) explained that administration consists of the following basic elements: planning, organizing, directing, coordinating, reporting and budgeting. Planning involves taking decisions about actions in the future. Organizing is the setting up of structures and taking decisions on the actual activities that will help to achieve goals. Directing involves making the personnel to work.

A synthesis of the above definitions reveals that administration must be in place for the specific objectives of an organization to be achieved. Thus, the resources of an organization (human and material), remain dormant until they are co-ordinated through effective administration. Administration is therefore fundamental to every organization. For instance, the

university system as complex as it is requires effective administration to achieve her goals and objectives. Administration is therefore defined in this study as the authoritative art of getting things done through the coordination of efforts of others. It involves utilizing men and materials to achieve the goals for which an organization was established.

Some scholars in their definitions of administration view the concept as being related to the concept of management. Ogunu (2010) views management as the effective organization and utilization of human and material resources for the achievement of identified objectives. Otu (2006) defined management as the method by which the leader utilizes material and human resources to achieve predetermined organizational goals. Igbo in Okagu (2012), reasoning along this line, defined management as a formalized system of activities, which is intended to control, supervise, plan and make decisions about the various activities of an organization on the basis of an established authority. These definitions reveal that management is systematic and dynamic, and involves social interaction processes aimed at achieving desired objectives in the most prudent way. It involves people, aims at optimizing the usage of resources and portrays the rational aspect of the nature of man in his social setting. Peretomode (2001) added that administration like management also involves such elements or activities as planning, organizing, programming, staffing, budgeting, co-ordinating, reporting and evaluating. Okeke (2002) supporting Peretomode, argued that within the context of educational enterprise, the terms administration and management are often used interchangeably. Implicitly therefore, whichever way management processes or administrative processes are termed, the application remains basically the same. Thus, anybody that carries out administrative responsibilities in an organization is an administrator. An administrator therefore may be seen as one who co-ordinates men and material resources in an organization for the purpose of achieving set goals.

Administration occurs in every organization including the educational system. Administration as it relates to the educational system may be viewed as the process which deals with utilizing both human and material resources available to education for the achievement of set educational objectives, using such managerial skills of planning, organizing, directing, coordinating and decision making (Nwaka, 2011). Aderounmou and Ehiamezor in Okagu (2012) defined educational administration as a service activity or tool through which the fundamental objectives of the educational processes may be fully and effectively realized. Thus, educational administration is the utilization of the scarce human and material resources available to education to achieve predetermined educational goals. This leads to the question: who is an educational administrator? An educational administrator, according to Nkang (2002), is one who controls the human and material resources of the educational system for the realization of educational goals. According to the author, educational administrators may also be called educational managers and are found in all the three levels of the educational system: primary, secondary and tertiary. Ebong and Ihenacho (2010) view educational administrators as school managers who are the chief executives of various academic institutions and who plan, control and coordinate activities in their institutions. It therefore follows that educational administrators are those school managers charged with the responsibility of achieving educational objectives through the efficient utilization of available human and material resources.

The job of an educational administrator, according to Okunamiri (2008), is to plan, design, and implement an efficient and effective learning system responsive to the need of the learner and of the society. The author maintains that the educational administrator is essentially an organiser and implementer of the plans, policies and programmes meant for specific educational objectives. Ogbonnaya in Mgbodile (2003) submitted that educational administrators, be they in the primary, secondary or tertiary levels of education, perform very

important roles in the enhancement of the teaching and learning processes. They procure and manage funds, provide and maintain staff, physical facilities as well as equipment. The author opined that it is an incontrovertible fact that no educational institution can achieve its objectives without a good core of competent, efficient and seasoned educational administrators. These institutions, according to the author, may be primary schools, secondary schools and higher educational institutions such as polytechnics, colleges of education and universities. This study is concerned with university administration.

Concept of university administration

A university is a tertiary level educational institution of learning, higher in status than secondary and primary schools. It is a corporation and a body of academic men and women employed to teach and produce graduates for a country's economy (Afianmagbon, Igbineweka & Nwokocha, 2010). According to Anao (2011), the university is widely perceived as a knowledge society where man's socio-economic wellbeing are advanced. The author further described a university as a unique type of institution which the society generally looks up to as a vehicle for promoting the realization of human potentials and advancement of national development and well being of society. Arikewuyo (2010) referred to universities as enterprises that produce and distribute knowledge which is a public good. A university is defined in this study as an institution of higher learning which awards academic degrees in various disciplines and provides both undergraduate and postgraduate education.

Universities are autonomous bodies. The National Universities Commission (NUC) coordinates the total development and financing of university education in Nigeria. It also lays down minimum standards and approves guidelines on the accreditation of the universities whether federal, state or private. The federal and state governments were previously the only bodies licensed to operate universities in Nigeria, but recently, licenses have also been granted to

individuals, corporate and religious bodies to establish private universities in Nigeria (Adamji, 2013) According to Ogbonnaya (2000), the National Universities Commission (NUC), established in 1962 by the federal government of Nigeria is the major accreditation body that enforces uniform standards and sets students admission carrying capacity among other functions.

The central focus of university is the production of knowledge derived through teaching and research. To this end, universities play three statutory functions which are teaching, research and public/community service (Nwafor & Nwafor, 2010). Besides these functions, the specific goals of university education as enshrined in the National Policy on Education of the Federal Republic of Nigeria (2004) are to: contribute to national development, high level relevant manpower and training, develop and inculcate proper value for survival of the individual and society, develop the intellectual capability of individuals to understand and appreciate their local and external environments, acquire both physical and intellectual skills which will enable individuals to be self-reliant and useful members of the society, promote and encourage scholarship and community service, forge and cement national unity, and promote national and international interaction. These goals are being pursued through teaching, research and development, virile staff development programmes, generation and dissemination of knowledge, which are all embedded in university education

The need for university education stems from the fact that the system is responsible for the development and production of high-level manpower within the context of the needs (Mba, 2012) According to Mgbekem (2004), university education leads to the discovery and improvement of human potentials and talents. It promotes the production and utilization of best brains and is the agency for development of all that man is capable of achieving. Chauldhry (2012) stated that the universities attain the above objectives through their faculties which largely depend also on the capacities and performance of the faculty members consisting mainly

of the lecturers (academic administrators inclusive). University lecturers are a group of individuals trained and employed in universities to train and groom students through intensifying and diversifying programmes for the development of high level manpower (Modebelu & Onyali, 2011). Universities as centers of excellence attain the objectives for their establishment by instituting effective university administration through university administrators.

University administrators are the university employees responsible for the maintenance and supervision of the institutions (Maree, 2000). University administration is defined in this study as the coordination of efforts of others, the utilization of human and material resources in the university system, for the achievement of predetermined educational goals. Thus, anyone who carries out a role in university administration is a university administrator including academic administrators. The university as complex organization is managed through a good network of offices and university statutes in a hierarchical order. Among them are: the visitor to the university, the council, the senate, principal officers, academic board and the congregation. The management of each university is headed by the vice chancellor, supported by his deputies, registrar, bursar, librarian, among others (Mba, 2012).

However, some type of separate administrative structure exists at almost all academic institutions. Maree (2000) maintained that there are two types of administrators in a university system: those that carry out pure administrative duties without getting involved in academic or scholarly work, designated as non-academic administrators, and those that are involved in administration as well as academic or scholarly work, designated as academic administrators. Conway and Dobson (2003) posited that academic administrators remain in charge of decision making and governance in institutions, while non academic administrators develop and provide critical information and advice to inform such decisions. The author further maintained that non-academic administrators are responsible for managing large sections of institutions, but issues

surrounding governance and strategy are essentially determined by academics and academic administrators. Examples of non academic administrators include: the Vice-Chancellor and his/her deputies, the Registrar, the deputy registrars, the Senior Assistant Registrars, the Assistant Registrars, the executive officers, the Bursar, the Director of Works, Chief Medical Officer, the Chief Security Officer, among others. Examples of academic administrators include: Deans of faculties, Heads of Academic Departments, Directors of institutes/centers and others (Peretomode, 2012). This study is concerned with academic administrators.

Concept of academic administrators

The word 'academic' is usually employed to refer to education, educational studies, an educational institution or the educational system in general. It may also be used to refer to a university teacher or someone teaching or conducting research at an institution of higher learning, including universities. While administration has been defined as the authoritative art of getting things done through the coordination of efforts of others, a university administrator is one who holds an administrative position in a university system. Academic administrators are thus seen as those administrators in a university system, who combine administrative duties with academic responsibilities of teaching, research and publishing. According to Kuo (2009), university academic staff and administrators play critical roles in higher education in fulfilling the missions of education, research advancement and public service.

The job of academic administrators according to Buller (2007), involves varieties of tasks, ranging from general duties to specific ones. According to the author, they are generally responsible for organizing, managing and administering the faculties, departments and institutes/centres and taking care of activities like quality assurance, admissions, data management, finance, examinations and human resources, among others. Peretomode (2012) also delineated the functions of academic administrators to include: assisting in recruitment,

academic governance, office management, staff supervision, coordinating examination and assessment processes, managing budgets, providing administrative support to lecturers, drafting and interpreting regulations, liaising with other administrative staff and other related activities. However, academic administrators such as deans of faculties, heads of academic departments and directors of centers and institutes have functions specifically attached to their positions.

The Dean is the person with significant authority over a specific area of concern called a faculty and thus is designated as the head of the faculty, while a faculty is a collection of related academic departments (Buller, 2007). The author further sees the dean of a faculty as primarily, a university officer, serving in that capacity on the senate, appropriate major committees and other university bodies. The dean is therefore an administrator in charge of a faculty in a university. As a university officer, deans of faculties have the dual role of making independent judgments on total university matters and representing their faculties' points of view. They also oversee their faculties' relations with other faculties to ensure that they are harmonious and serve the total university's objectives (Szekeres, 2011). Other functions of deans include: scheduling and conducting regular faculty meetings, supervising staff and conducting annual faculty evaluations, overseeing all academic institutes and centers associated with the faculty, engaging in research administration, students affairs and administration, ensuring that faculty policies and practices are consistent with those of the university, coordinating the use of facilities assigned to the faculties, among others. Deans report directly to the Vice Chancellors. (Academic Regulations of the various universities, 2013/2014 Academic Session)

The heads of academic departments occupy strategic position in the administration of tertiary institutions. Apart from their enormous responsibility of providing strong academic leadership in their various departments, they are expected to teach the students, conduct researches and render services to the community (Ajayi & Adamu, 2012). According to Graham

(2013), heads of departments are academic leaders in their disciplines and work with their deans and other heads of departments to deliver university strategic objectives. Other specific functions of the heads of departments include: managing applications for research funding, managing the delivery of the department's teaching programmes, ensuring the maintenance of academic quality and standards through compliance with the university's quality assurance procedures, developing interdisciplinary activities with other departments, establishing departmental links with external agencies such as employers of graduates, professional bodies, research councils and other funding bodies for the benefit of the department's teaching and research, communicating faculty and university policies to their departments and vice-versa, among others. Heads of departments are accountable to their deans. (Academic Regulations of the various universities, 2013/2014).

The universities also further the actualization of their objectives by establishing centers/institutes and appointing personnel to man them. These personnel are designated as directors. According to the Stanford Bulletin Report (2014), these centers and institutes may be within a faculty, a department or across faculties and departments. Scottsdale (2014) holds that the directors of the centres and institutes are also very important in university administration as they provide a range of academic services geared towards the smooth running of programmes in the various faculties and departments of the universities. Examples of directors of such centers and institutes may include: Center for African Studies, Entrepreneurial Development Center, Curriculum Development and Instructional Materials Centre, University Energy Centre, Center for Distance Learning programmes, Institute of Education, among others. Individually, the directors perform functions that are specific prerogatives of their centers and institutes. For instance, the Institute of Education (in universities where it exists), serves as a centre for educational consultations, liaison and professional development. The Director of the institute,

along with other staff members, performs functions that fall into three main categories: research, teaching and public service. The research function has to do with identifying major educational problems and needs and investigating ways and means of addressing such problems, among others. The teaching function involves engaging in teaching functions in specified departments while also carrying out research and administrative functions in collaboration with the academic staff of the Faculty of Education, among others. The public functions focuses on organizing symposia, workshops and conferences, arrangement of affiliations of some colleges of education to the university, serving as the university link with Ministries of Education and education agencies, mounting in-service programmes such as sandwich programmes for practicing teachers to obtain degrees and postgraduate diploma in education, among others (Institute of Education Manual, University of Nigeria, Nsukka, 2014/2015 Academic Session).

Scholars have highlighted some skills needed by academic administrators to function effectively in their jobs. Reeves (2015) averred that an academic administrator should possess good communication, interpersonal, staff management, prioritization and organizational skills, be detail oriented, have a strong sense of responsibility, possess flexibility of thought in adapting to new initiatives and a high level of integrity. Mahmood et al, (2013) observed that academic administrators deal with a number of areas at the same time and therefore require traits such as patience, vision and crisis management skills. Olasumbo (2007) maintained that the process of applying and using managerial skills in university administration is dependent on the administrative and managerial skills of administrators, having a combination of leadership acumen and good judgment based on knowledge. Saint (2004) argued that responsiveness to the challenges of effective management of university administration requires adaptive behaviour by both academics and other staff to increasingly diverse activities and programmes directed towards effective learning outcomes.

Scholars have observed that academic administrators are important for effective university administration. For instance, Conway and Dobson (2003) stated that without the fundamental roles played by academic administrators, universities would not be able to properly undertake their core business. Mahmood et al (2013) reasoned that academic administrators' job is of great importance as much is expected of them in connection with the successful accomplishment of university objectives. Thus, being an academic administrator seems a challenging job which presupposes a lot of stress and responsibilities. Implicitly therefore, for academic administrators of universities to be able to perform optimally in their jobs, they not only need to be experienced but also competent and healthy, both physically and psychologically. Thus, an understanding of both the nature of stress and the sources of work stress experienced by academic administrators becomes necessary as it can provide useful basis for appropriate strategies which can be applied to reduce stress at work (Hashim & Kayode, 2010). It follows also, that an understanding of the possible impact of work stress on the job performance of academic administrators is also very important. The impact however (as has been observed by scholars), may be mediated by demographic variables.

Concept of demographic variables

Demographic variables may be defined as varying socio-economic features of a population expressed statistically (Ukpai, 2002). Braun and Mohler (2004) viewed demographic variables as background variables that contain information necessary to define homogenous sub groups to establish causal relations between attitudes and societal facts, and to define differences between scores on scales. Lau, Yuen and Chan (2005) posit that demographic variables are a number of individual variables that may influence behaviour of people. Demographic variables are defined in this study as varying characteristics or social statistics of an individual, sample group or population expressed statistically. Examples of demographic variables include: death

rate, birth rate, age, gender, marital status, work experience, socio-economic status, university ownership, racial origin, education level, location, birth-rate, death rate, among others. This study is concerned with demographic variables of institutional ownership, gender, age, work experience and educational qualification.

Several scholars have observed the role of demographic variables in work stress. Veenstra (2000) stated that demographic variables such as income level, type of occupation and educational level are major determinants of individuals' mental health. Kyriakou (2001) opined that the level of work stress among workers may vary according to differences in socio-demographic factors such as income level, work status, age, gender and level of experience. Davies (2008) maintained that some demographic characteristics such as gender, age, marital status, years of employment and employment status may influence the development and management of work stress among employees. Galanakis et al, (2009) agreeing with Davies posited that the study of work stress among employees could be mediated by demographic factors such as gender, age, marital status and educational level. Ahmad and Salim (2009) stated that demographic variables such as age, marital status, ethnic group, educational level and years of experience may have implications for work stress among employees. Nauert (2010) opined that demographic factors such as age and gender may play significant role in how people respond to stress. Dua and Murphy in Mahmood et al, (2013) stated that demographic variables that may relate to someone's job stressor include gender, age, marital status, job tenure, job title and hierarchical level. Lam, Tobias and Bahaudin (2012) expressed that today's working adults may display different levels of stress, depending on various demographic traits such as gender, age and work experience. Finkelstein, Kubzansky, Capitman and Goodman (2007) hold that demographic variables such as age, educational qualification, socio-economic status, marital

status and others may be related to the experience of job stress. Towing this line, Blaug et al (2007), asserted that:

an individual's appraisal of his/her stress may be affected by a range of socio-economic factors which may not be directly work-related and may include gender, race, age, as well as geographical location, housing, health, number of children, family arrangement and community networks as well as other psychological factors including past experiences and personality traits. (p.8)

Institutional ownership and work stress

An institution may be defined as an organization founded for a religious, educational, professional or social purpose (Hodgson, 2006). Bello (2014) defined institutions, as social arrangements that channel the behavior of people in prescribed ways in the area of social life. Garner (2009) defined institution as an established organization especially one of a public character. Institution is defined in this study as a social organization or establishment founded for a specific purpose. An institution may consist of a building or complex of buildings, where an organization for the promotion of some cause is situated. There are various types of institutions, some examples are: health institutions such as hospitals, religious institutions such as churches, financial institutions such as banks, social welfare institutions such as orphanages, educational institutions such as universities, among others.

Ownership may be defined as the rights allowing an individual to use, manage and enjoy property, including the right to convey it others (Garner, 2009). Ownership in this study is defined as the right of possession, control, management and use of a thing or property. Thus, an owner is seen as a person or organization who has the right of ownership over something. In this context therefore, institutional ownership is viewed in terms of the person or organization who has the right over the universities which are

subjects of this study. In other words, institutional ownership in this study simply means ownership of universities.

Ownership of universities in Nigeria, including the South East, is categorized into three: the federal, state and private universities. The federal and state universities are also called public universities. Federal universities are those universities owned, financed and managed by the federal government, state universities are owned and financed by the various state governments. Private universities are those universities owned and financed by private individuals and organizations. The various federal universities are established by various Acts of the National Assembly, while the state universities are established by the various laws of the State Assemblies. In all cases, the instrument (enabling act or law) that brings the university into being defines its mission and mandate and clearly indicates the powers which such a university can exercise (Korgba 2011).

Some scholars have opined that ownership of universities may influence the way and manner work stress impacts on employees. Khurshid, Butt and Malik (2011) averred that public sector university teachers may experience more stress as compared to the private sector university teachers. Sulaiman and Akisanya (2011) hold that public university teachers may be more prone to stress than the private university teachers. Essien (2010) averred that activities in both sectors may cause stress for the employees, especially the administrators. Adeoye and Okonkwo (2010) averred that there may be no difference on the stress experienced by public university workers and their counterparts in private universities. Adebisi (2011) agreeing with Adeoye and Okonkwo opined that there are growing evidences that no Nigerian university, irrespective of its ownership, can claim to be immune from stress and its impact. Ejue (2013) stated that academic staff of state universities may suffer more from stress at work than those in federal universities

due to the fact that conditions of service, with particular reference to remuneration, in all federal government owned universities are uniform while those of state universities differ. Oghenetega, Ejedafiru and Rabi (2014) noted that there may be differences in the level of job stress experienced in federal, state or private universities in Nigeria. However, Agbonaye and Osarumwense (2015) hold that there may be no difference in the experience of stress between staff of federal and state universities.

Gender and work stress

The usage of the word 'gender' among policy makers, planners and the generality of people in Nigeria has been appreciably misconstrued. Most times, when the word gender is used, people immediately suppose that reference is being made to women and their affairs and vice versa (Ainabor, Ainabor & Ehimi, 2009). According to Akubue and Okolo (2008), human activities throughout the world are organized according to social differentiation that people make between men and women or by gender.

Gender as a concept has been defined by various scholars. Pollard and Morgan (2002) defined gender as socially constructed expectation for male and female behavior which prescribe division of labour and responsibilities between males and females, and which grants different rights and obligations to them. McKay (2004) refers to gender as the sum of cultural values, attitudes, roles, practices and characteristics based on sex. Akper, Gire and Orshi (2007) viewed gender as the roles and relationships between men and women in a given context. Ametefe and Ametefe (2007) conceptualized gender as a social construct that establishes and differentiates status and role between men and women, particularly in the way they contribute to, participate in and are rewarded by the economy and most social institutions. Egbe (2011) views gender as a psychological term describing behaviour and attributes expected of individuals on the basis of being born either male or female. According to World Health Organization (WHO) (2012),

gender describes the characteristics, roles and responsibilities of men and women, boys and girls, which are socially constructed. These definitions suppose that gender involves attitudes, roles, practices and characteristics based on sex. It is socially construed, may differ from one society to another and reflects particular power relations between men and women. It refers to roles and responsibilities ascribed or allowed to either a man or a woman by the society. Gender is defined in this study as a social construct describing behaviour and attributes expected of individuals on the basis of being born either male or female. It involves social attributes and opportunities prevalent in the relationship between men and women, boys and girls. These attributes and relationships are socially constructed and learned through socialization processes.

Gender role is defined by the society and this influences the individual's interaction and relationship with others (Akubue & Okolo, 2008). Aliu-Chatta (2008) holds that gender role represents roles that are assigned by the society and their expectations on account of sexism. Sexism, according to Aja-Okorie (2010), manifests in different forms such as in power divisions and other gender relations. As a result of this, men and women are placed in the structure which established the framework within which men and women gain their identities, formulate their goals and carry out their training. Wolfolk (2010) posited that gender roles are socio-cultural expectations that prescribe how males and females should think, act and feel. Thus, gender roles refer to set of cultural expectations that regulate or stipulate the ways of behaviour of each sex.

Gender disparity has been observed by scholars such as Ukhun and Asekhauno (2011) in their submission that gender disparity involves societal preferences between males and females. Okagu (2012) argued that gender disparity shapes individual preferences and power relations between sexes and dictates the type of work considered appropriate for individuals. Thus, one is born and labeled male or female biologically, but learns to be masculine or feminine. Maduewesi (2005) holds that women and men are biologically different, but all cultures interpret and

elaborate these inherent biological differences into a set of social expectations about what behaviours and activities are appropriate for them, and what rights, resources and even power they possess. Ibia (2006) expressed that gender disparity stems from the belief that men were superior to women in all ramifications. Thus, while scholars such as Osuala and Oguoma (2012) have argued that gender disparity tilts in favour of the male folk in all ramifications and that males are more preferred to females in leadership positions, others such as Roesler (2001) argue that the female folk perform better and are more preferred in leadership positions.

The case is not different in the area of work stress and its impact. The World Health Organization (WHO) (2002) in their report averred that gender determines the differential power and control men and women have over the socioeconomic determinants of their mental health and lives, their social positions, status and treatment in society and their susceptibility and exposure to specific mental health risks. They further maintained that gender differences occur particularly in the rates of common mental disorders, depression, anxiety and somatic complaints. Miller, in Ukpai (2002), averred that males are stronger, faster, possesses longer endurance and greater stamina than females, which leads to the presupposition that male administrators are more resistant to stress inducing situations than their female counterparts. Maduakolam (1998) observed that women differ from men in work stress experience and management not only because of sex stereotyping but also because of their concern for their family, thus, women with their feminine characteristics are more vulnerable to stress. Langan-Fox in Burke (2002) agreeing with Maduakolam averred that women have different work stress and health issues than men. This, according to the author, may be because women are uniquely affected by work conditions which may include exposure to chemicals, their reproductive health and work/family roles. Burke (2002) submitted that women experience more stress than men because they engage in second shift-work outside paid employment such as housework, home

management and childcare which may equally affect them in their jobs. Mackin in Roesler (2001) emphasized that though responsibilities at home may be shared between a male and a female, most of the responsibilities are laid upon the female, which may put more stress on them and may also affect their job performance in workplaces

According to a report by the American Psychological Association (APA) (2013), men and women show different reactions to stress in markedly different ways- both physically and mentally. They maintained that women are more likely to report more stress than men and are also more likely to report physical and emotional symptoms of stress than men. Schneider (2006) maintains that women these days have a lot of balancing to do between home and workplaces, including balancing between social and personal requirements such as issues of maternity, menopause, gender roles and conditions at home and workplaces which put more stress on them, leading to frequent absence from workplaces. According to Schultz and Schultz (2003), men and women may express different responses to work stress because they both work in different social circumstances and as such are likely to build up different emotional temperament and personality which make their responses and handling of stress situations to differ. The authors noted that combining housework, childcare, shopping and cooking with an outside employment or job and trying to do everything on time is one of the biggest factors that make women more stressed at work than men. Galanakis et al (2009) stated that women may suffer more from stress than men due to the multiple roles that women are expected to play. They contended that many women have at least four different roles: wife, mother, employee and housekeeper, which are often incongruous and contradictory and lead to various forms of strain with negative consequences for job performance. Nnabuihe, Onyeizugbe and Onwuka (2012) noted that work stress may likely be profound among female lecturers than for their male counterparts. However, while researchers such as Liu and Zhu (2009) opined that men may experience more work stress than

their female counterparts, Al-Omar (2003) opined differently that work stress may affect all employees irrespective of gender differences.

Age and work stress

Age may be defined as the duration, or the measure of time of the existence of a person or the duration of life (Saunders, 2007). Nauert (2010) defined age as the number of years that someone has lived or the number of years that something has existed. Sturman (2000) viewed age as the length and time a man has lived from birth. Age may be seen from different perspectives such as: achievement age, defined as the age in which an individual should be able to complete a specific task successfully, chronological age which means the actual measure of time that has elapsed since birth, mental age which defines the age level of mental ability of a person as gauged by standard intelligence tests, biological age which denotes age as determined by physiology rather than chronology, showing the physical structure of the body as well as changes in the performance of motor skills and sensory awareness and psychological age which explains age based on a person's behavior, among others (Saunders, 2007). Age is defined in this study as the period that has elapsed since the birth of an individual or the length of time an individual has existed (chronological age).

Scholars have tendered differing views concerning the impact of age on work stress. Hasselhorn, Tackenberg and Peter (2003) argue that an ageing population implies an increasing prevalence of chronic illnesses such as stress. Costa (2003) averred that age may be associated with an increased vulnerability to several health issues such as work stress. Conway (2005) posits that older workers may be at risk of work stress because they may find it more difficult to adapt to changing work demands and unstable work environments resulting from continuous technological changes. Costa and Sartori (2007) hold that ageing is associated with a higher risk of poor health which results in poor work ability, poor sleep, chronic fatigue, cardiovascular,

gastrointestinal and mental disorders. Hawkley and Caciopopo (2004) maintain that the effects of stress and age are truly interactive, with stress exacerbating the effects of aging and vice versa. Conway, Campanini, Sartori, Dotti and Costa (2008) aver that ageing or being older may be associated with decreased physical health and consequently decrease in job performance. Scholars such as Galanakis et al (2009) argued contrarily that as people get older, they experience less stress and that the younger individuals are usually prone to higher stress levels. Sharpley, Reynolds, Acosta and Dua in Mahmood et al (2013) agree with Galakanis et al that younger employees may report more work stress than older ones. This, according to the authors, may be because older employees have reached a stage where career development is not their major concern and hence a number of job characteristics which may cause stress to younger staff who have their career ahead of them, do not cause stress to older staff. Mundell (2002) opined that older people may suffer less from stress and its effects due to the fact that they are taking things easy and realizing that it's not worth getting upset about small things.

However, some scholars such as Beatty and Burroughs (1999) maintain that being older or younger does not predispose employees to health problems but rather health issues can affect anybody regardless of age. Bittman (1999) maintains that there is no age at which individuals are exempted from stress and even children are not exempted from it and consequences. Wiley (2000) agrees with Bittman that stress is a biological phenomenon that is experienced by all persons regardless of their age. Balakrishnamurthy and Shankar (2009) reported that age had no impact on the stress responses of individuals and their productivity at work. The authors further maintained that while stress affects everyone differently, age as a specific factor neither affects stress nor job performance of individuals. Lee (2009) averred that, though at first glance, it may seem that older people are more prone to work stress, especially if their physical conditions become limiting, stress affects everyone differently regardless of age. The author further

emphasized that young people may be more stressed by factors relating to interpersonal tension, middle aged people may be more stressed by job and career demands, while for older people, it may be more of health issues rather than age that could create stress for them.

Work experience and work stress

Work experience may be defined as the knowledge and skill one has gained while working in a specific field or occupation for a period of time (Ukpai, 2002). Okagu (2012) viewed work experience as the experience gained in a workplace over a period of time. Ibia (2006) holds that work experience arises from being on a job and interacting with and learning from the circumstances of the job. The author further avers that experience comes through regular and persistent practices on a job situation. Work experience is defined in this study as the knowledge an individual accumulates in the course of doing a particular work over a period of time. Thus, one is likely to gain a wide range of experiences from a job if he/she has been working for a relatively long period of time.

The major key to successful performance of a job is the possession of relevant skills and experience. Igbo (2002) maintains that when an administrator is experienced in a job, he or she can make rational and progressive decisions. Chima (2003), supporting Igbo, submitted that lack of experience leads to lack of direction, while good experience brings about favourable production, dynamism, purposeful and coordinated goal-directed activities. Edem (2006) argues that possession of work experience enables a leader to easily find solutions to complex managerial problems. Essien (2010) posit that work experience significantly influences the attitude and ability of workers to carry out their responsibilities. Adefolaju in Ibia (2006) noted that experienced workers are usually more confident, more knowledgeable, more diplomatic and tactful than inexperienced ones. Okagu (2012) stated that good management experience generally enhances problem identification, direction to act and useful co-ordination of relevant

activities to achieve predetermined goals. Thus, possession of adequate work experience can contribute to a person's ability to finding solution to complex problems easily.

Concerning work experience and work stress, Anisman and Merali (1999) stated that an individual's work experience may affect his or her response to stress. In the same vein, Adesina and Ogunsaju in Ukpai (2002) posited that lack of adequate experience and inadequate preparations on the part of administrators may render them vulnerable to stress. Al-Omar (2003) holds that increase in the demographic factor of work experience may increase work stress among workers. The authors maintained that the more experience the employees have, the more likely they are to suffer more stress at work. Sager in Mahmood et al (2013) averred that the ability to manage stress associated with job and organization increases with years of work experience. Aftab and Khatoon (2012) hold that the prevalence of occupational stress among workers may be predicted based on level of work experience. On the contrary, Chaturvedi and Purushotamam (2009) hold that having less years of work experience may be associated with better ability to handle stressful situations.

Educational qualification and work stress

Education may be defined as a training that involves the acquisition of knowledge, abilities, development of character, mental power and a continuous process in which one step prepares the way to the next (Ukeje, 2000). The National Policy on Education, Federal Republic of Nigeria (FRN) (2004), defines education as a process which helps to develop an individual fully so that he can function effectively in whatever environment he finds himself. Ocho (2005) conceptualized education as a process of equipping the individual with appropriate knowledge, values, skills and the development of potentials for effective functioning in his or her society. Ezeani (2006) sees education as a body of knowledge and organized experience to be accommodated by individuals so as to guide them in the right and proper direction as well as

enable them achieve their set goals. Lohithakshan (2007) maintains that education is the process of developing the potentials of man to the optimum level in order to enable him/her live a productive and happy life in the society. Implicitly, education is a venture that every individual and every society needs. It helps to prepare, equip and secure individuals for all aspects of life and provides them with the basic foundation to function and develop their society. Education is defined in this study as the transmission of idea, knowledge, skills, values and beliefs from one generation to another. It enables an individual to acquire skills, knowledge and character for useful living.

The central role of education, according to Obunadike (2007), is to transform individuals in the society to be responsible and functional members of the society. Aboho and Oñkwu (2013) hold that education is expected to inculcate in an individual the right type of values and attitudes for survival as well as enable him/her acquire appropriate skills, abilities and competencies, both mental and physical, to contribute to the development of his society. Mirowsky and Ross (2007) posit that formal education serves three functions in modern societies: developing abilities through progressive instruction and training, grading individual levels of development and getting advancement and regulating access to occupations and jobs. This may depend on the educational qualification one possesses.

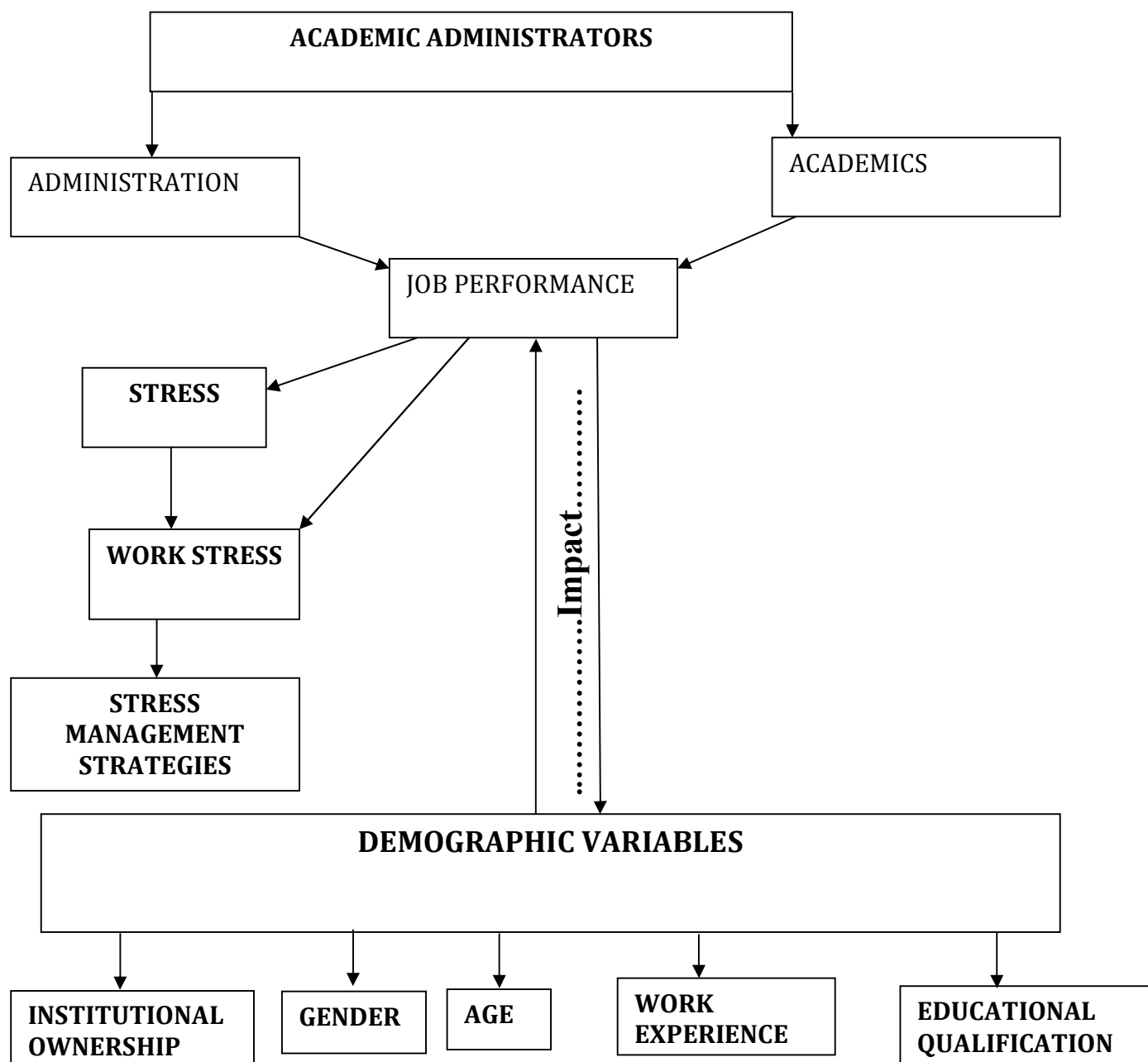
In this wise, educational qualification refers to the degrees, diplomas, certificates, professional certificates among others, that an individual has acquired whether by full-time study, part-time study or private study, whether from the home country or abroad and whether conducted by educational authorities, special examining bodies or professional bodies (Dee, 2012). NG and Feldman (2009) refer to educational qualification as the academic credentials or degrees an individual has obtained. The Robert Wood Johnson Foundation (RWJF) (2009), in their report, defined educational qualification as the educational attainment or the years or level

of overall schooling a person has. Educational qualification is defined in this study as the degrees obtained by an individual that certify the completion of specific academic programmes. Academic or educational qualification displays that a person has the basics in learning.

Concerning educational qualification and work stress, Gallow and Matthews (2003) opined that people with higher educational qualifications have more demanding jobs that require greater abilities and thus have greater worries which may put more stress on them than those with lower educational attainment. Finkelstein et al (2007) aver that people with higher educational qualification are more optimistic and have more resources to cope with or manage stressful situations than people coming from lower socio-economic status with lower level of education. Cohen, Kaplan and Salonen (1998) submit that higher educational qualifications have been linked with greater perception of personal control, skills, habits and attitudes such as purposefulness, self-directedness, perseverance and confidence that shape what happens to people and also may enable them gain access to resources that promote health. Legender and Kraft (2003) posit that higher educational qualification gives employees increased sense of control which may in turn be linked with health outcomes including higher levels of self-rated health, lower levels of physical impairment and decreased risk of chronic conditions such as stress. Mirowsky and Ross (2008) maintain that the higher the level of education, the less likely individuals will get into situations of chronic stress, the better they cope if in them, and the quicker they get out or correct the situation. Braveman and Egerter (2008) posited that people with higher educational qualification are likely to live longer, experience better health outcomes and practise health-promoting behaviours or stress management such as exercising regularly, refraining from smoking and obtaining timely health-care check-ups and screenings thereby reducing stressful situations. Hardy (2013) submitted that workers with less formal education and training are more likely to hold lower-paying jobs with more occupational hazards and poor

working conditions that put them at higher risk of psychosocial stress, especially at work. Telfair and Shelton (2012) averred that those with more education are less likely to report that they are in poor health or are experiencing anxiety or depression. However, Gary (2012) opined that educational qualification may not have relationship with the experience of work stress.

Fig. 1: Schematic diagram of the relationship between the variables



The diagram above shows diagrammatic representation of the major concepts and variables as contained in the study, which are: stress, work stress, academic administrators and demographic variables. The arrows are used to depict the interconnectedness of the concepts and variables. Thus, stress or work stress among academic administrators emanates as a result of the performance of both academic and administrative responsibilities, which in turn may impact on their job performance. However, the impact of work stress on the job performance of the academic administrators may further be mediated by the demographic make-up of the academic administrators such as institutional ownership, gender, age, work experience and educational qualification. The academic administrators could deal with the impact of work stress on their job performance through the adoption of various stress management strategies.

Theoretical Framework

Several theories on stress exist in literature, and for the purpose of this research, some of such theories that are relevant to this study are discussed. They include: The General Adaptation Syndrome (GAS) Theory by Selye (1936), The Person-Environment (PE) Fit Theory by French, Rodgers and Cobb (1974) and the Transactional Model of Stress by Lazarus and Folkman (1984), Theory of Organizational Behaviour by Getzels and Guba (1957).

The General Adaptation Syndrome (GAS) Theory

The General Adaption Syndrome (GAS) Theory, propounded by Hans Selye in 1936, represents a three-stage reaction to stress. In this theory, Selye posits that the process of exposure to stress experienced by all individuals manifests in three distinctive stages: the alarm reaction (AR) stage, the stage of resistance (SR) and the stage of exhaustion (SE). The three stages are explained below.

The alarm reaction stage depicts the immediate reaction to a stressor. In the initial phase of stress, human beings exhibit a "fight or flight" response, which prepares the body for physical

activity. The body identifies and first reacts to the stress by releasing hormones that help in the defense against the stressor, thereby producing various psychological changes such as increase in heart rate, perspiration, blood pressure and others. If the stress persists, the individual will experience what is termed the "disease of adaptation" in the form of headache, fever, fatigue, loss of appetite and nausea in preparation for the second stage.

The second stage, which is the stage of resistance, may also be tagged "stage of adaptation. During this phase, the body tries to adapt to the stressor it is exposed to or tries to cope with the stress situation, and changes at many levels take place in order to reduce the effect of the stressor. The capacity of the individual may be limited and as such, if the resistance fails, the concentrated defense of the body breaks down and the stress becomes severe and at this point, the phase is replaced by the last stage which is the stage of exhaustion.

The last stage which is the stage of exhaustion depicts that the stress has continued for some time. The body's resistance to the stress has gradually been reduced, the body and mind are no longer able to make the necessary adjustments to resist the stressors or the stressing agent resulting in physical or mental exhaustion. Selye explained that the adrenal glands can no longer function properly and the body system begins to deteriorate. This means that the immune system and the body's ability to resist diseases may be almost totally eliminated which might result to what Selye described as "psychosomatic disorder" involving both mental and physical imbalances. Thus, when the auxiliary channels of defense are exhausted, death may result.

The relevance of this theory to this study lies in Selye's dogged ability to demonstrate that variety of stressors produce the same pattern of effect and response from individuals in the experience of stress. In other words, individuals respond to stress in the same way. Thus, the position of Selye that human reactions to stress are the same seem to have provided a level-playing-ground to support or debunk the idea (from literature), that factors such as perceptions,

the context in which the stressors occur and personality make-up of individuals could play significant roles in stress response. This study may justify or debunk this assertion by looking at the impact of work stress on the job performance of academic administrators of universities in South East Nigeria, against the backdrop of demographic variables of institutional ownership, gender, age, work experience and educational qualification

The Person-Environment (P.E) Fit Theory

The Person-Environment Fit Theory of stress was propounded by French, Rogers and Cobb in 1974. According to the proponents, stress is likely to occur when there is discrepancy between the motives of a person (the worker) and the supplies of the environment (the job), or between the demands of a job and the abilities of an individual to meet those demands. Motives include factors such as participation, income and self-utilization, while demands include workload and job complexity. The theory holds that when the work environment fails to meet the needs and abilities of the worker, the worker develops distress that often leads to specific illnesses which negatively affects the health of the worker. The main thrust of this theory is that when there is mismatch between a worker and the work environment, stress is likely to occur. The proponents maintain that the discrepancy between what a person desires or expects to get from the work environment and what the person actually gets results in a stress or coping response in the form of psychological or behavioural reactions.

The theory is relevant to this study in the sense that work stress is seen in terms of a situation where a person's skills and abilities do not match with the work demands and requirements, or when the employee's needs are not fulfilled by the job environment. Thus, work stress among academic administrators of universities in South East Nigeria could emanate as a result of mismatch between their job environment or requirements and their abilities to rise up to

such demands. The theory thus describes the very challenging demands academic administrators may encounter as they execute their daily responsibilities and tasks.

The Transactional Model of Stress

The Transactional Model of Stress, developed by Lazarus and Folkman in 1984, posits that the effects or impact of a potential stressor on health and well-being depends upon cognitive processes, whereby individual appraisals are essential in determining the degree to which a potential stressor will be perceived as threatening and in shaping people's judgments about resources available to cope. According to the proponents, as a result of these appraisals, the individual will enact specific coping strategies to deal with the potential source(s) of stress. The proponents conceptualize stress as a result of how a stressor is appraised and how a person appraises his/her resources to cope with the stressor. The model further proposes that stress can be reduced by helping stressed people change their perceptions of stressors, providing them with strategies to help them cope and improving their confidence in their ability to do so.

Relating the theory to the study, the impact of work stress on academic administrators's job performance in universities in South East Nigeria may be viewed in a transactional perspective. The experience of work stress among this group of university employees may elicit appraisals and coping responses that influence the way they respond to the stressors. These responses could depend upon several factors attributable to both the individual and the organization, quality of work life and support from the external social environment.

Theory of organizational behavior by Getzels and Guba

The Theory of Organizational behavior, propounded by Getzels and Guba in 1957, explained the dynamics of human behaviour in organizations, and the social environment within them. The proponents viewed an organization as a social system where task achievement is based on participatory effort of every member of the organization. The theory is based on the

assumption that task achievement of a social system irrespective of the nature of the task, requires the combined efforts of a number of people, with varying functions and responsibilities, arranged in a hierarchical order. According to the theory, the observed behavior of an individual in an organization is a function of the interaction between two dimensions which are significant factors in producing organizational behavior: the organizational dimension also called nomothetic/normative dimension consists of three conceptual elements- institution, role and expectations (institutional role expectations), and the personal dimension also called idiographic dimension which also consists of three conceptual elements-individual, personality and need disposition (individual personality and needs). Thus, the major thesis of this theory is that, while organizations are established for the purpose of achieving goals and fostering their own survival through the efforts of the individual workers, the workers also join the organizations with the hope of realizing their individual needs. While the organization strives to realize their organizational goals, the individuals and their interests tend to diminish. In the same vein, the worker tries to achieve his/her individual needs while performing organizational tasks and this also adversely affects the goals of the organization. Therefore, performance in a social system is a function of the interaction between role and personality. This conflict of interests presupposes that the individual (worker) and the organization are in an apparent cold war.

Getzels and Guba's theory of organizational behaviour is relevant to this study as it established two parameters. The activities of academic administrators of universities are dictated in large measure by the role prescriptions of their specific institutions. Their performance is based on their positions within the academic hierarchy, with role expectations (academic and administrative responsibilities) incumbent upon their positions. Their effective and efficient performance of these roles may depend on the synthesis between their institutional role expectations and individual personality and needs. The ability of the university management to

strike a balance between the academic administrators' roles in the university and the realization of their individual needs, may trigger or ameliorate stressful situations in the universities, which may also have implications on their job performance.

Review of empirical Studies

This section reviewed some empirical works that are related to this study.

Studies on work stress factors

Omoniyi (2013) conducted a study on the sources of workplace stress among university lecturers in South West Nigeria: Implication for counseling. The aim of the study was to investigate the sources of work stress among university lecturers in Nigeria. One research question and one null hypothesis were raised to guide the study. The ex-post facto research design was used for the study. The population of the study consisted of all academic staff in Nigerian universities. The stratified random sampling technique was used to select 364 lecturers made up of 223 males and 141 females, drawn from eight (8) Nigerian universities as sample for the study. An instrument titled "Self Report Perceived Stress Assessment Questionnaire" (SRPSAQ) was used for data collection. Cronbach alpha was used to determine the reliability coefficient which yielded a score of 0.86. The data collected were analyzed using descriptive statistics (frequency, percentage, mean and standard deviation) and inferential statistics (t-test). The results of the study revealed the sources of stress experienced by university lecturers to include poor research incentives, poor conditions of lecturers' offices, lack of facilities and supervision of students' projects.

The study relates to the present study because both were interested in determining the factors responsible for work stress among university lecturers. However, the study under review did not examine ways that work stress can be managed. The present filled the gap by proffering management strategies for dealing with work stress.

Peretomode (2012) conducted a study on work and stress among academic administrators of higher education institutions in Delta State. The aim of the study was to identify the sources and level of stress among academic administrators of tertiary institutions in Delta State of Nigeria and how they handle job-related stress. Four research questions were formulated to guide the study. The ex-post facto design was used for the study. The population of the study comprised 141 academic administrators of five institutions of higher learning in Delta State, made up of 94 academic heads of departments, 23 deans of faculties and 24 directors of academic departments. The proportionate random sampling method was used to select 72% of the respondents from each of the categories of academic administrators, which gave a total of 102 respondents. An instrument titled "Job-Related Stressors and Stress Management Techniques of Academic Administrators Questionnaire" (JSSTACQ) was developed by the researcher and used to obtain data from the respondents on the sources, levels and coping strategies. The instrument had a test-retest reliability coefficient of 0.82. Descriptive statistics- frequency, percentage and mean, were used to analyze data. The results showed that the determinants of stress among the administrators are numerous and varied, with compilation of results, time pressures, lack of infrastructure, overseeing the conduct of semester examinations, students' indiscipline and the prevalence of all forms of examination malpractices among students as high ranked stressors. The findings also revealed that the administrators experience on the average a low to moderate level of stress and this does not affect their performance. The study also revealed that physical exercises, relaxation, prayers, listening to music, laughter, talking positively to self and meeting with others are the strategies dominantly utilized by the academic administrators in coping with work stress.

The relevance of this study to the present study is that both studies sought to identify the sources of work stress and ways of coping with work stress among academic administrators of

tertiary institutions. However, the present study further examined the impact of work stress on academic administrators' job performance based on the demographic variables of institutional ownership, gender, age, work experience and educational qualification.

Atindanbila (2011) conducted a research on perceived stressors of lecturers at the University of Ghana. The aim of the study was to examine the perceived stressors that lecturers at the University of Legon, Ghana encounter in their job. Four null hypotheses were postulated to guide the study. Descriptive survey research design was used for the study. The population of the study consisted of 720 lecturers, and the stratified random sampling technique was used to select a sample size of 432 lecturers across all the academic departments of the university. An instrument tagged 'Teacher Stress Inventory' (TSI), developed by Fimian (1988) was modified and used for data collection. The Cronbach alpha was used to ascertain the reliability of the instrument which stood at 0.90. One Way Analysis of Variance (ANOVA) and Independent t-test were used for data analysis at 0.05 level of significance. The result revealed that the lecturers suffered stress emanating mostly from the school environment (working conditions) and performance of both academic and administrative responsibilities.

The study is relevant to the present study as both examined the factors that engender work stress among university lecturers. However, while the former dealt only on examining work stress factors among university lecturers in Ghana, the present further investigated the impact of work stress on academic administrators' job performance in universities in South East Nigeria.

Archibong, Bassey and Effiom (2010) carried out a research on occupational stress sources among university academic staff. The aim of the study was to find out the sources of work stress among university lecturers in Cross River and Akwa Ibom States. Two research questions and one null hypothesis were formulated to guide the study. Descriptive survey

research design was employed in the study. Male and female academic staff of the two universities in the states namely, Cross River State University of Technology (CRUTECH) and University of Uyo (UNIUYO) constituted the population of the study. Accidental sampling technique was utilized to select one hundred and sixty eight males (168) and one hundred and eleven females (111) totaling two hundred and seventy nine (279) respondents. A questionnaire developed by the researchers titled "Stress Sources Questionnaire" (SSQ) was used for data collection. The reliability coefficient of the instrument was calculated to be 0.78 using Cronbach alpha. Mean scores and standard deviations were used to answer the research questions, while independent t-test analysis was employed to test the hypothesis at 0.05 level of significance. The study revealed that students were the greatest source of stress to the respondents with regards to interpersonal relationships. With respect to research, sourcing of funds for research was the highest source of stress. With regards to teaching, it was collation of results, while sourcing for funds for career development was the highest with respect to career development. Overall result indicated that career development was the greatest source of stress to the respondents.

The reviewed study is in alliance with the present study because both studies bothered on the sources of work stress. However, the reviewed study created a gap in that it did not look into ways of coping with work stress. The present study not only looked into the various strategies of dealing with work stress but further examined the impact of work stress on academic administrators' job performance.

Studies on work stress and job performance

Nnabuife, Onyeizugbe and Onwuka (2012) conducted a research on stress management and occupational performance among female lecturers in Nigeria. The study aimed at identifying the sources and effects of job stress on the health of female academics in Nigerian universities and its impact on job performance of female academics. Two null hypotheses were postulated to

guide the study. Descriptive survey research design was used for the study. The sample was made up of one hundred and thirty five (135) respondents selected from four universities across Nigeria, using simple random sampling technique. Data were collected with structured questionnaire. Data obtained were analyzed using statistical summation techniques involving sample mean and frequency. The z-test statistics was used to test the null hypotheses at 0.05 level of significance. The result shows that occupational stress affects the health of female lecturers in Nigerian universities and consequently their job performance.

The study is relevant to the present study as both focused on determining the sources of job stress and the impact on job performance. However, the study created a gap as it concentrated only on female academics. The present study focused on all the academic administrators in all the universities in South East Nigeria, both male and female.

Alabi, Murtala and Lawal (2012) conducted a research on lecturers' work stress and job performance in Kwara State Colleges of Education. The aim of the study was to investigate the relationship between work stress and job performance among lecturers in Kwara State Colleges of Education. Three research questions and three null hypotheses were raised to guide the study. The correlational research design was used for the study. The population consisted of all the lecturers in the three Kwara State Government-owned Colleges of Education: Colleges of Education Ilorin and Oro, and College of Education (Technical) Lafiaji. One hundred and ninety one lecturers were selected for the study, using the simple random sampling technique (90 from Ilorin, 71 from Oro and 30 from Lafiaji). A research instrument entitled 'Work Stress Measurement Questionnaire' (WSMQ) and a proforma entitled 'Job Performance Assessment Proforma' (JPAP) were used for data collection. The reliability coefficients were calculated to be 0.87 and 0.86 respectively using Cronbach alpha. Data generated were analyzed using Pearson Product Moment Correlation Statistics. The findings of the study revealed that lecturers

experienced excessive workload in academic activities. The study further revealed that lecturers' job performance was negatively influenced by physiological, psychological and behavioural work stress. The study has relevance to the present study because both studies aimed at finding out the causes of work stress and their impact on job performance. However, the reviewed study created a gap by not examining the ways to manage work stress. The present filled the gap by examining stress management strategies.

Keshavarz and Mohammadi (2011) conducted a research on occupational stress and organizational performance: Case study of Iran. The aim of the study was to determine the factors associated with occupational stress and their relationship with organizational performance of academic staff at the University of Tehran, Iran. Three research questions and three null hypotheses were raised to guide the study. Descriptive survey research design was used for the study. The population consisted of 135 lecturers from different departments in the University of Tehran, made up of 87 males and 48 females. Data were obtained with a researcher-made questionnaire. The reliability estimate of the instrument was 0.85 which was ascertained using Cronbach alpha. Mean scores and standard deviation were used to answer the research questions while the t-test statistics was used to test the null hypotheses at 0.05 level of significance. The findings indicated that most of the employees experienced high degree of occupational stress resulting from such job stressors as role conflict and role ambiguity, lack of promotion and feedback, lack of participation in decision making, lack of authority, unsatisfactory working conditions and interpersonal relationships. The findings further revealed that these job stressors affected the general physical health of the employees, their job satisfaction and performance as well as their commitment negatively.

This study is relevant to the current study since the current study also examined the work stress factors and how they impact on job performance. However, the current study further

examined management strategies for dealing with work stress. Also, while the reviewed study was conducted among university lecturers in Tehran, Iran, the current study was carried out among academic administrators of universities in South East, Nigeria.

Sulaiman and Akinsanya (2011) conducted a research on stress and instructors' efficiency in Ogun State Universities: Implications for Nigerian educational policy. The aim of the study was to determine the effects of stress on the efficiency of lecturers in public and private universities, with regards to teaching workload, job security, working environment, remuneration, leadership role and provision of educational resources. Four research questions and six null hypotheses were raised to guide the study. Descriptive survey research design was used for the study. The purposive sampling technique was adopted to select forty (40) academic staff members across the faculties, from two public and two private universities in Ogun State. This gave a total number of one hundred and sixty (160) respondents for the study. A questionnaire titled 'Stress and Teachers' Effectiveness' (SATE), was used for data collection. Mean and standard deviation were used to answer the research questions while the Independent t-test was used to test the hypotheses at 0.05 level of significance. The findings from the study revealed that though teachers from both the public and private universities were working under stress, those from public universities were more prone to stress than their counterparts in private universities, which negatively affected their efficiency.

The above study is relevant to the present study in that it dealt with the work stress factors and their consequences on the efficiency of lecturers which have implications on their job performance, which was also investigated in this present study. However the present study further examined stress management strategies that could be employed in dealing with work stress

Studies on Demographic Variables and Work stress

Ejue (2013) carried out a research on comparison of occupational stress among academics in federal and state universities in Nigeria. The aim of the study was to find out the general level of externally induced stress among academic staff and whether there is difference in such a level between those in federal universities and state universities. One research question and one null hypothesis guided the study. The study adopted the expost-facto research design. The purposive sampling technique was used to draw 214 lecturers from the University of Calabar (federal-owned) and Cross River State University of Technology (state-owned). The instrument for data collection was structured questionnaire. Simple percentage was used in answering the research question, while independent t test statistics was used in testing the hypothesis at 0.05 level of significance. The result showed that there is no significant difference in the level of perceived stress between academic staff of federal and state universities.

The reviewed study is relevant to the present study being that both were interested in the demographic variable of ownership of university (federal and state). However, while the reviewed study focused on establishing perceived difference between the level of stress experienced by lecturers (academic administrators inclusive) in federal and state universities, the present study sought to determine the impact of work stress on the job performance of only the academic administrators based on not only university ownership, but also on other demographic variables such as gender, age, work experience and educational qualification.

Mahmood, Qurat, Nudrat and Zahor (2013) carried out a research to investigate the impact of age and level of experience on occupational stress of academic administrators at higher educational level in Punjab, Pakistan. The study aimed at determining the impact of age and work experience on occupational stress among academic managers in higher educational Institutions in Pakistan. Four null hypotheses were postulated to guide the study. Descriptive

survey research design was used for the study. The population of the study consisted of all the 295 academic managers in public sector degree colleges in Punjab, made up of 132 males and 163 female academic managers. The simple random sampling technique was used to select 60 male and 60 females, totaling 120 academic managers as sample for the study. In order to elicit information from the participants, a research instrument code named "Occupational Stress Inventory-Revised" (OSI-R) developed by Osipow (1998) was used. Cronbach alpha was used to ascertain the reliability of the instrument which yielded a score of 0.91, indicating that the instrument was reliable. Data generated from the study were analyzed using mean, standard deviation, ANOVA and Pearson Product Moment Correlation (PPMC). The findings revealed that both demographic variables of age and work experience had significant relationship with occupational stress. It was revealed that younger and older academic managers experience more stress than the middle aged ones. It was further revealed that less experienced academic managers had distinctly higher levels of stress than their more experienced counterparts.

The reviewed study aligns to the present study as it touched on the influence of demographic variables of age and work experience on work stress which the present study also focused on. However, the present study included more demographic variables of institutional ownership, gender and educational qualification and further investigated the impact of work stress on job performance based on these demographic variables. Also, while the reviewed study was carried out among academic administrators of higher education institutions in Pakistan, the present study was carried out among academic administrators of universities in South East Nigeria.

Bada and Falana (2013) carried out a research on gender influence on the stress experience of university lecturers. The aim of the study was to determine the sources of work stress among lecturers in Ekiti State University and to investigate the influence of gender on the

stress experienced by the participants. One research question and one null hypothesis were formulated to guide the study. Descriptive survey research design was used for the study. The stratified random sampling technique was used to select 100 lecturers in all the faculties of Ekiti State University. A research instrument titled "Lecturers Stress Prevalence Measuring Scale" (LSPMS) was used for data collection. Test-retest reliability was done and computed using Pearson Product Moment Correlation method, and correlation coefficient of 0.72 was obtained. Data obtained from the study were analyzed using independent t-test at 0.05 significant level. The result of the study showed that inadequate infrastructure and poor physical working conditions are the highest stress factors, followed by workload pressure, poor remuneration and attending seminars and workshops were the sources of stress experienced by lecturers. The study found no significant difference between stress experienced by male and female lecturers.

This study is related to the present study given that they both examined the factors of work stress and the influence of demographic variables in the experience of work stress. However, while the reviewed study only focused on gender as a demographic variable, the present study examined the impact of work stress on academic administrators' job performance based not only on gender but also on institutional ownership, age, work experience and educational qualification and further examined strategies employed in dealing with work stress.

Omoniyi and Ogunsami (2012) carried out a research study on stress among academic staff of universities in South West Nigeria. The study aimed at investigating the influence of demographic variables of gender, marital status and work experience on the level of perceived stress among university lecturers in South West Nigeria. Three null hypotheses were postulated to guide the study. Descriptive survey research design was used for the study. The population of the study comprised all university lecturers in the South West. The stratified random sampling technique was used to select eight universities (3 federal, three state and two private universities)

and a total of three hundred and sixty- four subjects consisting of 233 males and 141 female lecturers as sample for the study. A researcher-developed instrument titled "Self Report Perceived Stress Assessment Questionnaire" (SRPSAQ) was employed to gather data from the respondents. The reliability of the instrument was determined through test- retest method using Pearson Product Moment Correlation statistics and a reliability coefficient of 0.86 was obtained. The data generated from the study were analyzed using mean scores and standard deviations, and independent t-test analysis at 0.05 level of significance. The result of the study indicated that there is no significant difference in the level of perceived stress among the respondents based on gender and years of work experience. However, significant difference was found between the levels of stress perceived by married and single lecturers.

The study has relevance to the present study as it focused on demographic variables of gender and work experience which the present study also focused on. However, while the study looked at these variables regarding perceived level of stress, the present study looked at the variables against the backdrop of job performance of academic administrators.

Chauldhry (2012) carried out a study on the relationship between occupational stress and job satisfaction: The case of Pakistani universities. The study aimed to find out the relationship between occupational stress and job satisfaction based on gender, age, nature of job, work experience and sector of university, among university teachers in Pakistan. Five null hypotheses were postulated to guide the study. Descriptive survey research design was used for the study. The population of the study consisted of 500 university teachers from three public and three private universities in Punjab, Pakistan. The stratified random sampling technique was employed to select 150 private and 350 public university lecturers. The "Professional Life Stress Scale" (PLSS), developed by Fontana (1989) from The British Psychological Society and Routledge London, was modified and adapted for the study. Cronbach alpha was used to determine the

reliability of the instrument which yielded 0.84 as internal reliability. Data generated from the study were analyzed using Pearson Product Moment Correlation (PPMC) and tested at 0.05 level of significance. The findings showed no significant relationship between job satisfaction and overall occupational stress. No significant relationship was established between occupational stress of university lecturers based on gender and nature of job. However, the study found significant relationship between occupational stress of university teachers based on age and work experience.

The study has relevance to the present study because it dealt with the demographic variables of gender, age and work experience which are some of the variables considered by the present study. However, while the reviewed study examined these demographic variables in relation to job satisfaction, the present study examined them in relation to job performance. Also, while the reviewed study was carried out among university lecturers in Pakistan, the present study focus on academic administrators of universities in South East, Nigeria.

Ofoegbu and Nwadiani (2006) conducted a research on the level of perceived stress among lecturers in Nigerian Universities. The study aimed at examining the level of stress among lecturers in Nigeria based on the demographic variables of gender, age, marital status, work experience, domicile, areas of specialization and administrative responsibilities. Four null hypotheses were postulated to guide the study. Descriptive survey research design was used for the study. The sample consisted of one hundred and twenty three male and one hundred and five female lecturers, selected from five federal and three state universities sited in Southern part of Nigeria. The proportional sampling was used to select one hundred and seventy seven federal university lecturers and fifty- one state university lecturers from eight universities, totaling two hundred and twenty- eight (228) lecturers as respondents for the study. A research instrument titled "Stress Assessment Questionnaire" (SAQ), developed by the researchers was used for data

collection. The reliability coefficient of the instrument was calculated to be 0.87 using Cronbach alpha. Mean scores, standard deviation, z-tests and Analysis of Variance were employed for data analysis and tested at 0.05 level of significance. The result of the study revealed that the level of stress among lecturers in Nigeria was significantly high irrespective of their gender, marital status, place of domicile and whether they work in a federal or state university. However, the level of stress was statistically different among experienced and less experienced lecturers, and among young and older lecturers. Both the less experienced and younger lecturers experienced more stress than the more experienced and older lecturers.

The study is related to the present study given that both studies were interested in examining the influence of demographic variables in the experience of work stress among university lecturers. However, the present study was extended to the demographic variables of educational qualification, and also examined stress management strategies, which were not covered by the reviewed study.

Studies on stress management strategies

Ajayi and Adamu (2012) carried out a research on stress management among heads of departments in Nigerian Colleges of Education. The aim of the study was to investigate the levels of stress experienced by heads of departments as well as the strategies they used in managing stress. Two research questions and two null hypotheses were raised to guide the study. Descriptive survey research design was adopted for the study. The population of the study was made up of all the lecturers in all the colleges of education in Ekiti State, while the sample comprised forty (40) Heads of Academic Departments, selected using simple random sampling technique. A researcher-developed instrument titled "Questionnaire on Stress Management among Heads of Departments in Tertiary Institutions" (QSMHADTI) was used for data collection. The reliability coefficient of the instrument was calculated to be 0.76 using Cronbach

alpha. The data collected were analyzed using frequency counts, percentage scores and t-test statistics. The findings of the study showed that Heads of Academic Departments were stressed to a large extent which lowers their capacity to carry out their jobs. The study further revealed that the predominant strategies employed by the Heads of Departments in managing stress include sharing feelings with trusted friends; creating time for leisure activities; expressing feelings instead of bottling them up; forgiving others; relaxing from routine work; positive thinking; taking vital medications; adequate sleep; keeping sense of humour, getting help from a mentor and physical exercise.

The reviewed study is relevant to the present study, as it investigated the sources of stress and examined the strategies used in managing stress which the present study also focused on. However, the present study further investigated the impact of work stress on academic administrators's job performance based on demographic variables of institutional ownership, gender, age, work experience and educational qualification. Also, while the study was carried out among heads of departments of colleges of Education in Ekiti State, the present study focused on not only heads of departments but was extended to deans of faculties and directors of centers and institutes in universities in South East, Nigeria

Oboegbulem (2008) carried out a research study on management of administrative related stress of academic heads of departments in Federal and State Universities in South East Nigeria. The aim of the study was to examine the sources of stress and stress management among heads of departments in federal and state universities in South East Nigeria. Descriptive survey research design was used for the study while the population constituted all the heads of departments in four federal and state universities in South East Nigeria. Two research questions and one null hypothesis were raised to guide the study. The instrument for data collection was questionnaire developed by the researcher. Mean scores and standard deviations were used to

answer the research questions while independent t- test analysis was used to test the null hypothesis. The findings showed that poor school structure, poor working conditions and time pressure were sources of administrative related stress to heads of departments in federal and state universities in South East Nigeria, while strategies such as physiological activities, cognitive and psychological strategies, interpersonal, and organizational management strategies were employed by the respondents in managing stress. The findings further revealed no significant difference in the mean responses of heads of departments of federal and state universities on the strategies adopted in management of administrative related stress.

The study is relevant to the present study as both focused on determining the sources of stress and ways of managing stress. However, while the reviewed study focused on only heads of departments, the present study included deans of faculties and directors of institutes/centers in universities in South East Nigeria.

Salami (1994) carried out a survey research study on analysis of stress among lecturers and their coping methods. The study aimed at investigating the sources, frequency and degree of stress among lecturers of Colleges of Education, Ilorin and Oro and Kwara State Polytechnic Ilorin, and their coping methods according to their ages and teaching experience. Five research questions and five null hypotheses guided the study. Descriptive survey research design was used. The instrument for data collection was the "Personal and Work-Situation Stress Questionnaire" (PWSQ) adapted from Blaise (1984). The data obtained from the study were analyzed using the chi-square test and One-Way Analysis of Variance and tested at 0.05 level of significance. The results obtained showed that workload and inadequate teaching facilities were the stressors that have the greatest effect on the work of the lecturers. The lecturers were found to experience stress occasionally, while the degree of stress experienced was moderate. The study further revealed that the commonest coping methods adopted by the lecturers in dealing with

stress were resting/relaxation and sleeping and that age and teaching experience have effects on the methods adopted by the lecturers in coping with stress.

The study allies with the present study given that both studies aimed at examining the sources of work stress and to identify the coping strategies for work stress. However, while the reviewed study focused generally on lecturers, the present study specifically focused on academic administrators of universities made up of deans, heads of departments and directors of centers and institutes. The present study further investigated the impact of work stress on job performance based on the demographic variables of institutional ownership, gender, age, work experience and educational qualification.

Summary of literature review

The review of literature for this study was handled under three sub-headings: conceptual framework, theoretical framework and review of empirical studies. Under the conceptual framework, the key concepts discussed are: the concept of stress, concept of work stress, concept of administration, concept of academic administrators of universities and the concept of demographic variables. Stress is defined as the psychological and physical state that results when the resources of an individual are not sufficient to cope with the demands and pressures of a situation, such that the individual begins to feel tensed. Work stress is defined as a condition arising from the interaction of people and their jobs, characterized by changes in people which force them to deviate from normal functioning. Administration is defined as the authoritative art of getting things done through the coordination of efforts of others. Demographic variables are defined as varying characteristics or social statistics of an individual, sample group or population expressed in a statistical manner. The review showed that stress and stress at work has become an unavoidable characteristic of life and work, affecting individuals across nations, occupations or workplaces especially academic staff of universities.

Some of the stress inducing factors in universities include: lack of instructional resources, poor interpersonal relationships, inadequate salaries, stagnation in promotion, among others. Some of the stress- inducing factors among academic administrators of universities are: workload pressure arising from combination of teaching and administrative responsibilities, pressure emanating from research and publishing demands, among others. Some management strategies for work stress include: physiological strategies which include meditation and other relaxation techniques; cognitive and psychological strategies which include laughter, engaging in hobbies, interpersonal strategies such as allowing close relationships to occur among staff members and organizational strategies which include skills involving time management, communication skills, among others.

The study reviewed three theories that are related to the study. The General Adaptation Syndrome (GAS) Theory of stress, propounded by Hans Selye in 1936, which holds that the process of exposure to stress manifests in three distinctive stages which are the alarm reaction stage, the stage of resistance and the stage of exhaustion, and that individuals react to stress in the same way. The Person Environment (P E) Fit Theory of stress, propounded by French, Rodgers and Cobb in 1974 which states that stress is likely to occur when there is a mismatch between a person and the work environment and the Transactional Model of Stress, propounded by Lazarus and Folkman in 1984, which holds that the effects of a potential stressor on an individual depends on how the individual perceives the stressor and on his/her ability to cope with the stressor. This study is anchored on the Person Environment (P.E) Fit Theory of stress.

Empirical studies that are relevant to the present study were also reviewed. These include: studies on work stress factors, work stress and job performance, demographic variables and work stress and stress management strategies. Arising from the review, the studies that looked at work stress factors and stress management strategies, focused generally on university

lecturers, the present study focused specifically on academic administrators. The studies that looked at work stress and job performance did not do so against the backdrop of demographic variables, the present study did so. Thus, no study known to the researcher has been conducted on demographic variables and work stress among academic administrators of universities in South East, Nigeria. These therefore constitute the gaps which the study filled.

CHAPTER THREE

RESEARCH METHOD

This chapter presents the procedures that were employed in carrying out this study. They are presented under the following sub-headings: design of the study, area of the study, population of the study, sample and sampling technique, instrument for data collection, validation of the instrument, reliability of the instrument, method of data collection and method of data analysis.

Design of the Study

The study adopted the causal comparative or ex-post-facto research design. According to Nworgu (2015), this design seeks to establish cause-effect relationships in which the researcher has no control over the variables of interest and therefore cannot manipulate them. The researcher only attempts to link some already existing effects or observation to some variables as causative agents. The subjects are already assigned to or classified into various levels of the variables whose effects are being investigated and as such cannot be manipulated or altered. This design is appropriate for this study because the independent variables of the study which are demographic variables (institutional ownership, gender, age, work experience and educational qualification) have already been in existence in the lives of the respondents. Thus, the researcher cannot manipulate the variables but studies them in retrospect.

Area of the Study

The study covered universities in South East, Nigeria. South Eastern Nigeria is one of the six geopolitical zones in Nigeria. The zone is made up of five states namely: Abia, Anambra, Ebonyi, Enugu and Imo States. In the zone, there are ten public universities made up of five federal and five state-owned universities. They include: Abia State University, Uturu, Abia State; Chukwuemeka Odumegwu Ojukwu University, Uli, Anambra State; Ebonyi State University, Abakaliki, Ebonyi State; Enugu State University of Science and Technology, Enugu; Federal

University of Technology, Owerri, Imo State; Federal University, Ndufu-Alike, Ikwo, Ebonyi State; Imo State University, Owerri; Michael Okpara University of Agriculture, Umudike, Umuahia, Abia State; Nnamdi Azikiwe University, Awka, Anambra State and University of Nigeria, Nsukka, Enugu State.

In South East, Nigeria, there are five states, which constitute the major Igbo speaking areas in Nigeria and show a lot of features in common, including their cultural, political, educational and social orientations. The zone has a total population size of sixteen million, three hundred and eighty one thousand, seven hundred and twenty nine (16, 381, 729) which is approximately twelve percent (12%) of the entire population of the Federal Republic of Nigeria, judging from the 2006 National Population Census in Nigeria (National Population Commission, 2006). Climatically, the zone is situated at the tropical rain forest with thick vegetation. According to Agboeze and Nwankwo (2013), the zone is notable for two major climates, wet (March-October) and dry (November-February) seasons, with other climactic conditions subsumed under the major ones.

The choice of the study area is owing to the fact that the area, seen as being educationally advantaged, has an increasing demand for admissions and employment into the universities by the indigenes and even other others from other geopolitical zones. The result is that most faculties, departments and programmes have been over- populated in terms of admission without corresponding growth in facilities. These factors are capable of causing stress, which may adversely impact on the job performance of the university employees especially the academic administrators, thereby jeopardizing academic activities (teaching, learning and research). There is therefore the need to investigate work stress among the academic administrators of universities in South East, Nigeria.

Population of the Study

The population of the study consisted of all the ten federal and state universities in the South East geopolitical zone of Nigeria, and all the academic administrators consisting of deans of all the 103 faculties, heads of the entire 572 academic departments and 111 directors of institutes/centers. Thus, a total of 786 academic administrators made up the population. (Personnel Services Departments/Academic Planning Units of the various universities, 2013/2014 Academic Session). (See Appendix D, page 205)

Sample and Sampling Technique

All the 786 academic administrators of all the 10 public universities in South East Nigeria were used as sample for the study. This is in line with the assertion of Ali (2006), that when a population is small, all its members can be used as sample. Therefore, there was no sampling of the population.

Instrument for Data collection

The instrument for data collection was a researcher-developed questionnaire titled "Demographic Variables and Work Stress Questionnaire" (DVWSQ). It was divided into two sections A and B. Section A sought to elicit information from the respondents on their demographic data, which include: institutional ownership, gender, age, work experience, educational qualification. Section B was structured in three parts according to the research questions. Part one had 18 items and elicited information on the factors that induce work stress among academic administrators. Part two had 30 items and sought information on the impact of work stress on academic administrators' job performance. It was grouped into four clusters A, B, C and D. Cluster A had 9 items and sought information on health challenges, cluster B contained 8 items which dealt on job tension, cluster C contained 6 items and focused on low morale/low job satisfaction, while cluster D had 7 items and was concerned with poor work relationships.

Part three had 27 items and elicited information on the stress management strategies employed by academic administrators in dealing with work stress. It was also grouped into three clusters A, B and C. Cluster A had 8 items and sought information on the physiological strategies, cluster B contained 7 items that measured the cognitive/psychological strategies, while cluster C had 12 items that elicited information on the interpersonal/ organizational management strategies. All the items were structured on a four point rating scale of Strongly Agreed (SA) = 4 points, Agreed (A) = 3 points, Disagreed (D) = 2 points and Strongly Disagreed (SD) = 1 point (See Appendix B, page 194)

Validation of the instrument

The instrument was face- validated by three experts, two from Educational Administration and Planning, Department of Educational Foundations, and one from Measurement and Evaluation, Department of Science Education, all from Faculty of Education, University of Nigeria, Nsukka. The researcher gave the experts copies of the draft instrument to study and assess the suitability of the language, the adequacy and relevance of the items in addressing the research questions bearing in mind the purpose of the study. Some of the corrections made during the validation include: treating institutional ownership as a separate variable; rearranging the demographic information of the respondents starting with institutional ownership; separation of double-barreled/ambiguous items, among others. The researcher strictly adhered to the comments, corrections and suggestions of the experts in correcting the draft instrument. Based on their inputs, the final copy was made.

Reliability of the Instrument

To determine the internal consistency estimate of the instrument, a trial-testing of the instrument was done with 30 academic administrators from one federal and one state university in Rivers State, in South South, Nigeria, which is outside the study area. The reliability estimate

was computed using Cronbach alpha. Cronbach Alpha was considered appropriate because the items were not dichotomously scored. This is in line with the assertion of Ali (2006) that cronbach's alpha is mainly used for internal consistency reliability calculation when the test items are non-dichotomous and no response is deemed correct or wrong.

The reliability estimate for part 1 was at 0.85, part 11 (clusters, A, B, C and D) were 0.79, 0.78, 0.85 and 0.72 respectively, part 111 (clusters A, B and C) were 0.79, 0.79 and 0.72 respectively. The overall reliability estimate for part 11 and 111 were 0.90 and 0.83 respectively, while the overall reliability index of the instrument was 0.90 indicating that the instrument is reliable for the study. This is in with the assertion of Akuezuilo (2002), that when an instrument yields a reliability coefficient of 0.60 and above, the instrument is considered reliable for the study. (See Appendix C, page 198)

Method of Data Collection

The instrument was administered directly to the respondents by the researcher with the help of nine research assistants. The researcher adequately briefed the research assistants on the nature of the research, explaining each item as contained in the instrument and how to administer and retrieve the questionnaire from the respondents. The employment of the research assistants was to enable the researcher to effectively and timeously distribute and collect the questionnaire. Data was collected from the respondents using direct delivery method, so as to ensure maximum recovery of the questionnaire administered and to minimize instrument mortality. The researcher and her assistants used 12 weeks to administer and retrieve the questionnaire from the respondents. Few of the respondents filled and returned the questionnaire on the spot, some filled within 24 to 72 hours, some within one week, some within two weeks to one month, some out- rightly said they were too busy and did not fill at all, while some collected the questionnaire to fill, but travelled thereafter and the instruments could not be retrieved within the period of the

administration and collection of the instrument. Consequently, out of the 786 questionnaire administered, only 745 was retrieved, representing 94.8 percent (Approximately 95 %). This was used for the statistical analysis.

Method of Data Analysis

The data collected was analyzed using Mean and standard deviation in answering the research questions. Analysis of Variance (ANOVA) was used to test hypothesis 3, while t-test statistics was used to test hypotheses 1, 2, 4 and 5 respectively. The decision benchmark was 2.50. Items that scored 2.50 and above were accepted, while those that scored below 2.50 were rejected. All the hypotheses were tested at 0.05 level of significance

CHAPTER FOUR

RESULTS

This chapter presents the results of this study according to the data analysis. The results are presented in tables according to the research questions and hypotheses. The major findings of the study are also presented in this chapter.

Research Question 1: What are the factors that induce work stress among academic administrators of federal and state universities in South East Nigeria?

Table 1: Mean ratings of academic administrators of federal and state universities in South East Nigeria on the factors that induce work stress.

S/N	Item Statements	Federal N = 397			State N = 348		
		$\bar{X}_1$	SD ₁	Dec ₁	$\bar{X}_2$	SD ₂	DEC ₂
	The following factors usually induce me to work stress						
1	Irregular receipt of salaries.	2.83	0.81	A	2.60	0.75	A
2	Lack of adequate resources needed to carry out my job.	2.86	0.65	A	2.91	0.73	A
3	Combining academic responsibilities with administrative duties.	2.81	0.57	A	2.56	0.80	A
4	Pressure of meeting up with the semester calendar	2.84	0.71	A	2.91	0.80	A
5	Making decisions that affect the lives of my staff and students.	2.76	0.74	A	2.99	0.77	A
6	Dealing with students's disciplinary problems	2.83	0.65	A	2.79	0.71	A
7	Supervising the tasks of staff members.	2.73	0.64	A	2.50	0.70	A
8	Demand of official work on my private time	3.02	0.61	A	3.00	0.74	A
9	Using my official time for private interests.	2.56	0.76	A	3.05	0.80	A
10	Pressure to complete reports, memos and other communications.	2.87	0.63	A	2.87	0.73	A
11	Having my work frequently interrupted by staff members who want to be attended to.	2.83	0.70	A	2.63	0.73	A
12	Attending meetings that take up too much time	2.68	0.63	A	2.60	0.70	A
13	Stagnation in promotion.	2.85	0.57	A	2.56	0.73	A
14	Pressure of having the required publications for promotion.	2.72	0.60	A	2.60	0.75	A
15	Lack of funds to conduct research in my area of specialization.	2.76	0.53	A	2.65	0.72	A
16	Pressure to attend workshops, conferences and seminars.	2.71	0.75	A	3.01	0.83	A
17	Resolving differences among staff members.	2.56	0.66	A	2.72	0.78	A
18	Resolving differences among students.	2.76	0.67	A	2.72	0.73	A
	Cluster Mean	2.78	0.32	A	2.76	0.42	A

Key: N = Number of respondents, $\bar{X}_1$ = mean for federal, SD₁ = Standard Deviation for federal, DEC₁ = Decision for federal, $\bar{X}_2$ = mean for states, SD₂ = Standard Deviation for states, DEC₂ = Decision for states.

Data on Table 1 show the mean scores and standard deviations of the responses on the factors that induce work stress among academic administrators of federal and state universities in South East Nigeria. The respondents from both federal and state universities agreed that all the

18 items are factors that induce work stress among academic administrators. This is because the mean ratings for these items are above the 2.50 set as benchmark. This means that the factors that induce work stress include; irregular receipt of salaries, with lack of adequate resources needed to carry out jobs, combining academic responsibilities with administrative duties, pressure of meeting up with the semester calendar, making decisions that affect the lives of staff and students, dealing with students' disciplinary problems, supervising the tasks of staff members, demand of official work on private time, using official time for private interests, pressure to complete reports, memos and other communication, having work frequently interrupted by staff members who want to be attended to, attending meeting that take up too much time, stagnation in promotion, pressure of having the required publication for promotion, among others. The cluster mean of 2.78 with a standard deviation of 0.32 (for federal staff) and 2.76 with standard deviation of 0.42 (for state staff) showed that the respondents agree that the listed items on Table 1 are factors that induce work stress among academic administrators of federal and state universities in South East Nigeria.

Research Question 2: What is the impact of work stress on academic administrators' job performance in universities in South East Nigeria based on institutional ownership?

Table 2: Mean ratings of academic administrators of universities in South East Nigeria on the impact of work stress on job performance based on institutional ownership.

S/N	Item Statements	Federal N = 397			State N = 348		
		$\bar{X}_1$	SD ₁	DEC ₁	$\bar{X}_2$	SD ₂	DEC ₂
	When I am under stress at work:						
	Health challenges						
19	I experience burnout which reduces my efficiency at work.	2.71	0.84	A	2.72	0.72	A
20	I usually suffer loss of memory which makes me get involved in workplace accidents.	3.23	0.88	A	2.89	0.76	A
21	I am prone to heart diseases such as high-blood pressure which reduces my ability to do my job.	3.08	0.77	A	2.96	0.76	A
22	I often suffer headaches and muscle pains which hinder my job performance.	2.81	0.80	A	2.68	0.72	A
23	I suffer gastro-intestinal diseases such as diarrhea which makes me achieve less in my job performance.	2.88	0.88	A	2.62	0.63	A
24	I experience eating disorders such as loss of appetite which lowers my strength for work.	3.17	0.86	A	2.79	0.73	A
25	I experience sleep difficulties such as insomnia which makes me unable to respond quickly to demands placed on me.	2.89	0.78	A	2.68	0.68	A
26	I resort to alcoholic beverages leading to loss of focus in the performance of my job.	2.85	0.83	A	2.76	0.68	A
27	I usually incur high costs of health care which dampens my zest for performance in my job.	3.24	0.79	A	3.22	0.75	A
	Job tension						
28	I feel tensed which reduces my ability to do my work.	2.75	0.78	A	2.79	0.71	A
29	I experience difficulties in concentration leading to aggressiveness to staff and students.	2.56	0.70	A	2.63	0.66	A
30	I find it difficult to communicate effectively with my staff leading to serious misunderstandings.	2.92	0.83	A	2.91	0.78	A
31	I am unable to complete tasks on time due to frequent mood swings.	3.42	0.56	A	2.66	0.70	A
32	I find it difficult to make decisions that affect the lives of my staff and students.	2.49	0.77	D	2.67	0.63	A
33	I am often late to important appointments that have to do with my job.	2.33	0.72	D	2.63	0.66	A
34	I often make careless mistakes in the course of performing my job.	2.36	0.73	D	2.68	0.67	A
35	I often forget important things which render me incapable of meeting up with my work schedules.	2.83	0.55	A	2.77	0.73	A
	Low morale/low job satisfaction						
36	I usually experience low morale which reduces my ability to perform my job.	2.48	0.50	D	2.28	0.45	A

37	I experience loss of interest in my job which reduces my motivation for task accomplishments.	2.59	0.49	A	2.68	0.55	A
38	I am often absent from office and classes due to loss of interest in my job.	2.30	0.50	D	2.27	0.44	D
39	I am unable to perform my supervisory role on my staff due to low morale in my job.	2.58	0.49	A	2.64	0.56	A
40	I often desire to quit my job due to feelings of dissatisfaction.	2.42	0.63	D	2.14	0.67	D
41	Low morale in my job negatively affects my staff members in their job performance.	2.59	0.52	A	2.69	0.53	A
Poor work relationships							
42	I often shout and yell at my staff which hampers their confidence in their job performance.	2.92	0.26	A	2.33	0.82	D
43	I find it difficult to delegate responsibilities to my subordinates which increases my workload.	2.82	0.39	A	2.24	0.81	D
44	I often withdraw to myself leading to loss of sense of responsibility in my job.	2.88	0.33	A	2.25	0.84	D
45	I am predisposed to blaming others which erodes staff morale for productivity.	2.30	0.46	D	2.27	0.65	D
46	I find it difficult to listen to my subordinates which obstruct team work.	2.76	0.42	A	2.25	0.80	D
47	I find it difficult to express appreciation to my staff which lowers their commitment to their jobs.	2.57	0.50	A	2.20	0.76	D
48	I am often intolerant of the mistakes of my staff which hinders their creativity at work.	2.53	0.50	A	2.18	0.70	D
Cluster Mean		2.95	0.22	A	2.74	0.25	A

Data on Table 2 show the mean and standard deviations of the responses on the impact of work stress on academic administrators' job performance in universities in south east Nigeria based on institutional ownership. The respondents from federal universities agreed that items 19, 31, 35, 37, 39, 41- 44 and 46 - 48 with mean ratings above the 2.50 benchmark are impact of work stress on academic administrators' job performance in universities in South East Nigeria, while respondents from state universities agreed that items 19-37, 39 and 41 are impact of work stress on academic administrators' job performance in universities in South East Nigeria. These items also have mean ratings above 2.50. Also, the respondents from federal universities disagreed on items 32, 34, 36, 40 and 45, while their counterparts from state universities disagreed on items 38, 40, 42-48. However, the cluster mean scores of 2.95 with corresponding

standard deviation of 0.22 (for respondents from federal universities) and 2.74 with corresponding standard deviation of 0.25 (for respondents from state universities) showed that the respondents agree that majority of the items listed on Table 2 are impact of work stress on academic administrators' job performance in federal and state universities in South East Nigeria.

Hypothesis One: There is no significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on institutional ownership.

Table 3: t-test analysis of the significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on institutional ownership

S/N	Items	Federal (N=397) $\bar{X}$	SD	State (N=348) $\bar{X}$	SD	t-cal	df	Sig	Dec
	When I am under stress at work:								
	Health challenges								
19	I experience burnout which reduces my efficiency at work.	2.71	0.84	2.72	0.72	-0.16	743	0.87	NS
20	I usually suffer loss of memory which makes me get involved in workplace accidents.	3.23	0.88	2.89	0.76	5.501	743	0.00	S
21	I am prone to heart diseases such as high-blood pressure which reduces my ability to do my job.	3.08	0.77	2.96	0.76	1.98	743	0.04	S
22	I often suffer headaches and muscle pains which hinder my job performance.	2.81	0.80	2.68	0.72	2.34	743	0.02	S
23	I suffer gastro-intestinal diseases such as diarrhea which makes me achieve less in my job performance.	2.88	0.88	2.62	0.63	4.51	743	0.00	S
24	I experience eating disorders such as loss of appetite which lowers my strength for work.	3.17	0.86	2.79	0.73	6.44	743	0.00	S

25	I experience sleep difficulties such as insomnia which makes me unable to respond quickly to demands placed on me.	2.89	0.78	2.68	0.68	3.79	743	0.00	S
26	I resort to alcoholic beverages leading to loss of focus in the performance of my job.	2.85	0.83	2.76	0.68	1.59	743	0.11	NS
27	I usually incur high costs of health care which dampens my zest for performance in my job.	3.24	0.79	3.22	0.75	0.49	743	0.62	NS
	Job tension								
28	I feel tensed which reduces my ability to do my work.	2.75	0.78	2.79	0.71	-0.72	743	0.47	NS
29	I experience difficulties in concentration leading to aggressiveness to staff and students.	2.56	0.70	2.63	0.66	-1.34	743	0.18	NS
30	I find it difficult to communicate effectively with my staff leading to serious misunderstandings.	2.92	0.83	2.91	0.78	0.12	743	0.90	NS
31	I am unable to complete tasks on time due to frequent mood swings.	3.42	0.56	2.66	0.70	16.30	743	0.00	S
32	I find it difficult to make decisions that affect the lives of my staff and students.	2.49	0.77	2.67	0.63	-1.30	743	0.00	S
33	I am often late to important appointments that have to do with my job.	2.33	0.72	2.63	0.66	-5.98	743	0.00	S
34	I often make careless mistakes in the course of performing my job,	2.36	0.73	2.68	0.67	-6.37	743	0.00	S
35	I often forget important things which render me incapable of meeting up with my work schedules.	2.83	0.55	2.77	0.73	1.32	743	0.18	NS
	Low morale/low job satisfaction								
36	I usually experience low morale which reduces my ability to perform my job.	2.48	0.50	2.28	0.45	5.72	743	0.00	S
37	I experience loss of interest in my job which reduces my	2.59	0.49	2.68	0.55	-2.17	743	0.03	S

	motivation for task accomplishments.								
38	I am often absent from office and classes due to loss of interest in my job.	2.30	0.50	2.27	0.44	6.44	743	0.00	S
39	I am unable to perform my supervisory role on my staff due to low morale in my job.	2.58	0.49	2.64	0.56	-1.74	743	0.08	NS
40	I often desire to quit my job due to feelings of dissatisfaction.	2.42	0.63	2.14	0.67	-6.84	743	0.00	S
41	Low morale in my job negatively affects my staff members in their job performance.	2.59	0.52	2.69	0.53	-2.65	743	0.00	S
	Poor work relationships								
42	I often shout and yell at my staff which hampers their confidence in their job performance.	2.92	0.26	2.33	0.82	13.61	743	0.00	S
43	I find it difficult to delegate responsibilities to my subordinates which increases my workload.	2.82	0.39	2.24	0.81	12.52	743	0.00	S
44	I often withdraw to myself leading to loss of sense of responsibility in my job.	2.88	0.33	2.25	0.84	13.52	743	0.00	S
45	I am predisposed to blaming others which erodes staff morale for productivity.	2.30	0.46	2.27	0.65	0.90	743	0.36	NS
46	I find it difficult to listen to my subordinates which obstructs team work.	2.76	0.42	2.25	0.80	11.00	743	0.00	S
47	I find it difficult to express appreciation to my staff which lowers their commitment to their jobs.	2.57	0.50	2.20	0.76	7.98	743	0.00	S
48	I am often intolerant of the mistakes of my staff which hinders their creativity at work.	2.53	0.50	2.18	0.70	7.89	743	0.00	S
	Cluster t	2.95	0.22	2.74	0.25	8.42	743	0.00	S

Data on Table 3 show the t-test analysis of the significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on institutional ownership. Result showed that there is significant difference on items 20-25, 31-34, 36-38, 40-44 and 46-48. This is because their significant values are less than 0.05 level of significance. However, there is no significant difference on items 19, 26-30, 35, 39 and 45 because their significant values are greater than 0.05. The cluster t-value of 8.42 with a degree of freedom of 743 and a significant value of 0.00 was obtained. Since the significant value of 0.00 is less than 0.05 set as level of significance, it means that the null hypothesis which stated that there is no significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on institutional ownership is rejected. Inference drawn therefore is that there is a significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on institutional ownership, with federal university having a higher mean rating.

Research Question 3: What is the impact of work stress on academic administrators' job performance in universities in South East Nigeria based on gender?

Table 4: Mean ratings of academic administrators of universities in South East Nigeria on the impact of work stress on job performances based on gender

S/N	Item Statements	Male N = 493			Female N = 252		
		$\bar{X}_1$	SD ₁	DEC ₁	$\bar{X}_2$	SD ₂	DEC ₂
	When I am under stress at work:						
	Health challenges						
19	I experience burnout which reduces my efficiency at work.	2.70	0.78	A	2.75	0.80	A
20	I usually suffer loss of memory which makes me get involved in workplace accidents.	3.05	0.84	A	3.10	0.83	A
21	I am prone to heart diseases such as high-blood pressure which reduces my ability to do my job.	3.04	0.77	A	2.99	0.77	A
22	I often suffer headaches and muscle pains which hinder my job performance	2.76	0.77	A	2.74	0.77	A
23	I suffer gastro-intestinal diseases such as diarrhea which makes me achieve less in my job performance.	2.75	0.79	A	2.78	0.78	A
24	I experience eating disorders such as loss of appetite which lowers my strength for work.	2.99	0.82	A	2.98	0.83	A
25	I experience sleep difficulties such as insomnia which makes me unable to respond quickly to demands placed on me.	2.79	0.74	A	2.82	0.76	A
26	I resort to alcoholic beverages leading to loss of focus in the performance of my job.	2.81	0.76	A	2.80	0.78	A
27	I usually incur high costs of health care which dampens my zest for performance in my job.	3.22	0.76	A	3.25	0.78	A
	Job tension						
28	I feel tensed which reduces my ability to do my work.	2.75	0.74	A	2.80	0.76	A
29	I experience difficulties in concentration leading to aggressiveness to staff and students.	2.58	0.68	A	2.61	0.69	A
30	I find it difficult to communicate effectively with my staff leading to serious misunderstandings.	2.90	0.81	A	2.96	0.79	A
31	I am unable to complete tasks on time due to frequent mood swings.	3.04	0.73	A	3.11	0.74	A
32	I find it difficult to make decisions that affect the lives of my staff and students.	2.61	0.71	A	2.50	0.72	A
33	I am often late to important appointments that have to do with my job.	2.50	0.69	A	2.41	0.73	D
34	I often make careless mistakes in the course of performing my job.	2.54	0.71	A	2.45	0.73	D
35	I often forget important things which render me incapable of meeting up with my work schedules.	2.80	0.64	A	2.80	0.66	A
	Low morale/low job satisfaction						
36	I usually experience low morale which reduces my ability to perform my job.	2.36	0.48	D	2.43	0.50	D

37	I experience loss of interest in my job which reduces my motivation for task accomplishments.	2.63	0.51	A	2.63	0.55	A
38	I am often absent from office and classes due to loss of interest in my job.	2.38	0.48	D	2.42	0.49	D
39	I am unable to perform my supervisory role on my staff due to low morale in my job.	2.60	0.52	A	2.63	0.53	A
40	I often desire to quit my job due to feelings of dissatisfaction.	2.44	0.68	D	2.42	0.64	D
41	Low morale in my job negatively affects my staff members in their job performance.	2.63	0.54	A	2.65	0.51	A
Poor work relationships							
42	I often shout and yell at my staff which hampers their confidence in their job performance.	2.62	0.67	A	2.69	0.65	A
43	I find it difficult to delegate responsibilities to my subordinates which increases my workload.	2.53	0.69	A	2.58	0.67	A
44	I often withdraw to myself leading to loss of sense of responsibility in my job.	2.58	0.70	A	2.61	0.68	A
45	I am predisposed to blaming others which erodes staff morale for productivity.	2.27	0.55	D	2.31	0.58	D
46	I find it difficult to listen to my subordinate which obstructs team work.	2.51	0.68	A	2.56	0.68	A
47	I find it difficult to express appreciation to my staff which lowers their commitment to their jobs.	2.38	0.66	D	2.42	0.66	D
48	I am often intolerant of the mistakes of my staff which hinders their creativity at work.	2.37	0.62	D	2.37	0.64	D
Cluster Mean		2.67	0.24	A	2.69	0.24	A

Data on Table 4 show the mean and standard deviations of responses on the impact of work stress on academic administrators' job performance in universities in South East Nigeria based on gender. The result of the study showed that the male respondents agreed on items 19 ÷ 35, 37, 39, 41- 44 and 46 as being the impact of work stress on academic administrators' job performance. The female respondents on the other hand agreed on items 19 ÷ 32, 35, 37, 39, 41- 44 and 46 as impact of work stress on academic administrators' job performance. For both the male and female respondents, the mean ratings were above the 2.50 benchmark for accepting an item. Also, the male respondents disagreed on items 36, 38, 40, 45, 47 and 48, while the female respondents disagreed on items 33, 34, 36, 38, 40, 45, 47 and 48, with both male and female respondents having mean ratings of less than 2.50 in the items. However, the cluster mean scores

of 2.67 with corresponding standard deviation of 0.24 (for male respondents) and 2.69 with a standard deviation of 0.24 (for female respondents) showed that the respondents agree that majority of the items listed on Table 4 are impact of work stress on job performance of male and female academic administrators of universities in South East, Nigeria.

Hypothesis Two: There is no significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on gender.

Table 5: t-test analysis of the significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on gender

S/N	Items	Male (N=493)		Female =252)		t-cal	df	Sig	Dec
		$\bar{X}$	SD	$\bar{X}$	SD				
	When I am under stress at work:								
	Health challenges								
19	I experience burnout which reduces my efficiency at work.	2.70	0.78	2.75	0.80	-0.86	743	0.38	NS
20	I usually suffer loss of memory which makes me get involved in workplace accidents.	3.05	0.84	3.10	0.83	-0.77	743	0.44	NS
21	I am prone to heart diseases such as high-blood pressure which reduces my ability to do my job.	3.04	0.77	2.99	0.77	0.91	743	0.36	NS
22	I often suffer headaches and muscle pains which hinder my job performance.	2.76	0.77	2.74	0.77	0.26	743	0.79	NS
23	I suffer gastro-intestinal diseases such as diarrhea which makes me achieve less in my job performance.	2.75	0.79	2.78	0.78	-0.43	743	0.66	NS
24	I experience eating disorders such as loss of appetite which lowers my strength for work	2.99	0.82	2.98	0.83	0.09	743	0.93	NS
25	I experience sleep difficulties such as insomnia which makes me unable to	2.79	0.74	2.82	0.76	-0.44	743	0.66	NS

	respond quickly to demands placed on me.								
26	I resort to alcoholic beverages leading to loss of focus in the performance of my job	2.81	0.76	2.80	0.78	0.11	743	0.91	NS
27	I usually incur high costs of health care which dampens my zest for performance in my job	3.22	0.76	3.25	0.78	-0.36	743	0.72	NS
	Job tension								
28	I feel tensed which reduces my ability to do my work	2.75	0.74	2.80	0.76	-0.92	743	0.35	NS
29	I experience difficulties in concentration leading to aggressiveness to staff and students.	2.58	0.68	2.61	0.69	-0.62	743	0.53	NS
30	I find it difficult to communicate effectively with my staff leading to serious misunderstandings.	2.90	0.81	2.96	0.79	-1.01	743	0.31	NS
31	I am unable to complete tasks on time due to frequent mood swings.	3.04	0.73	3.11	0.74	-1.31	743	0.19	NS
32	I find it difficult to make decisions that affect the lives of my staff and students.	2.61	0.71	2.50	0.72	2.02	743	0.03	S
33	I am often late to important appointments that have to do with my job.	2.50	0.69	2.41	0.73	1.79	743	0.07	NS
34	I often make careless mistakes in the course of performing my job.	2.54	0.71	2.45	0.73	1.70	743	0.08	NS
35	I often forget important things which render me incapable of meeting up with my work schedules.	2.80	0.64	2.80	0.66	0.09	743	0.93	NS
	Low morale/low job satisfaction								
36	I usually experience low morale which reduces my ability to perform my job.	2.36	0.48	2.43	0.50	-1.61	743	0.11	NS
37	I experience loss of interest in my job which reduces my motivation for task accomplishments.	2.63	0.51	2.63	0.55	-0.01	743	0.99	NS

38	I am often absent from office and classes due to loss of interest in my job.	2.38	0.48	2.42	0.49	-1.19	743	0.24	NS
39	I am unable to perform my supervisory role on my staff due to low morale in my job	2.60	0.52	2.63	0.53	-0.85	743	0.39	NS
40	I often desire to quit my job due to feelings of dissatisfaction.	2.44	0.68	2.42	0.64	0.41	743	0.67	NS
41	Low morale in my job negatively affects my staff members in their job performance.	2.63	0.54	2.65	0.51	-0.59	743	0.55	NS
Poor work relationships									
42	I often shout and yell at my staff which hampers their confidence in their job performance.	2.62	0.67	2.69	0.65	-1.39	743	0.16	NS
43	I find it difficult to delegate responsibilities to my subordinates which increases my workload.	2.53	0.69	2.58	0.67	-0.93	743	0.35	NS
44	I often withdraw to myself leading to loss of sense of responsibility in my job.	2.58	0.70	2.61	0.68	-0.61	743	0.54	NS
45	I am predisposed to blaming others which erodes staff morale for productivity.	2.27	0.55	2.31	0.58	-0.84	743	0.39	NS
46	I find it difficult to listen to my subordinates which obstructs team work.	2.51	0.68	2.56	0.68	-1.03	743	0.30	NS
47	I find it difficult to express appreciation to my staff which lowers their commitment to their jobs.	2.38	0.66	2.42	0.66	-0.75	743	0.45	NS
48	I am often intolerant of the mistakes of my staff which hinders their creativity at work.	2.37	0.62	2.37	0.64	0.01	743	0.99	NS
Cluster t		2.67	0.24	2.69	0.24	-0.76	743	0.44	NS

Data on Table 5 show the t-test analysis of the significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job

performance based on gender. Result showed that there is no significant difference on all the items except item 32. This is because their significant values are greater than 0.05 level of significance. A cluster t-value of -0.76 at 743 degree of freedom and a significant value of 0.44 was obtained. Since the significant value of 0.44 is greater than 0.05 set as level of significance, it means that the null hypothesis which stated that there is no significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on gender is accepted. Inference drawn therefore is that there is no significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on gender.

Research Question 4: What is the impact of work stress on academic administrators' job performance in universities in South East Nigeria based on age?

Table 6: Mean ratings of academic administrators of universities in South East Nigeria on the impact of work stress on job performances based on age

		30 ï 40 years N = 61			41 ï 50 years N = 232			51 yrs and above N = 452		
S/N	Item Statements	$\bar{X}_1$	SD ₁	Dec	$\bar{X}_2$	SD ₂	Dec	$\bar{X}_3$	SD ₃	Dec
When I am under stress at work:										
Health challenges										
19	I experience burnout which reduces my efficiency at work.	2.80	0.77	A	2.78	0.78	A	2.67	0.79	A
20	I usually suffer loss of memory which makes me get involved in workplace accidents.	3.18	0.80	A	3.11	0.83	A	3.04	0.85	A
21	I am prone to heart diseases such as high-blood pressure which reduces my ability to do my job.	3.01	0.78	A	2.97	0.76	A	3.05	0.77	A
22	I often suffer headaches and muscle pains which hinder my job performance.	2.52	0.72	A	2.79	0.76	A	2.76	0.77	A
23	I suffer gastro-intestinal diseases such as diarrhea which makes me achieve less in my job performance.	2.55	0.71	A	2.73	0.75	A	2.80	0.80	A

24	I experience eating disorders such as loss of appetite which lowers my strength for work.	2.95	0.78	A	3.01	0.77	A	2.98	0.86	A
25	I experience sleep difficulties such as insomnia which makes me unable to respond quickly to demands placed on me.	2.60	0.71	A	2.84	0.76	A	2.80	0.74	A
26	I resort to alcoholic beverages leading to loss of focus in the performance of my job.	2.68	0.78	A	2.78	0.71	A	2.83	0.79	A
27	I usually incur high costs of health care which dampens my zest for performance in my job.	3.26	0.77	A	3.26	0.75	A	3.21	0.78	A
Job tension										
28	I feel tensed which reduces my ability to do my work.	2.70	0.76	A	2.85	0.75	A	2.73	0.74	A
29	I experience difficulties in concentration leading to aggressiveness to staff and students	2.73	0.68	A	2.65	0.67	A	2.54	0.69	A
30	I find it difficult to communicate effectively with my staff leading to serious misunderstandings.	2.80	0.79	A	2.98	0.79	A	2.90	0.81	A
31	I am unable to complete tasks on time due to frequent mood swings.	3.00	0.70	A	3.11	0.75	A	3.05	0.73	A
32	I find it difficult to make decisions that affect the lives of my staff and students.	2.44	0.74	D	2.51	0.76	A	2.63	0.69	A
33	I am often late to important appointments that have to do with my job.	2.29	0.76	D	2.41	0.76	D	2.52	0.67	A
34	I often make careless mistakes in the course of performing my job.	2.31	0.78	D	2.42	0.75	D	2.58	0.68	A
35	I often forget important things which render me incapable of meeting up with my work schedules.	2.78	0.58	A	2.86	0.64	A	2.78	0.65	A
Low morale/low job satisfaction										
36	I usually experience low morale which reduces my ability to perform my job.	2.34	0.47	D	2.41	0.50	D	2.38	0.48	D
37	I experience loss of interest in my job which reduces my motivation for task accomplishments.	2.59	0.52	A	2.66	0.52	A	2.62	0.52	A
38	I am often absent from office and classes due to loss of interest in my job.	2.44	0.50	D	2.38	0.48	D	2.39	0.48	D

39	I am unable to perform my supervisory role on my staff due to low morale in my job.	2.59	0.52	A	2.63	0.52	A	2.60	0.53	A
40	I often desire to quit my job due to feelings of dissatisfaction.	2.31	0.73	D	2.36	0.65	D	2.38	0.67	D
41	Low morale in my job negatively affects my staff members in their job performance.	2.55	0.59	A	2.65	0.51	A	2.64	0.53	A
Poor work relationships										
42	I often shout and yell at my staff which hampers their confidence in their job performance.	2.67	0.65	A	2.63	0.65	A	2.65	0.67	A
43	I find it difficult to delegate responsibilities to my subordinates which increases my workload.	2.59	0.69	A	2.57	0.67	A	2.53	0.69	A
44	I often withdraw to myself leading to loss of sense of responsibility in my job.	2.67	0.67	A	2.61	0.68	A	2.56	0.70	A
45	I am predisposed to blaming others which erodes staff morale for productivity.	2.36	0.57	D	2.28	0.56	D	2.28	0.55	D
46	I find it difficult to listen to my subordinate which obstructs team work.	2.60	0.66	A	2.53	0.67	A	2.51	0.69	A
47	I find it difficult to express appreciation to my staff which lowers their commitment to their jobs.	2.39	0.63	D	2.42	0.64	D	2.38	0.67	D
48	I am often intolerant of the mistakes of my staff which hinders their creativity at work.	2.37	0.58	D	2.40	0.61	D	2.35	0.64	D
Cluster Mean		2.63	0.23	A	2.69	0.24	A	2.67	0.24	A

Data on Table 6 show the mean and standard deviations of responses on the impact of work stress on academic administrators' job performance in universities in South East Nigeria based on age of the respondents. Result showed that respondents within the ages of 30 -40 agreed on items 19 ï 31, 35, 37, 39, 41- 44 and 46 with mean ratings above the 2.50 benchmark. Respondents within the age range of 41 ï 50 agreed on items 19 ï 32, 35, 37, 39, 41 ï 44 and 46, with mean rating above the 2.50 benchmark for each of the items. The respondents within the ages of 51 and above agreed on items 19 ï 35, 37, 39, 41 ï 44 and 46, with mean ratings of 2.50

and above for each of the items. Also, all the respondents disagreed on items 36, 38, 40, 45, 47 and 48 as being the impact of work stress on academic administrators' job performance in universities in South East Nigeria with mean ratings below 2.50 for each of the items. Items 33 and 34 were disagreed on by respondents within the age groups of 30-40 and 41-50 years. However, the cluster means and standard deviations of 2.63 and 0.023, 2.69 and 0.24, 2.67 and 0.24 for age groups of 30-40, 41-50, and 51 years and above, respectively showed that the respondents agreed that majority of the items on Table 6 are impact of work stress on academic administrators' job performance in universities in South East Nigeria.

Hypothesis Three: There is no significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on age.

Table 7: ANOVA of the significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on age

	Sum of Squares	Df	Mean Square	F	Sig.
Between Groups	0.132	2	0.07	1.09	0.34
Within Groups	44.921	743	0.06		
Total	45.053	745			

Data on Table 7 show the ANOVA result of the significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on age. Result showed that an f-ratio of 1.09 with a significant value of 0.34 was obtained. Since the significant value of 0.34 is greater than 0.05 set as level of significance, it means that the null hypothesis which stated that there is no significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on age is accepted. Inference drawn therefore is that there is no

significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on age.

Research Question 5: What is the impact of work stress on academic administrators' job performance in universities in South East Nigeria based on work experience?

Table 8: Mean ratings of academic administrators of universities in South East Nigeria on the impact of work stress on job performance based on work experience

		Below 10 years N = 138			10 yrs and above N = 607		
S/N	Item Statements	$\bar{X}_1$	SD ₁	DEC ₁	$\bar{X}_2$	SD ₂	DEC ₂
When I am under stress at work:							
Health challenges							
19	I experience burnout which reduces my efficiency at work.	2.78	0.78	A	2.70	0.79	A
20	I usually suffer loss of memory which makes me get involved in workplace accidents.	3.13	0.80	A	3.06	0.85	A
21	I am prone to heart diseases such as high-blood pressure which reduces my ability to do my job.	3.00	0.75	A	3.03	0.77	A
22	I often suffer headaches and muscle pains which hinder my job performance.	2.68	0.76	A	2.76	0.77	A
23	I suffer gastro-intestinal diseases such as diarrhea which makes me achieve less in my job performance.	2.64	0.74	A	2.79	0.79	A
24	I experience eating disorders such as loss of appetite which lowers my strength for work.	2.95	0.79	A	3.00	0.83	A
25	I experience sleep difficulties such as insomnia which makes me unable to respond quickly to demands placed on me.	2.78	0.75	A	2.80	0.75	A
26	I resort to alcoholic beverages leading to loss of focus in the performance of my job.	2.75	0.76	A	2.82	0.76	A
27	I usually incur high costs of health care which dampens my zest for performance in my job.	3.22	0.73	A	3.24	0.77	A
Job tension							
28	I feel tensed which reduces my ability to do my work.	2.83	0.75	A	2.75	0.75	A
29	I experience difficulties in concentration leading to aggressiveness to staff and students.	2.70	0.68	A	2.57	0.69	A
30	I find it difficult to communicate effectively with my staff leading to serious misunderstandings.	2.90	0.79	A	2.92	0.81	A
31	I am unable to complete tasks on time due to frequent mood swings.	3.05	0.74	A	3.07	0.73	A

32	I find it difficult to make decisions that affect the lives of my staff and students.	2.44	0.75	D	2.61	0.70	A
33	I am often late to important appointments that have to do with my job.	2.35	0.76	D	2.50	0.69	A
34	I often make careless mistakes in the course of performing my job.	2.40	0.80	D	2.53	0.69	A
35	I often forget important things which render me incapable of meeting up with my work schedules.	2.81	0.64	A	2.80	0.64	A
Low morale/low job satisfaction							
36	I usually experience low morale which reduces my ability to perform my job.	2.32	0.47	D	2.40	0.49	D
37	I experience loss of interest in my job which reduces my motivation for task accomplishments.	2.62	0.56	A	2.63	0.51	A
38	I am often absent from office and classes due to loss of interest in my job.	2.43	0.49	D	2.38	0.48	D
39	I am unable to perform my supervisory role on my staff due to low morale in my job.	2.56	0.52	A	2.62	0.53	A
40	I often desire to quit my job due to feelings of dissatisfaction.	2.43	0.69	D	2.38	0.66	D
41	Low morale in my job negatively affects my staff members in their job performance.	2.57	0.56	A	2.65	0.52	A
Poor work relationships							
42	I often shout and yell at my staff which hampers their confidence in their job performance.	2.59	0.69	A	2.66	0.66	A
43	I find it difficult to delegate responsibilities to my subordinates which increases my workload.	2.49	0.72	D	2.56	0.68	A
44	I often withdraw to myself leading to loss of sense of responsibility in my job.	2.56	0.72	A	2.59	0.69	A
45	I am predisposed to blaming others which erodes staff morale for productivity.	2.29	0.57	D	2.29	0.55	D
46	I find it difficult to listen to my subordinates which obstruct team work.	2.49	0.69	D	2.53	0.68	A
47	I find it difficult to express appreciation to my staff which lowers their commitment to their jobs.	2.31	0.66	D	2.42	0.66	D
48	I am often intolerant of the mistakes of my staff which hinders their creativity at work.	2.31	0.61	D	2.38	0.63	D
Cluster Mean		2.67	0.24	A	2.69	0.24	A

Data presented on Table 8 show the mean and standard deviations of responses on the impact of work stress on academic administrators' job performance in universities in South East Nigeria based on work experience. The result of the study showed that the respondents with below 10 years experience agreed on items 19 -31, 35, 37, 39, 41-42 and 44, as the impact of

work stress on academic administrators' job performance in universities in South East Nigeria. Also, respondents with experience of 10 years and above agreed on items 19, 35, 37, 39, 41, 44, and 46 with mean ratings above the 2.50 benchmark, as the impact of work stress on academic administrators' job performance in universities in South East Nigeria. All the respondents disagreed on items 36, 38, 40, 45, 47 and 48 as the impact of work stress on academic administrators' job performance with mean ratings below 2.50. Those whose experience is below 10 years disagreed on items 32, 33, 34, 43 and 46 as the impact of work stress on academic administrators' job performance, with mean ratings below the 2.50 benchmark. However, the cluster mean of 2.67 with a standard deviation of 0.24 (for respondents with below 10 years experience) and 2.69 with a standard deviation of 0.24 (for respondents with 10 years experience and above) respectively, showed that majority of the items listed on Table 8 are impact of work stress on academic administrators' job performance in universities in South East Nigeria.

Hypothesis Four: There is no significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on work experience

Table 9: t-test analysis of the significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on work experience

S/N	Items	Below 10 years N = 138		10 yrs and above N = 607		t-cal	Df	Sig	Dec
		$\bar{X}$	SD	$\bar{X}$	SD				
	When I am under stress at work								
19	I experience burnout which reduces my efficiency at work.	2.78	0.78	2.70	0.79	1.06	743	0.29	NS
20	I usually suffer loss of memory which makes me get involved in workplace accidents.	3.13	0.80	3.06	0.85	0.95	743	0.34	NS
21	I am prone to heart diseases such as high-blood pressure which reduces my ability to do my job.	3.00	0.75	3.03	0.77	-0.32	743	0.74	NS
22	I often suffer headaches and muscle pains which hinder my job performance.	2.68	0.76	2.76	0.77	-1.14	743	0.25	NS
23	I suffer gastro-intestinal diseases such as diarrhea which makes me achieve less in my job performance.	2.64	0.74	2.79	0.79	-1.92	743	0.05	S
24	I experience eating disorders such as loss of appetite which lowers my strength for work.	2.95	0.79	3.00	0.83	-0.62	743	0.53	NS
25	I experience sleep difficulties such as insomnia which makes me unable to respond quickly to demands placed on me.	2.78	0.75	2.80	0.75	-0.19	743	0.84	NS
26	I resort to alcoholic beverages leading to loss of focus in the performance of my job.	2.75	0.76	2.82	0.76	-0.89	743	0.37	NS
27	I usually incur high costs of health care which dampens my zest for performance in my job.	3.22	0.73	3.24	0.77	-0.21	743	0.83	NS
	Job tension								
28	I feel tensed which reduces my ability to do my work.	2.83	0.75	2.75	0.75	1.12	743	0.26	NS

29	I experience difficulties in concentration leading to aggressiveness to staff and students.	2.70	0.68	2.57	0.69	2.09	743	0.04	S
30	I find it difficult to communicate effectively with my staff leading to serious misunderstandings.	2.90	0.79	2.92	0.81	-0.29	743	0.77	NS
31	I am unable to complete tasks on time due to frequent mood swings.	3.05	0.74	3.07	0.73	-0.32	743	0.74	NS
32	I find it difficult to make decisions that affect the lives of my staff and students.	2.44	0.75	2.61	0.70	-2.47	743	0.01	S
33	I am often late to important appointments that have to do with my job.	2.35	0.76	2.50	0.69	-2.13	743	0.03	S
34	I often make careless mistakes in the course of performing my job.	2.40	0.80	2.53	0.69	-1.88	743	0.06	NS
35	I often forget important things which render me incapable of meeting up with my work schedules.	2.81	0.64	2.80	0.64	0.02	743	0.98	NS
Low morale/low job satisfaction									
36	I usually experience low morale which reduces my ability to perform my job.	2.32	0.47	2.40	0.49	-1.62	743	0.11	NS
37	I experience loss of interest in my job which reduces my motivation for task accomplishments.	2.62	0.56	2.63	0.51	-0.23	743	0.81	NS
38	I am often absent from office and classes due to loss of interest in my job.	2.43	0.49	2.38	0.48	0.90	743	0.37	NS
39	I am unable to perform my supervisory role on my staff due to low morale in my job.	2.56	0.52	2.62	0.53	-1.09	743	0.27	NS
40	I often desire to quit my job due to feelings of dissatisfaction.	2.43	0.69	2.38	0.66	-0.80	743	0.42	NS
41	Low morale in my job negatively affects my staff members in their job	2.57	0.56	2.65	0.52	-1.56	743	0.12	NS

	performance.								
	Poor work relationships								
42	I often shout and yell at my staff which hampers their confidence in their job performance.	2.59	0.69	2.66	0.66	-0.98	743	0.33	NS
43	I find it difficult to delegate responsibilities to my subordinates which increases my workload.	2.49	0.72	2.56	0.68	-1.02	743	0.31	NS
44	I often withdraw to myself leading to loss of sense of responsibility in my job.	2.56	0.72	2.59	0.69	-0.52	743	0.60	NS
45	I am predisposed to blaming others which erodes staff morale for productivity.	2.29	0.57	2.29	0.55	0.04	743	0.97	NS
46	I find it difficult to listen to my subordinates which obstruct team work.	2.49	0.69	2.53	0.68	-0.60	743	0.55	NS
47	I find it difficult to express appreciation to my staff which lowers their commitment to their jobs.	2.31	0.66	2.42	0.66	-1.69	743	0.09	NS
48	I am often intolerant of the mistakes of my staff which hinders their creativity at work.	2.31	0.61	2.38	0.63	-1.17	743	0.24	NS
	Cluster t	2.67	0.24	2.69	0.24	-1.59	743	0.11	NS

Result on Table 9 show the t-test analysis of the significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on work experience. Result showed that there is significant difference on items 23, 29, 32 and 33. This is because their significant values are less than 0.05 level of significance. However, there is no significant difference on items 19-22, 24-28, 30, 31, and 34-48 because their significant values are greater than 0.05. A cluster t-value of -1.59 at 743 degree of freedom, and at a significant value of 0.11 was obtained. Since the significant value of 0.11 is greater than 0.05 set as level of significance, it means that the null hypothesis which stated that

there is no significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on work experience is not rejected. Inference drawn therefore is that there is no significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on work experience.

Research Question 6: What is the impact of work stress on academic administrators' job performance in universities in South East Nigeria based on educational qualification?

Table 10: Mean ratings of academic administrators of universities in South East Nigeria on the impact of work stress on job performance based on educational qualification

		Masters N = 157			Ph.D N = 588		
S/N	Item Statements	$\bar{X}_1$	SD ₁		$\bar{X}_2$	SD ₂	DEC ₂
When I am under stress at work:							
Health challenges							
19	I experience burnout which reduces my efficiency at work.	2.75	0.75	A	2.71	0.80	A
20	I usually suffer loss of memory which makes me get involved in workplace accidents.	3.05	0.81	A	3.07	0.85	A
21	I am prone to heart diseases such as high-blood pressure which reduces my ability to do my job.	2.96	0.74	A	3.04	0.78	A
22	I often suffer headaches and muscle pains which hinder my job performance.	2.62	0.73	A	2.78	0.77	A
23	I suffer gastro-intestinal diseases such as diarrhea which makes me achieve less in my job performance.	2.60	0.70	A	2.80	0.80	A
24	I experience eating disorders such as loss of appetite which lowers my strength for work.	2.90	0.77	A	3.01	0.84	A
25	I experience sleep difficulties such as insomnia which makes me unable to respond quickly to demands placed on me.	2.76	0.74	A	2.80	0.75	A
26	I resort to alcoholic beverages leading to loss of focus in the performance of my job.	2.66	0.74	A	2.84	0.77	A
27	I usually incur high costs of health care which dampens my zest for performance in my job.	3.16	0.78	A	3.25	0.77	A
Job tension							
28	I feel tensed which reduces my ability to do my work	2.77	0.75	A	2.77	0.75	A
29	I experience difficulties in concentration leading to aggressiveness to staff and students	2.63	0.63	A	2.58	0.70	A
30	I find it difficult to communicate effectively with my staff leading to serious misunderstandings	2.90	0.75	A	2.92	0.82	A
31	I am unable to complete tasks on time due to frequent mood swings.	3.00	0.76	A	3.08	0.73	A
32	I find it difficult to make decisions that affect the lives of my staff and students.	2.45	0.71	D	2.61	0.71	A
33	I am often late to important appointments that have to do with my job.	2.35	0.73	D	2.50	0.69	A
34	I often make careless mistakes in the course of performing my job.	2.39	0.74	D	2.54	0.71	A
35	I often forget important things which render me incapable of meeting up with my work schedules.	2.79	0.63	A	2.81	0.65	A
Low morale/low job satisfaction							
36	I usually experience low morale which reduces my ability to perform my job.	2.34	0.47	D	2.39	0.49	D

37	I experience loss of interest in my job which reduces my motivation for task accomplishments.	2.58	0.56	A	2.64	0.51	A
38	I am often absent from office and classes due to loss of interest in my job.	2.44	0.49	D	2.38	0.48	D
39	I am unable to perform my supervisory role on my staff due to low morale in my job.	2.57	0.54	A	2.61	0.52	A
40	I often desire to quit my job due to feelings of dissatisfaction.	2.47	0.70	D	2.39	0.66	D
41	Low morale in my job negatively affects my staff members in their job performance.	2.52	0.51	A	2.66	0.53	A
Poor work relationships							
42	I often shout and yell at my staff which hampers their confidence in their job performance.	2.58	0.72	A	2.67	0.64	A
43	I find it difficult to delegate responsibilities to my subordinates which increases my workload.	2.50	0.73	A	2.57	0.67	A
44	I often withdraw to myself leading to loss of sense of responsibility in my job.	2.51	0.74	A	2.61	0.67	A
45	I am predisposed to blaming others which erodes staff morale for productivity.	2.28	0.59	D	2.29	0.54	D
46	I find it difficult to listen to my subordinates which obstruct team work.	2.50	0.72	A	2.54	0.66	A
47	I find it difficult to express appreciation to my staff which lowers their commitment to their jobs.	2.32	0.66	D	2.42	0.65	D
48	I am often intolerant of the mistakes of my staff which hinders their creativity at work.	2.30	0.62	D	2.39	0.62	D
Cluster Mean		2.62	0.23	A	2.68	0.24	A

Data presented Table 10 show the mean and standard deviations of responses on the impact of work stress on academic administrators' job performance in universities in south East Nigeria based on educational qualification. The result of the study showed that the respondents with masters degree agreed on items 19 ÷ 31, 35, 37, 39, 41-44 and 46 as impact of work stress on academic administrators' job performance in universities in South East Nigeria with mean ratings above the 2.50 benchmark for each of the items, while respondents with Ph. D agreed on items 19 ÷ 35, 37, 39, 41 ÷ 44 and 46 as the impact of work stress on academic administrators' job performance with mean ratings above the 2.50 criterion level. However, all the respondents disagreed on items 36, 38, 40, 45, 47 and 48 as the impact of work stress on academic administrators' job performance with mean ratings below the 2.50 set as bench mark. Only the

respondents with masters degrees disagreed on items 32 and 33 as the impact of work stress on academic administrators job performance, with mean ratings below the 2.50 bench mark. The cluster mean scores and standard deviations of 2.62 and 0.23 (for respondents with masters degree) and 2.68 with standard deviation of 0.24 (for respondents with Ph.D) showed that majority of the items on Table 10 are the impact of work stress on academic administrators job performance in universities in South East Nigeria.

Hypothesis Five: There is no significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on educational qualification.

Table 11: t-test analysis of the significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on educational qualification

S/N	Items	Masters N = 157		Ph.D N = 588		t-cal	Df	Sig	Dec
		$\bar{X}$	SD	$\bar{X}$	SD				
	When I am under stress at work:								
	Health challenges								
19	I experience burnout which reduces my efficiency at work.	2.75	0.75	2.71	0.80	0.52	743	0.60	NS
20	I usually suffer loss of memory which makes me get involved in workplace accidents.	3.05	0.81	3.07	0.85	-0.34	743	0.74	NS
21	I am prone to heart diseases such as high-blood pressure which reduces my ability to do my job.	2.96	0.74	3.04	0.78	-1.09	743	0.27	NS
22	I often suffer headaches and muscle pains which hinder my job performance.	2.62	0.73	2.78	0.77	-2.36	743	0.02	S
23	I suffer gastro-intestinal diseases such as diarrhea which makes me achieve less in my job performance.	2.60	0.70	2.80	0.80	-2.79	743	0.00	S
24	I experience eating disorders such as loss of appetite which	2.90	0.77	3.01	0.84	-1.42	743	0.16	NS

25	lowers my strength for work. I experience sleep difficulties such as insomnia which makes me unable to respond quickly to demands placed on me.	2.76	0.74	2.80	0.75	-0.63	743	0.53	NS
26	I resort to alcoholic beverages leading to loss of focus in the performance of my job.	2.66	0.74	2.84	0.77	-2.59	743	0.01	S
27	I usually incur high costs of health care which dampens my zest for performance in my job.	3.16	0.78	3.25	0.77	-1.27	743	0.20	NS
	Job tension								
28	I feel tensed which reduces my ability to do my work.	2.77	0.75	2.77	0.75	0.01	743	0.99	NS
29	I experience difficulties in concentration leading to aggressiveness to staff and students	2.63	0.63	2.58	0.70	0.81	743	0.42	NS
30	I find it difficult to communicate effectively with my staff leading to serious misunderstandings	2.90	0.75	2.92	0.82	-0.36	743	0.72	NS
31	I am unable to complete tasks on time due to frequent mood swings.	3.00	0.76	3.08	0.73	-1.19	743	0.23	NS
32	I find it difficult to make decisions that affect the lives of my staff and students.	2.45	0.71	2.61	0.71	-2.35	743	0.02	S
33	I am often late to important appointments that have to do with my job.	2.35	0.73	2.50	0.69	-2.21	743	0.03	S
34	I often make careless mistakes in the course of performing my job.	2.39	0.74	2.54	0.71	-2.32	743	0.02	S
35	I often forget important things which render me incapable of meeting up with my work schedules.	2.79	0.63	2.81	0.65	-0.26	743	0.79	NS
	Low morale/low job satisfaction								
36	I usually experience low morale which reduces my ability to perform my job.	2.34	0.47	2.39	0.49	-1.19	743	0.23	NS
37	I experience loss of interest in my job which reduces my motivation for task	2.58	0.56	2.64	0.51	-1.24	743	0.21	NS

	accomplishments.								
38	I am often absent from office and classes due to loss of interest in my job.	2.44	0.49	2.38	0.48	1.39	743	0.16	NS
39	I am unable to perform my supervisory role on my staff due to low morale in my job.	2.57	0.54	2.61	0.52	-0.92	743	0.36	NS
40	I often desire to quit my job due to feelings of dissatisfaction.	2.47	0.70	2.39	0.66	-2.00	743	0.05	S
41	Low morale in my job negatively affects my staff members in their job performance.	2.52	0.51	2.66	0.53	-2.84	743	0.00	S
	Poor work relationships								
42	I often shout and yell at my staff which hampers their confidence in their job performance.	2.58	0.72	2.67	0.64	-1.41	743	0.16	NS
43	I find it difficult to delegate responsibilities to my subordinates which increases my workload.	2.50	0.73	2.57	0.67	-1.09	743	0.27	NS
44	I often withdraw to myself leading to loss of sense of responsibility in my job.	2.51	0.74	2.61	0.67	-1.61	743	0.11	NS
45	I am predisposed to blaming others which erodes staff morale for productivity.	2.28	0.59	2.29	0.54	-0.17	743	0.87	NS
46	I find it difficult to listen to my subordinates which obstruct team work.	2.50	0.72	2.54	0.66	-0.64	743	0.52	NS
47	I find it difficult to express appreciation to my staff which lowers their commitment to their jobs.	2.32	0.66	2.42	0.65	-1.78	743	0.07	NS
48	I am often intolerant of the mistakes of my staff which hinders their creativity at work	2.30	0.62	2.39	0.62	-1.62	743	0.10	NS
	Cluster t	2.62	0.23	2.68	0.24	-3.34	743	0.00	S

Result on Table 11 show the t-test analysis of the significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job

performance based on educational qualification. Result show that there is significant difference on items 22, 23, 26, 32-34, 40 and 41. This is because their significant values are less than 0.05 level of significance. However, there is no significant difference on items 19-21, 24, 25, 27-31, 35-39 and 42-48 because their significant values are greater than 0.05. A cluster t-value of -3.34 at 743 degree of freedom, and at a significant value of 0.00 was obtained. Since the significant value of 0.00 is less than 0.05 set as level of significance, it means that the null hypothesis which stated that there is no significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on educational qualification is rejected. Inference drawn therefore is that there is a significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on educational qualification with Ph.D holders having a higher mean rating.

Research Question 7: What are the stress management strategies employed by academic administrators of federal and state universities in South East Nigeria in dealing with work stress?

Table 12: Mean ratings of academic administrators of universities in South East Nigeria on the stress management strategies employed in dealing with work stress.

S/N	Item Statements	Federal N = 397			State N = 348		
		$\bar{X}_1$	SD ₁	DEC ₁	$\bar{X}_2$	SD ₂	DEC ₂
Physiological Strategies							
49	Engaging in regular exercises.	2.87	0.34	A	2.69	0.85	A
50	Use of meditation/relaxation techniques.	2.74	0.44	A	2.62	0.80	A
51	Getting adequate sleep.	2.88	0.42	A	2.76	0.55	A
52	Listening to music/singing.	2.72	0.47	A	2.65	0.54	A
53	Eating balanced diet.	2.92	0.44	A	2.82	0.67	A
54	Going for clinical counseling.	2.63	0.48	A	2.53	0.74	A
55	Taking vital medications.	2.86	0.48	A	2.81	0.64	A
56	Discontinuing the use of alcoholic beverages and narcotics	2.70	0.46	A	2.67	0.80	A
Cognitive/Psychological Strategies							
57	Having positive view of situations.	3.14	0.77	A	2.63	0.82	A
58	Engaging in recreational or leisure activities.	2.68	0.65	A	2.54	0.53	A
59	Cultivating a sense of humour (laugh often).	2.95	0.68	A	2.95	0.55	A
60	Use of prayers and keeping faith if God.	1.73	0.79	D	2.11	0.88	D
61	Sharing feelings with trusted friends.	2.70	0.66	A	2.92	0.46	A
62	Relying on supportive colleagues.	2.83	0.75	A	2.88	0.80	A
63	Seeking help from a mentor.	3.21	0.90	A	3.13	0.78	A
Interpersonal/Organizational Management Strategies							
64	Respecting the feelings of colleagues, staff and students.	3.00	1.01	A	2.97	0.72	A
65	Demonstrating leadership by example.	3.58	0.65	A	3.60	0.53	A
66	Showing empathetic understanding to subordinates.	3.37	0.83	A	3.08	0.76	A
67	Allowing close relationship to occur among self, staff and students.	3.48	0.75	A	3.48	0.56	A
68	Ensuring effective communication with colleagues, staff and students.	2.96	0.63	A	2.84	0.82	A
69	Expressing feelings instead of bottling them up.	3.47	0.70	A	3.14	0.93	A
70	Delegating responsibilities to subordinates.	3.21	0.85	A	3.31	0.77	A
71	Involving staff members in decision making.	3.31	0.79	A	3.21	0.97	A
72	Avoiding scheduling too many appointments.	3.46	0.75s	A	3.55	0.56	A
73	Allocating time to specific tasks according to their degree of importance.	3.20	0.85	A	3.08	0.69	A
74	Avoiding procrastinations.	3.42	0.68	A	2.79	0.76	A
75	Keeping and maintaining a stress diary.	2.14	0.59	D	2.33	0.72	D
Cluster Mean		2.97	0.20	A	2.89	0.20	A

Results on Table 12 show the mean and standard deviations of responses on stress management strategies employed by academic administrators of federal and state universities in South East Nigeria in dealing with work stress. The result of the study showed that respondents from federal and state universities agreed on 25 out of the 27 items as stress management strategies employed by academic administrators in dealing with work stress. This is because the mean ratings for the items are above the 2.50 bench mark. The respondents however, disagreed on items 60 and 75. This is because the mean ratings for the items are below the 2.50 bench mark. However, the cluster mean scores of 2.97 with a standard deviation of 0.20 and 2.89 with a standard deviation of 0.20 for respondents from federal and state universities respectively showed that majority of the items on Table 12 are stress management strategies employed by academic administrators of federal and state universities in South East Nigeria in dealing with work stress.

Summary of findings

The following constitute the major findings of the study:

1. The academic administrators of federal and state universities, agreed on all the items listed as factors that induce them to work stress. These include: irregular receipt of salaries, lack of adequate resources needed to carry out jobs, combining academic responsibilities with administrative duties, attending meetings that take up too much time, pressure to attend workshops, conferences and seminars, among others.
2. The academic administrators of federal and state universities, male and female, those within the age brackets of 30-40 years, 41- 50 and 51 years and above, those with work experience below ten years and above years, those with masters degrees and Ph. D degrees, all agreed that majority of the items presented in table 2, 4, 6, 8 and 10, are the impact of work stress on their job performance. These include: burnout, which reduces their efficiency at work, sleep

difficulties (insomnia) which makes them unable to respond quickly to demands placed on them, difficulties in concentration, leading to aggressiveness to staff and students, making careless mistakes in the course of performing their jobs, forgetting important things which renders them incapable of meeting up with work schedules, going late to important appointments, among others.

3. There is a significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on institutional ownership, with federal universities having a higher mean rating.
4. There is no significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on gender.
5. There is no significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on age.
6. There is no significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on work experience.
7. There is a significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based qualification with Ph. D holders having a higher mean rating.
8. The respondents agreed that majority of the items on table 12 are stress management strategies employed by academic administrators of federal and state universities in South East, Nigeria, in dealing with work stress. These include: engaging in regular exercises, getting adequate sleep, seeking help from a mentor, going for clinical counseling, discontinuing the use of alcoholic beverages and narcotics, delegating responsibilities to subordinates, involving staff members in decision making, allocating time to specific tasks according to their degree of importance, among others.

CHAPTER FIVE

DISCUSSION OF FINDINGS, CONCLUSIONS, EDUCATIONAL IMPLICATIONS, RECOMMENDATIONS, AND SUMMARY

This chapter presents the discussion of findings of the study, conclusions, educational implications of the research findings, recommendations, limitation of the study, suggestions for further research and summary of the study.

Discussion of findings

Factors that induce work stress among academic administrators of federal and state universities

The findings of the study on the factors that induce academic administrators to work stress revealed that the respondents, both federal and state, agreed on all the items as factors that induce them to work stress. These include: irregular receipt of salaries, lack of adequate resources needed to carry out their jobs, combining academic responsibilities with administrative duties, pressure of meeting up with the semester calendar, dealing with students's disciplinary problems, supervising the tasks of staff members, demands of official work on private time, pressure to complete reports, memos and other communication, having my work frequently interrupted by staff members who want to be attended to, attending meetings that take up too much time, pressure of having the required publication for promotion, pressure to attend workshops, conferences and seminars, resolving differences among staff members, resolving differences among students, among others.

The findings on irregular receipt of salaries and lack of adequate resources are in agreement with that of Chandra and Sharma (2010) who found that inadequate and irregular salaries and lack of resources and infrastructural facilities have the ability to precipitate work stress among workers. The finding further aligns with that of Omoniyi (2013) who found that

university lecturers experience stress resulting from poor conditions of lecturers' offices and lack of facilities. The finding on combination of both administrative and academic responsibilities agrees with that of Khan (2001) who reported that workload pressure arising from the performance of day-to-day academic and administrative responsibilities such as addressing grievances, attending workshops and seminars, demands to meet targets and deadlines, writing reports and other paper works, and monitoring all other faculty duties predispose academic administrators to stress. The findings on stagnation in promotion agrees with the assertion of Kanungo cited in Chandra and Sharma (2010) that when workers believe that there is a separation between their jobs and other work related contests such as stagnation in promotion, it creates a sense of frustration that eventually manifests in a behavioural state of apathy. The findings on students' disciplinary problems tallies with the view of Bashir et al (2013) that issues relating to the handling of students' disciplinary problems in universities could add more workload for the academic administrators thereby creating stress for them. The findings of the study regarding demand of official work on private time and using official time for private interests is in line with the assertion of Ugwu (2013) that inability to balance work and family roles due to workload pressure may lead to a situation where job demands start encroaching on a workers private time and vice versa, which could lead to stress.

The fact that the respondents agreed on all the eighteen items on factors that induce work stress among them, is not surprising to the researcher. This is because it aptly demonstrates that the academic administrators, whether in federal or state universities, are actually stressed at work. This may be attributed to the fact that management of federal and state universities in Nigeria, especially in the South East, are not doing enough in terms of providing conducive working environment which will enable the lecturers (academic administrators inclusive) to thrive well, as typified in factors such as irregular receipt of salaries, lack of resources needed to

carry out jobs, stagnation in promotion, lack of funds to conduct research in areas of specialization, among others. This situation may engender or exacerbate illnesses among the academic administrators, impair their performance at work, thereby adversely affecting academic activities in the universities.

It is noteworthy that the respondents agreeing on all the items also seem to lend credence to the Person-Environment Fit Theory of stress as propounded by French, Rogers and Cobb in 1974, which holds that when the work environment fails to meet the needs and abilities of the worker, the worker develops distress that often leads to specific illnesses which negatively affects the health of the worker. Thus, when there is mismatch or discrepancy between what a worker expects to get from the work environment and what the person actually gets, stress is likely to occur. Thus, these work stress factors constitute perhaps the whole gamut of the stresses experienced by the academic administrators, whether federal or state.

Impact of work stress on academic administrators' job performance based on institutional ownership

With reference to the result of the impact of work stress on academic administrators' job performance based on institutional ownership, the findings showed that academic administrators of federal and state universities agreed that work stress impacts on their job performance through: burnout which reduces their efficiency at work, high blood pressure which reduces their abilities to do their jobs, sleep difficulties which makes them unable to respond quickly to demands placed on them, difficulties in concentration leading to aggressiveness to staff and students, inability to complete tasks on time due to frequent mood swings, forgetting important things which render them incapable of meeting up with work schedules, loss of interest in their jobs which reduces motivation for task accomplishments, inability to perform supervisory role on staff due to low morale, among others. Both respondents also disagreed on few of the factors

such as absence from office and classes due to loss of interest; desire to quit their jobs due to feelings of dissatisfaction, being predisposed to blaming others, among others. However, while respondents from federal universities agreed that factors such as shouting and yelling at staff which hampers their confidence in their job performance, difficulties to delegate responsibilities which increases workload, withdrawal leading to loss of sense of responsibility, among others impact on their job performance, the respondents from state universities disagreed. Also, while respondents from state universities agreed that factors such as making decisions that affect the lives of staff and students, coming late to important appointments, among others, their counterparts in federal universities disagreed. However, the cluster means and standard deviations of both categories show that majority of the items constitute the impact of work stress on academic administrators' job performance.

This above findings of the study that work stress impacts on the job performance of academic administrators through burnout, loss of memory, risk of accidents, among others, tallies with of Thong and Yap (2000), who hold that work stress regularly contributes to burnout, risk of accidents and illnesses like hypertension, coronary heart disease, ulcers, diabetes, weak immune system and severe depression, among others leading to the inability of employees to carry out their job demands. It also supports the assertion of Patterson (2012) who noted that in work places, work stress impacts on employee job performance through job tension, marked off by concentration difficulties, inability to complete tasks by moving from one assignment to another, difficulties in retaining and recalling information, indecision, aggressiveness to colleagues and changes in thinking style.

The result of the hypothesis on the impact of work stress on academic administrators' job performance based on institutional ownership revealed that there is a significant difference between the mean ratings of academic administrators of universities with regard to the impact of

work stress on job performance based on institutional ownership, with federal university having a higher mean rating. Thus, the null hypothesis was rejected. This means that work stress impacted more on the job performance of academic administrators of federal universities than those in state universities. The finding is in line with the assertion of Oghenetega, et al (2014) who noted that there may be differences in the level of job stress experienced in federal, state or private universities in Nigeria. However, the result of the null hypothesis does not agree with Ejue (2013) who discovered that stress impacted more on the job performance of lecturers in state universities than federal universities. The author stated that this may be due to the fact that conditions of service, with particular reference to remuneration in all federal government owned universities, are uniform while those of state universities differ.

This significant difference in the opinions of the respondents may be attributed to the federal nature and management perspectives of federal universities leading to some peculiarities. For instance, there may be some stress factors present and more pronounced in federal universities than those of states, such as over population in terms of enrolment of students, too many programmes, leading to work overload, among others, which may predispose the staff of federal universities to more impact from stress on their job performance. Another reason may be that state universities are usually composed of people from homogenous background, while federal universities are characterized by diversity in terms of background, which may lead to much office politics in admissions, employment, appointments and assignments. This scenario could create or exacerbate more stressful situations that can hamper job performance among lecturers of federal universities, especially the academic administrators.

Impact of work stress on academic administrators' job performance based on gender

The findings on the impact of work stress on academic administrators' job performance based on gender showed that the male and female respondents agreed that work stress impacts on

them through: burnout which reduces their efficiency at work, eating disorders which lowers their strength for work, loss of memory which makes them get involved in workplace accidents, headaches and muscle aches which hinders their job performance, resorting to alcoholic beverages leading to loss of focus in job performance, among others. Both the male and female respondents disagreed that having low morale which reduces their ability to perform, absence from office and classes due to loss of interest, desire to quit the job due to feelings of dissatisfaction, intolerance of the mistakes of staff which hinders their creativity at work, among others, are impact of work stress on their job performance. While the male respondents agreed that lateness to important appointments that have to do with their jobs, making careless mistakes in the course of performing jobs, among others, impact on their job performance, the female respondents disagreed. However, the cluster mean scores and standard deviations for both the male and female respondents indicate that majority of the factors constitute the impact of work stress on the job performance of academic administrators. This finding is in support of the view of Wadsworth, Simpson, Moss and Smith (2003) that work stress could predispose employees to work-related accidents leading to the sustenance of various degrees of injury and increase in health care costs, which consequently, may negatively affect their performance in their jobs. It also lends credence to the assertion of Venegas, Axelsson and Vanagiene (2004) who observed that work stress leads to feelings of job tension, frustration, disorganization, aggressiveness and depression and consequently poor performance at work.

The result of the hypothesis on the impact of work stress on job performance based on gender showed that there is no significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on gender. Thus, the null hypothesis was accepted. This means that work stress impact equally on the job performance of both the male and female academic administrators. The finding

supports Bada and Falana (2013), who found no significant difference between stress experienced by male and female lecturers. It also agrees with Omoniyi and Ogunsami (2012), whose study found no significant difference in the level of perceived stress among the lecturers based on gender and years of work experience. It further agrees with the finding of Chauldhry (2012), who reported that no significant relationship was established between occupational stress of university lecturers based on gender and nature of job. The finding corroborates that of Al-Omar (2003) who reported that work stress may affect all employees irrespective of gender differences. However, the finding disagrees with the opinion of Liu and Zhu (2009) that men are more likely to experience more stress than women. It further disagrees with the assertion of Nnabuihe, Onyeizugbe and Onwuka (2012) that work stress is likely to be profound among female lecturers than their male counterparts.

This finding could be attributed to the fact that individuals have different ways of adjustments with different coping styles, they adopt different coping mechanisms and are free to use whatever strategy that works for them. Thus, academic administrators adopt strategies that suit their circumstances which may neutralize the gender effect. Another reason for this result could be because academic administrators, whether male or female, face the same challenges due to their official positions and responsibilities. Thus, they are equally exposed to the same stressful situations at work, with same implications on their job performance.

Impact of work stress on academic administrators' job performance based on age

The findings on the impact of work stress on academic administrators' job performance based on age revealed that the respondents agreed on majority of the items as the impact of work stress on their job performance. The respondents within the ages of 30-40 years agreed that work stress impacts on their job performance through loss of memory, sleep difficulties which makes them unable to respond quickly to demands placed on them, incurring high costs of health

care which dampens their zest for performance, feeling tensed which reduces their abilities to their work, difficulty in communication with staff leading to serious misunderstandings, difficulty in delegating responsibilities to subordinates which increases their workload, among others. The respondents within the ages of 41-50 years agreed that work stress impacts on their job performance through: burnout which reduces their efficiency at work, high blood pressure which reduces their abilities to do their jobs, resorting to alcoholic beverages leading to loss of focus in job performance, inability to complete tasks on time due to frequent mood swings, forgetting important things which render them incapable of meeting up with work schedules, inability to perform supervisory role on their staff due to low morale, shouting and yelling at staff which hampers their confidence in their job performance, among others. The respondents within the ages of 51 and above agreed that work stress impacts on their job performance through: suffering headaches and muscle pains which hinder their job performance, loss of appetite which lowers their strength for work, sleep difficulties which makes them unable to respond quickly to demands placed on them, difficulties in concentration leading to aggressiveness to staff and students, low morale which reduces their ability for job performance, difficulty in delegating responsibilities to subordinates which increases their workload, among others. All the respondents disagreed that work stress impacts on their job performance through: having low morale which reduces their ability to perform their jobs, absence from office and classes due to loss of interest, desire to quit their jobs due to feelings of dissatisfaction, difficulty in expressing appreciation to staff which lowers their commitment to their jobs, among others. However, the cluster means and standard deviations of all the age groups showed that majority of the items impact on the job performance of the academic administrators.

This result agrees with the assertion of Faragher, Cass and Cooper (2005) that work stress leads to burnout, which manifests in physical exhaustion, insomnia, depression, drug and alcohol

use, depersonalization and perceived lack of personal accomplishment in work places. It also agrees with the view of Schabracq and Cooper (2000) that work stress manifests in lack of motivation, absenteeism, high turnover, increased late coming to work, missing deadlines, among others, which may negatively impact on job performance

The result of the null hypothesis on the impact of work stress on academic administrators' job performance based on age revealed that there is no significant difference between the mean ratings of the respondents with regard to the impact of work stress on job performance based on the age groups (30-40, 41-50, 51 and above). Thus, hypothesis 3 is accepted. This means that work stress impacts equally on the job performance of the academic administrators irrespective of their age differences. The finding is in consonance with that of Balakrishnamurthy and Shankar (2009) who reported that age has no impact on the stress responses of individuals and their productivity at work. The findings also agree with the opinion of Beatty and Burroughs (1999), that being older or younger does not predispose employees to health problems but rather health issues can affect anybody regardless of age. The finding also corroborates the view of Bittman (1999) that, there is no age at which individuals are exempted from stress and even children are not exempted from it and its consequences. However, the findings disagree with the opinion of Mundell (2002), that older people may suffer less from stress and its effects due to the fact that they are taking things easy and realizing that it's not worth getting upset about small things. The findings also disagree with that of Mahmood et al (2013) who discovered that younger and older academic managers experience more stress than the middle aged ones.

The finding also lends credence to the General Adaption Syndrome (GAS) Theory as propounded by Hans Selye in 1936, which posits that the process of exposure to stress experienced by individuals manifests in three distinctive stages: the alarm reaction (AR) stage,

the stage of resistance (SR) and the stage of exhaustion (SE). In other words, all individuals react in the same way to stressful situations. Thus, the opinion of the respondents that age does not predict the impact of work stress on their job performance, may be ascribed to the fact that stress is seen as a universal phenomenon that affects everybody without discrimination, given an enabling environment for it to occur.

Impact of work stress on academic administrators' job performance based on work experience

The results of the impact of work stress on academic administrators job performance in universities in South East Nigeria based on work experience showed that the respondents with below ten years of work experience agreed that the impact of work stress on their job performance manifests through: burnout which reduces their efficiency at work, being prone to heart diseases which reduces their abilities to work, gastro-intestinal diseases which make them achieve less in their job performance, incurring high costs of health care which dampens their zest for performance, difficulties in concentration leading to aggressiveness to staff and students, low morale which reduces their ability for job performance, shouting and yelling at staff which hampers their confidence in job performance, among others. Also, the respondents with ten years of work experience and above agreed that work stress impacts on their job performance through loss of memory which makes them get involved in work place accidents, headaches and muscle pains which hinder their job performance, eating disorders such as loss of appetite which lowers their strength for work, loss of interest in their jobs which reduces their motivation for task accomplishments, difficulty to listen to subordinates which obstructs team work, difficulty to delegate responsibilities to subordinates which increases their workload, among others. However, the two groups of respondents disagreed that work stress impacts on their job performance through: absence from office and classes due to loss of interest; desire to quit their

jobs due to feelings of dissatisfaction, difficulty to express appreciation to their staff, among others. However, judging from the cluster mean scores and standard deviations of both groups of respondents, majority of the items constitute the impact of work stress on their job performance.

The findings support the view of Ford (2004) who maintained that diseases engendered by work stress could make workers to stop working for long periods, could cause exposure to traumatic events, disability, increased cost of health care and interpersonal conflicts, thereby militating against the realization of organizational objectives. The result also agrees with the assertion of Thomas, Marthene, Buboltz and Doyle (2012), who argued that work stress contributes to organizational inefficiency which manifests in high staff turnover, absenteeism, and, low morale, reduction in creative ability, loss of work interest, decreased job satisfaction and diminished organizational commitment.

The result of the null hypothesis (t-test analysis), showed that there is no significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on work experience. Thus, hypothesis 4 is accepted. This means that work stress impacted on the job performance of academic administrators irrespective of the number of years they have spent working in the universities. The result is in consonance with that of Jepson and Forrest (2006) who found that work experience does not predict work stress experienced by teachers. The finding also tallies with that of Johannsen (2011) who found no significant difference between years of work experience and job stress among teachers. The result further lends credence to the finding of Omoniyi and Ogunsami (2012) who reported no significant difference in the level of perceived stress among academic staff of universities in South West Nigeria based on years of work experience. However, the finding does not agree with the view of Aftab and Khatoon (2012), who opined

that the prevalence of occupational stress among workers may be predicted based on level of work experience.

This result is surprising to the researcher. This is because, the researcher had nurtured the idea that the ability to contain stress at work may be dependent on the work experience garnered by a worker, which implies that work stress should have impacted more on the respondents with less work experience (below 10 years) than those with higher work experience (above 10 years). However, the finding could be as a result of the fact that the respondents are exposed to the same factors that induce work stress, and as such, what affects one affects others irrespective of how many years they have spent working in the universities. Another reason could be attributed to having the required knowledge. Both the more experienced and the less experienced may have the basic knowledge of the demands of their jobs which may play some roles in their abilities to absorb and manage stressful situations arising from their job performance. Also, the academic administrators, whether more experienced or less experienced, may be assigned workloads based on their levels and capabilities, which may have put the impact of work stress that arises from their job performance at par.

Impact of work stress on academic administrators' job performance based on educational qualification

With regards to the finding on the impact of work stress on academic administrators' job performance based on educational qualification, the respondents with masters degree agreed that the impact of work stress on their job performance include: burnout which reduces their efficiency at work, headaches and muscle pains which hinder job performance, resorting to alcoholic beverages leading to loss of focus in the performance of their jobs, feeling tensed which reduces their abilities to do their jobs, inability to complete tasks on time due to frequent mood swings, forgetting important things which have to do with their jobs, loss of interest in

their jobs which reduces their motivation for task accomplishment, withdrawal, leading to loss of sense of responsibility, among others. The respondents with Ph.D degrees agreed that the impact of work stress on their job performance include: being prone to heart diseases such as high blood pressure, which reduces their abilities to do their jobs, experiencing sleep difficulties such as insomnia which makes them unable to respond quickly to demands placed on them, difficulty to communicate effectively with staff leading to serious misunderstandings, making careless mistakes in the course of performing their jobs, inability to perform supervisory role on their staff due to low morale, shouting and yelling at staff which hampers their confidence in their job performance, difficulty to listen to subordinates which obstructs team work, among others. However, the two categories of respondents disagreed that items such as absence from office and classes due to loss of interest in their jobs, desire to quit their jobs due to feelings of dissatisfaction, being predisposed to blaming others which erodes staff morale for productivity, difficulty to express appreciation to staff which lowers their commitment to their jobs, among others. However, the cluster mean scores and standard deviations of both respondents, points to the fact that majority of the items constitute the impact of work stress on their job performance.

This finding lends credence to the observation of Cooper (2000) that work stress engenders much job tension which manifests in depression and anxiety, forgetfulness, making careless mistakes, more turnover rates, higher alcohol and drug use, unexpected behaviour, high rate of smoking, difficulty in concentration and difficulties in communication. The finding further aligns with the opinion of Patterson (2012) who noted that work stress predisposes employees to the risk of being more irritable with colleagues and makes the worker to withdraw to himself/herself suffering quietly, thereby dampening the desire to carry out responsibilities especially group tasks

The result of the null hypothesis (t-test analysis) on the impact of work stress on academic administrators' job performance based on educational qualification, revealed that there is a significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on educational qualification, with Ph. D holders having a higher mean rating. Thus, the null hypothesis was rejected. This means that work stress impacts more on the job performance of academic administrators with Ph, D degrees than those with masters degrees. It therefore follows that educational qualifications predict the impact of work stress on job performance. The finding is in consonance with the assertion of Gallow and Matthews (2003) that people with higher educational qualifications have more demanding jobs that require greater abilities and thus have greater worries which may put more stress on them and affect their job performance, than those with lower educational attainment. However, the result disagrees with the finding of Mokdad (2005) who reported no significant difference between the job stress experienced by workers based on educational qualification.

In line with the assertion of Gallow and Matthews (2003), the finding could be adduced to the fact that those with higher educational qualification (Ph.D) are assigned greater responsibilities, ranging from supervision of more Ph.D students, membership of more university committees and assignment of more academic and administrative responsibilities than those with lower educational qualification (masters degrees), which creates much workload, thereby predisposing them to work stress and consequently affecting them in their job performance. Another reason for this finding could be that, the respondents with masters degrees may still be striving to meet up to the status of their colleagues with Ph. D degrees. This ambition may engender more zest in them, which could increase the resilience needed to absorb pressure, thereby making them to suffer less from the impact of work stress on their job performance.

Stress management strategies employed by academic administrators of federal and state universities in dealing with work stress

The finding of the study on the stress management strategies employed by academic administrators of universities in dealing with work stress showed that both the respondents from federal and state universities agreed they adopt all the items listed as physiological strategies in dealing with work stress. These strategies include: engaging in regular exercises, use of meditation/relaxation techniques, getting adequate sleep, listening to music/singing, eating balanced diet, going for clinical counseling, taking vital medications and discontinuing the use of alcoholic beverages and narcotics. Concerning the cognitive/psychological strategies, both respondents in federal and state universities agreed they adopt strategies such as: having positive view of situations, engaging in recreational or leisure activities, cultivating a sense of humour (laugh often), sharing feelings with trusted friends, relying on supportive colleagues and seeking help from a mentor. However, the respondents, in both universities, disagreed on use of prayers and keeping faith in God and keeping and maintaining a stress diary as a strategy in managing stress. The respondents, in both universities also agreed that they adopt the interpersonal/organizational management strategies such as: respecting the feelings of colleagues and staff, demonstrating leadership by example, ensuring effective communication with colleagues, staff and students, delegating responsibilities to subordinates, involving staff members in decision making, allocating time to specific tasks according to their degree of importance, among others. However, the respondents disagreed on keeping and maintaining a stress diary as a strategy for dealing with work stress. However, the cluster mean scores and standard deviations of both category of respondents, point to the fact that majority of the items constitute the stress management strategies employed by academic administrators of federal and state universities in dealing with work stress.

The findings are in consonance with that of Ajayi and Adamu (2012), who found that the predominant strategies employed by heads of departments in managing stress include: sharing feelings with trusted friends; creating time for leisure activities; expressing feelings instead of bottling them up; forgiving others; relaxing from routine work; positive thinking; taking vital medications; adequate sleep; keeping sense of humour, getting help from a mentor and physical exercise. The finding also lends credence to the finding of Oboegbulem (2008) that academic heads of departments employed strategies such as physiological activities involving exercises, meditation and sleeping, cognitive and psychological strategies, involving, positive reappraisal, leisure activities, relying on supportive friends and interpersonal and organizational management strategies such as effective communication, effective use of time, involving others in decision making, among others..

The finding on engaging in regular exercises agrees with the view of Pearl (2012), who observed that exercising regularly will make people live longer and manage stress better. The finding on eating balanced diet supports the assertion of Greenberg (2002), who stated that taking balanced diet will help prepare an individual to cope with stress. The finding on taking vital medications aligns with the opinion of Swent (2001), who averred that taking prescribed drugs (vital medications) assists people in managing stressful situations. The finding on cultivating a sense of humour (laugh often), agrees with the view of Restak (2013), who holds that laughing during stressful situations can put a psychological distance between an individual and the stress. The finding on ensuring effective communication supports the opinion of Riggio (2003), who observed that proper organizational communication can prevent workers from experiencing job stress arising from job uncertainty and feelings of isolation from what is going on in the organization and that the simple act of discussing one's problems can be extremely helpful in the healing process for stress. The finding on allocating time to specific tasks

according to their degree of importance agrees with the assertion of Ugoji and Isele (2009), that good time management skills are critical for effective stress control. The finding on involving subordinates in decision making corroborates the opinion of Harris, Harris and Harvey (2008), that involving subordinates in the decision-making process lead to higher levels of job satisfaction, organizational commitment, job performance and ability to cope with stressful situations.

The fact that the academic administrators agreed on almost all the strategies for managing stress is not surprising to the researcher. This is because the researcher has always nurtured the idea that there is always a vast repertoire of coping strategies which individuals are always free to employ when they are in stressful situations. The choice of one strategy against the other depends on the individual's appraisal of such a strategy and the potential stressor. These appraisals enable individuals to enact specific coping strategies to deal with the potential source(s) of stress.

It is also pertinent to state that the findings of the study that the academic administrators adopted almost all the strategies in dealing with work stress, is in line with the assertion of the proponents of the transactional model of stress, Lazarus and Folkman, 1984, that the effects or impact of a potential stressor on health and well-being depends upon cognitive processes, whereby individual appraisals are essential in determining the degree to which a potential stressor will be perceived as threatening and in shaping people's judgments about resources available to cope. According to the proponents, as a result of these appraisals, the individual will enact specific coping strategies to deal with the potential source(s) of stress. This explains the various stress management strategies adopted by the academic administrators of federal and state universities in South East, Nigeria, in dealing with work stress.

Conclusions

Based on the findings of the study, the following conclusions were drawn:

- Academic administrators of federal and state universities in South East, Nigeria, are exposed to several factors that induce them to work stress, such as irregular receipt of salaries, lack of adequate resources needed to carry out their jobs, combination of academic and administrative duties, stagnation in promotion among others. These factors emanate from the uncomfortable environment in which they operate.
- The work stress experienced by academic administrators of federal and state universities in South East, Nigeria affect their health, emotions, behaviours and consequently negatively impacts on their job performance.
- The working environment of federal universities contain more stress factors which consequently impact more on the job performance of the academic administrators of federal universities than those of state universities. This is because those from federal universities had higher mean ratings in their responses on the impact of work stress on job performance than those of state universities.
- Academic administrators of universities in South East Nigeria experience work stress which negatively impacts on their job performance irrespective of gender differences.
- Age differences among academic administrators of universities in South East Nigeria, does not predict the impact of work stress on their job performance.
- Work stress impacts equally on the job performance of academic administrators of universities in South East Nigeria, irrespective of how many years they have spent working in the universities.
- The academic administrators of universities in South East Nigeria with Ph.D degrees suffer more impact from stress on their job performance than those with masters degrees.

- Academic administrators of federal and state universities in South East Nigeria adopt various stress management strategies in dealing with work stress.

Educational Implications of the findings

The findings of this study have far-reaching educational implications for the academic administrators of universities, management of the universities, and the federal and state governments. The results have provided empirical evidence with regards to demographic variables and work stress among academic administrators of universities.

The study has shown that academic administrators of both federal and state universities suffer from stress arising from factors such as lack of adequate resources, irregular receipt of salaries, combining academic and administrative responsibilities, stagnation in promotion, demand of official work on their private time, pressure of meeting up with the semester calendar, lack of funds to conduct research in their areas of specialization, pressure to attend workshops, conferences and seminars, among others. This goes a long way to portray the unfriendly environment and poor working conditions in which the academic administrators operate. If nothing is done to arrest the situation by the management of federal and state universities, there will be serious problems which can translate into inability to attain the aims and objectives of the universities. Thus, best performance can only be elicited from the academic administrators if an enabling environment is created for them.

The study revealed that the academic administrators are exposed to work stress which adversely impacts on their job performance in various ways, such as: burnout, which reduce their efficiency at work, loss of memory which make them get involved in workplace accidents, sleep difficulties which make them unable to respond quickly to demands placed on them, high costs of healthcare which dampens their zest for performance, forgetting important things which render them incapable of meeting up with work schedules, among others. This implies a red flag

for the university management, to devise appropriate measures towards ameliorating this ugly trend. Failure to do this could compromise the health of these academic administrators, make them deviate from normal functioning, thereby jeopardizing academic activities in the universities.

The findings of the study showed that work stress impacted more on the job performance of academic administrators of federal universities than those of state universities. This implies that the educational environment of the federal universities contain policies and practices that hinder the maximum performance or efficiency of the academic administrators. If nothing is done to remedy this situation, it may go a long way to hinder teaching, learning and research in federal universities.

The findings of the study that work stress does not impact differently on the job performance of both male and female academic administrators implies that the gender of the academic administrators would not be an important factor to be considered in the appointment of lecturers to various faculties, departments and institutes as deans, heads and directors. This will go a long way in reducing favouring or overworking one gender against the other.

The finding that work stress does not impact differently on the job performance of academic administrators based on age implies that competence and ability would be the basis of appointment to offices and assigning responsibilities and not age.

The findings that work stress does not impact differently on the job performance of academic administrators based on work experience, implies that if appointments and responsibilities are assigned on the basis of ability, competence and resilience to pressure, with no emphasis on the years of experience, it will help to checkmate the impact of work stress and will also encourage the upward mobility of hard working and young academic staff.

The result that work stress impacts differently on the job performance of academic administrators based on educational qualification, with Ph.D holders having more impact, implies that the Ph.D holders are overloaded with responsibilities and the university management has to increase the number of such degree holders to assuage the pressure mounted on the Ph.D holders already. Educational goals of the universities cannot be optimally realized if the number of Ph.D holders are in short supply, while the available ones are overloaded with responsibilities.

The findings of this study have exposed the stress management strategies that can be adopted in universities to deal with work stress. The implication is that, adoption of these stress management strategies and making them available through organizing seminars and workshops on stress management, will enable the academic administrators, other staff, students and even the entire university community to have knowledge of how to manage stressful situations in the universities.

Recommendations

Based on the findings of the study and the various implications which have been highlighted, the following recommendations are made:

1. Government and university management should continually motivate academic administrators and other lecturers by ensuring regularly payment of salaries, providing them with adequate resources needed to carry out their jobs, ensuring regular promotion of staff, providing adequate fund for the academic administrators and other lecturers to carry out researches in their various areas of specialization. Staff welfare should take priorities when establishing faculties, departments, directorates/ institutes in the universities for effective performance of their duties.
2. University management should put in place effective welfare scheme for staff (especially federal universities since they suffered more from the impact of work stress). Regular

payment of salaries, regular promotion as at and when due, research grants, and other welfare packages are recommended so as to elicit optimum performance from the academic administrators and other academic staff.

3. The prevention and management of work stress requires institutional level interventions since it is the institution that creates the stress. Thus, university management should endeavour to promote an awareness of health knowledge in their institutions. Induction courses or stress management seminars and workshops on the impact of work stress, as well as the strategies for coping with work stress should be regularly organized by the university management for academic administrators and other lecturers using experts in physical health, social workers, guidance counsellors and stress management experts, The stress management strategies exposed by this study should also be explored in this regard.
4. More academic staff should be employed by both federal and state governments to reduce the excessive responsibilities placed on the shoulders of the academic administrators (especially Ph.D holders). This will help to counter the impact of the stress emanating from performance of both academic and administrative responsibilities.
5. University management should build relaxation centres such as staff clubs, maintain and equip them well with all kinds of relaxation gadgets and recreation facilities for the academic administrators and other lecturers (where they do not exist), In universities where these relaxation centers already exist, university management should renovate and refurbish them. This will enable the academic administrators to unwind when they are burnt out at work, keep them healthy and foster interpersonal relationships among them.

Limitations of the study

A study of this nature would not have been completed without experiencing some hitches. A limitation of this study was that out of the 786 questionnaire administered, only 745

were retrieved, making the study to suffer attrition of 41 respondents. This is because some of the respondents refused to fill the questionnaire on the grounds that they were very busy and had no time to give their responses. Some collected the instrument but travelled thereafter and therefore could not respond to them before the data were compiled and analyzed. This accounted for the inability to retrieve the instrument from 41 respondents, which may have affected the findings.

Suggestions for further research

Based on the findings of this study, the following areas are suggested for further research:

1. The study can be replicated in universities in other geopolitical zones of Nigeria: South South, North East, North Central, for the purpose of generalization.
2. A study can be conducted on the Comparism of work stress, demographic variables and job performance among lecturers in public and private universities in South East, Nigeria.
3. A research can be carried out on gender, age and work experience as predictors of work stress among academic administrators of universities in South East Nigeria.

Summary of the study

The study investigated demographic variables and work stress among academic administrators of universities in South East Nigeria. Seven research questions and five null hypotheses guided the study. Review of literature related to the study was done under the lenses of conceptual framework, theoretical framework, review of empirical studies and summary of literature review. The gap established from the review showed that investigating demographic variables and work stress among academic administrators of universities, especially in South East Nigeria, is not only necessary but imperative.

The study adopted the ex-post facto research design. The study was carried out in South East Nigeria. The population consisted of all the 786 academic administrators of all the ten

public universities in South East Nigeria, made up of five federal and five state owned universities. All the 786 academic administrators were used as sample for the study, thus, there was no sampling of the population. The instrument for data collection was a researcher developed questionnaire tagged 'Demographic Variables and Work stress Questionnaire (DVWSQ)'. The instrument was face-validated by three experts, two from Educational Administration and Planning, and one from Measurement and Evaluation, all from Faculty of Education, University of Nigeria, Nsukka. The experts gave their comments and suggestions on the construction and content of the instrument, bearing in mind the problems being investigated in the study. To determine the internal consistency estimate of the instrument, a trial-testing of the instrument was done with 30 academic administrators from one federal and one state university in Rivers State, South South, Nigeria, which is outside the study area. The internal consistency of the instrument was determined using Cronbach alpha, which yielded the reliability estimate of 0.85 for part 1, 0.90 for part 2 and 0.83 for part 3 respectively. The overall reliability index of the instrument was 0.90, indicating that the instrument was reliable for the study. Data generated from the study were analyzed using mean and standard deviation in answering the research questions, while Analysis of Variance (ANOVA) and t-test statistics were used in testing the hypotheses. Each of the hypotheses was tested at 0.05 level of significance. The findings that emanated from the study are summarized below.

The findings of the study revealed that the factors that induce work stress among academic administrators of federal and state universities in South East, Nigeria, include: irregular receipt of salaries, lack of adequate resources needed to carry out their jobs, combining academic responsibilities with administrative duties, demand of official work on their private time, attending meetings that take up too much time, stagnation in promotion, among others.

The findings also revealed that work stress impacts on the job performance of academic administrators through: burnout which reduces their efficiency at work, loss of memory which makes them get involved in workplace accidents, sleep difficulties which makes them unable to respond quickly to demands placed on them, difficulties in concentration leading to aggressiveness to staff and students, forgetting important things which render them incapable of meeting up with work schedules, among others.

There is a significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on institutional ownership, with federal universities having a higher mean rating.

There is no significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on gender.

There is no significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on age.

There is no significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on work experience.

There is a significant difference between the mean ratings of academic administrators of universities with regard to the impact of work stress on job performance based on educational qualification, with Ph.D holders having a higher mean rating.

The findings showed that academic administrators of federal and state universities adopt the following stress management strategies in dealing with work stress: engaging in regular exercises, getting adequate sleep, taking vital medications, having positive view of situations, seeking help from a mentor, delegating responsibilities to subordinates, allocating time to specific tasks according to their degree of importance, among others.

Based on the findings of the study, some recommendations were made which include: university management should endeavour to promote an awareness of health knowledge in their institutions. Induction courses/stress management seminars and workshops on the impact of work stress, as well as the strategies for coping with work stress should be regularly organized for academic administrators and other lecturers using experts in physical health, social workers, guidance counselors, and stress management experts. More academic staff should be employed to reduce the excessive responsibilities placed on the shoulders of the academic administrators (especially Ph.D holders), as this will help to counter the impact of the stress emanating from performance of both academic and administrative responsibilities, among others.

REFERENCES

- Aboho, D.A., & Ođkwu, E. (2013). Education in Nigeria: Challenges for the future. *Multidisciplinary Journal of Research and Development*, 1 (1) 44-46.
- Adamji, S.S. (2013). Influence of higher educational qualifications and gender on the administrative competence of career administrators in universities in the North Central zone of Nigeria. (*Unpublished doctoral dissertation*), University of Nigeria Nsukka.
- Adebiyi, D. R. (2011). Prevalence of stress among university of Ado-Ekiti lecturers. (*Unpublished doctoral dissertation*). Ekiti State University, Ado-Ekiti, Nigeria.
- Adeoye, A.O. & Okonkwo, E. N. (2010). Gender and school types as factors responsible for job stress in Nigeria universities. *Edo Journal of Counselling*, 3(2), 220-228.
- Adeyemo, D.A., & Ogunyemi, B. (2005). Emotional intelligence and self-efficacy as predictors of occupational stress among academic staff in a Nigerian University. Retrieved 15th August, 2010 from www.weleadlearning.org.
- Afianmagbon, B.E., Igbineweka, V.O., & Nwokocha, L.K. (2010). Managing Challenges of university administrators in a period of climate change. (*Conference Proceedings*), Nigerian Association for Educational Administration and Planning (NAEAP), 315-322.
- Aftab, M., & Khatoon, T. (2012). Demographic differences and occupational stress of secondary school teachers. *European Scientific Journal*, 8 (5), 159-175.
- Agbonaye, A.J. & Osarumwense, O.R. (2015). Job stress: A calamitous threat to job satisfaction of administrators in Edo State public universities. *Journal of Educational Policy and Entrepreneurial Research*, 6(4), 21-30.
- Agboeze, M.U., & Nwankwo, E.A. (2013). Indigenous communities and community development in South East Nigeria: principles, challenges and prospects. Paper presented at the 14th Annual International Conference of Home Economics Research Association of Nigeria (HERAN), held at the University of Nigeria, Nsukka, 18th-21st. September.
- Ahmad, S.Z. & Salim, F.A.A. (2009). Sources of stress and the coping mechanisms for Malaysian entrepreneurs. *Asia Journal of Entrepreneurship and Sustainability*. (Referred Edition).
- Ahmed, S.M., Lemkau, J.P., & Hersberger, P.J. (2011). Psychosocial influences on health. In R.E. Rakel. (Ed): *Textbook of Family Medicine* (8th Ed). Philadelphia: Elsevier Saunders Publishers.
- Ainabor, A.E., Ainabor, S.A. & Ehimi, O. C. (2009). Gender equality: A panacea for good governance and socio-economic development in Nigeria. Paper presented at the 8th

National Conference of National Association for Research and Development (NARD), held at Auchi polytechnic, Auchi, 5th - 9th October.

- Aja-Okorie, U. (2010). Gender and environmental protection in Nigeria: Implications for family education. (*Conference Proceedings*), Nigerian Association for Educational Administration and Planning (NAEAP), 181-188.
- Ajayi, I.A., & Adamu, B.J. (2012). Stress management among heads of departments in Nigerian colleges of education. Retrieved 17th July, 2012 from <http://conference.pixel-online.net/...92-SE30-fp-Ajayi-FOE2012.pdf>
- Akinboye, J.O., Akinboye, D.O., & Adeyemo, D.A. (2002). *Coping with stress in life and workplace*. Lagos: Stirlin-Horden Publishers (Nig) Ltd.
- Akomolafe, C.O. (2005). Principals' time management abilities in secondary schools in Nigeria. *Journal of Educational Administration and Planning*, 5(1), 58-67.
- Akpochafo, G.O. (2012). Perceived sources of occupational stress among primary School teachers in Delta State of Nigeria. *Education, Summer*, 132 (4), 826-833.
- Akper, G.I., Gire, T.T., & Orshi, A. (2007). Gender as a challenge to educational development in Nigeria. *Journal of Women in Academics*, 4(1), 316-324.
- Akubue, F.N., & Okolo, A.N. (2008). *Sociology of Education*. Nsukka: Great AP Express Publishers Ltd.
- Akuezuilo, E.O. (2002). *Research and statistics in education and social sciences: methods and applications*. Academic Press Ltd.
- Alabi, A.T., Murtala, A.T., & Lawal, A.A. (2012). Lecturers' work stress and job performance in Kwara State Colleges of Education, Nigeria. In A.A. Adegoke (Ed.) *Global practices in teacher education*. Education faculties in West Africa (CEFWA), 71-77.
- Alexandros-stamatios, G.A., Matilyn, J. D., & Cary, L.C. (2003). Occupational stress, job satisfaction and health state in male and female junior hospital doctors in Greece. *Journal of Managerial Psychology*, 18, (6), 592-621
- Ali, A. (2006). *Conducting research in education and the social sciences*. Enugu: Tashiwa.
- Aliu-Chatta, M.B. (2008). Reforms in women and gender studies in education. *Nigerian Journal of Sociology of Education (NJSE)*, 11 (2), 285-288.
- Al-Omar, B.A. (2003). Sources of work stress among hospital staff in Saudi Arabia. *Journal of King Saud University*, 17, (1), 3-16.
- Amadi, V.A. (1999). Coping with stress for human capacity utilization. Paper presented at the 23rd Annual Conference of the Counselling Association of Nigeria, University of Lagos.

- American Psychological Association (APA) (2013). Gender and stress. Retrieved on the 25th of April, 2013 from <http://www.apa.org/news/press/releases/stress/gender-stress.aspx>
- Ametefe, G.T.D., & Ametefe, M.D. (2007). Repositioning women education for national development in the 21st century. *Journal of Research and Development*, 8 (5), 68-73.
- Anao, A.R, (2011). The management of universities: roles and responsibilities. In F. Hayi., E, Oshio., & Okojie, J. (Eds). *Critical issues in university governance in Nigeria* Lagos: Malthouse Press Limited.
- Anisman, H., & Merali, Z. (1999). Understanding stress: Characteristics and caveats. *Alcohol Research and Health*, 23, 241-250.
- Antonio, A.S., Polychroni, F., & Vlachakis, A.N. (2006). Gender and age differences in occupational stress and professional burnout between primary and high-school teachers in Greece. *Journal of Managerial Psychology*, 21, (7), 682-690.
- Anyakoha, E.U. (2013). *Advancing a framework for showcasing family concerns: Challenging the challenges* (Inaugural lecture series 28). Nsukka: University of Nigeria, Nsukka
- Archibong, I.A., Bassey, A.O., & Effiom, D.O. (2010). Occupational stress sources among university academic staff. *European Journal of Educational Studies*, 2 (3), 217-225.
- Arikewuyo, M.O. (2010). University management and staff unions in Nigeria: issues and challenges. *SA Educational Journal*, 3(1), 15-22.
- Ashley, D. (2008). Stress levels in higher education way above recommended levels. Retrieved 23rd April, 2013 from <http://www.ucu.org.uk/index.cfm?articleid=3647&from=2988>
- Atindanbila, S.(2011). Perceived stressors of lecturers at the university of Ghana. *Journal of Emerging Trends in Educational Research and Policy Studies (JETERAPS)*, 2 (5), 347-354.
- Auerbach, S. & Gramling, S.E.(2003). *Stress psychology*. New York: McGraw-Hill Book Company.
- Azikiwe, U. (2002). Gender issues and the universal basic education programme. *The Nigerian UBE Journal*, 1(2), 371-378.
- Babu, H. (2007). How does stress affect a person? Retrieved 18th April, 2013 from <http://www.lesstress.net/stress-affect-a-person.htm>
- Bada, F.O. & Falana, B.A. (2013). Gender influence on the stress experience of university lecturers. *European Journal of Business and Social Sciences*, 62, (4) 537-544.
- Balakrishnamurthy, C. & Shankar, S. (2009). Impact of age and level of experience on occupational stress experienced by non-gazetted officers of the central reserve police force. *Industrial Pyschiatry Journal*, 18 (2), 81-83.

- Barrera, M. (2000). Social support research in community psychology. In J. Rappaport and E. Seidman (Eds.), *Handbook of community psychology*, (215-245). New York, NY: Kluwer Academic/Plenum Publishers.
- Bashir, S., Khan, S., Qureshi, M.I., Qureshi, M.E., & Khan, W. (2013). Impact of demographic variables on perceived sources of occupational stress among Gomal University teaching staff. *Journal of Education and Practice*, 4, (16), 18-30.
- Batista-Taran, L.C., & Reio, T.G. (2011). Occupational stress: Towards an integrated model. In M.S. Plathotnik., S.M. Nielson., & D.M. Pane (Eds.). (*Conference Proceedings*), 10th Annual College of Education Research Conference, Miami: Florida International University. (pp. 9-16).
- Beatty, P.T., & Burroughs, L. (1999). Preparing for an ageing workforce: The role of higher education. *Educational Gerontology*, 25 (6), 595-611
- Bellingrath, S., Weigl, T., & Kudieka, B. (2009). Chronic work stress and exhaustion is associated with higher allostatic load in female school teachers. *Stress*, 12 (1), 37-48.
- Bello, M.B. (2014). Social institutions. In S. Oni (ed.). *Essentials of sociology of education*. Ibadan, Nigeria: His Lineage Publishing House.
- Besong, F.E., Udo. D.E., & Ogbe, H.O. (2011). The influence of principals leadership styles on administration of secondary schools in Cross River State, Nigeria. *Nigerian Journal of Educational Administration and Planning (NAEAP)*, 11 (4), 179-191.
- Bittman, B. (1999). Stress begins at an early age: before you might imagine. Retrieved 27th November, 2002 from <http://www.mind-body.org/stress%20early%20age.htm>.
- Blaug, R., Kenyon, A., & Lekki, R. (2007). Stress at work: A report prepared for the Work Foundation's Principal Patners London: The Work Foundation. Retrieved 13th July, 2013 from <http://www.theworkfoundation.com>
- Bower, J.E., & Segerstrom, S.C. (2004). Stress management, finding benefit and immune function: Positive mechanisms for intervention effects on physiology. *Journal of Psychosomatic Research*, 56 (1), 9-11
- Braun, M., & Mohler, P. P. H. (2002). Background variables. In J.A. Harknes., F.J.R. Van De Vijer., & P.P.H. Mohler (Eds.). *Cross-cultural survey methods*. New York: John Wiley.
- Braveman, P., & Egerter S. (2008). ñOvercoming obstacles to health: Report from the Robert Wood Johnson Foundation to the Commission to Build a Healthier America, Washington, D.C: Robert Wood Johnson Foundation.
- Bridger, R., Kilminster, S., & Slaven, g. (2006). Managing occupational strain in the naval service 1994-2004). *Journal of Occupational Medicine*, 57, 92-97.

- Brown, Z.A., & Uehara, D.L. (2008). Coping with teacher stress: A research synthesis for pacific resources for education and learning. Retrieved 29th June, 2009 from <http://www.prel.org/products/>.
- Buller, J.F. (2007). *The essential academic dean: A practical guide to college leadership*. U.S.A: Jossey-Bass.
- Burke, R.J. (2002). Work stress and women's health: occupational status effects. *Journal of Business Ethics*, 37, 91- 102
- Campbell, J.P. (1990). Modelling the performance prediction problem in industrial and organizational psychology. In M.D. Dunnette., & L.M. Hough (Eds.). *Handbook of industrial and organizational psychology*. California: Consulting Psychologists Press.
- Caple, R. (2001). Biofeedback and stress management clinic. Retrieved October, 19, 2002 from <http://web.missouri.edu/~councwww/stress/stresswebpage.htm>
- Chandran, L. (2013). Stress management. Retrieved 25th September, 2014 from www.slideshare.net/...Loshychandran/...
- Chandra, A., & Sharma, B.R. (2010). Predictors of occupational stress: An exploratory study. *Indian Journal of Industrial Psychiatry*. 46 (2), 300-312.
- Chaudrhry, A.Q. (2012). The relationship between occupational stress and job satisfaction: The case of Pakistani Universities. *International Education Studies* 5(3), 212-221.
- Chatuverdi, M., & Purushotamam. T. (2009). Coping behavior of female teachers: Demographic determinants. *Industrial Psychiatry Journal*, 18, (1), 36-38.
- Chiaha, G.T.U., Eze, J.U., & Ezeudu, F.O. (2013). Education students's access to e-learning facilities in universities in South-East of Nigeria. *Information and Knowledge Management*, 3(10), 32-41.
- Chima, E.A. (2003). *Business administration and management: An integrated approach*. Nsukka, Nigeria: Centre For Research Development and Consultancy Services.
- Chochalingam, V. (2002). Absenteeism and measures of job performance: A meta-analysis. *International Journal of Selection and Assessment*, 10 (1), 12-17.
- Clarke, S., & Cooper, C.L. (2004). *Managing the risk of workplace stress*. London: Routledge.
- Clifford, S.D.O. (2005). Job aversion, personality and anxiety as correlates of occupational stress of secondary school teachers in Delta State. (*Unpublished doctoral dissertation*) Delta State University, Abraka, Nigeria.
- Cohen, S., Frank, E., Doyle, W.K., Skoner, D.P., Rabin, B.S., & Gwaltney, J.M. (1998). Types of stressors that increase susceptibility to the common cold in healthy adults. *Health Psychology*, 17 (3), 211-21.

- Cooper, C.L. (2000). *Theories of stress*. Oxford: Oxford University Press.
- Cooper, C.L., Dewey, P.J., & Michael, D.P. (2001). *Organizational stress: A review and critique of theory, research and applications*. California: Sage Publishers.
- Cole, G.A. (2002). *Management: Theory and practice*. London: Letters Educational Aldine Place.
- Coleman, V. (2000). *Overcoming stress*. (4th Ed.) London: Sheldon Press.
- Colligan, T.W., Colligan, M.S.W., & Higgins, M. (2006). Workplace stress-etiology and consequences. *Journal of Workplace Behavioural Health*. 21 (2), 89-97.
- Conley, S., & Woosley, S.A. (2000). Role stress, higher order needs and work outcomes. *Journal of Educational Administration*, 38 (2), 179-201.
- Conway, M. & Dobson, I.R. (2003). Fear and loathing in university staffing. The case of Australian academic and general staff. *Journal of Higher Education Management and Policy*, 15(3), 123-133.
- Conway, P.M. (2005). Working conditions, work-related health and intent to leave the profession among Italian qualified nurses: results from the European nurses early exit. (Unpublished doctoral dissertation), University of Milan, Italy.
- Conway, P.M., Campanini, p., Sartori, S., Dotti, R., & Costa, G. (2008). Main and interactive effects of shiftwork, age and work stress on health in an Italian sample of healthcare workers. *Journal of Applied Ergonomics*. (39), 630-639.
- Costa, G. (2003). Factors influencing health and tolerance to shift work: Theoretical issues. *Ergonomics Science*, 4, 263-288.
- Costa, G., & Sartori, S., (2007). Ageing, working hours and work ability. *Ergonomics*. 50, (11), 1914-1930.
- Cote, S., & Miners, C.T.H. (2006). Emotional intelligence, cognitive intelligence and job performance. *Administrative Science Quarterly* 51 (1), 1-28.
- Davies, R.H. (2008). *Stress and the organization*. California: California Press
- Dee, Y. (2012). Does academic qualification ensure success? Retrieved 8th April, 2014 from <http://thelifeofantonym.blogspot.com/2012/04/does-academic-qualific...>
- Ebong, J.M. and Ihenacho, G.U. (2010). Education and management of climate change in the Niger Delta Region: The role of the school administrator. (Conference Proceedings), Nigerian Association for Educational Administration and Planning (NAEAP), pp 157-160.

- Edem, D.A. (2006). *Introduction to educational administration in Nigeria*. Ibadan, Nigeria: Spectrum Books Limited.
- Edwards, R.D. (2013). What are the signs and symptoms of poorly managed stress? Retrieved 18th, April, 2013 from <http://www.medicinet.com/stress/page3.htm>
- Egbe, C.I. (2011). Combined effects of mnemonics and gender on students' achievement in English stress patterns. *International Journal of Educational Research*, 11 (1), 48-58.
- Egu, H.N., Ememe, O.N., Obike, N.C. & Obiuto, C.U. (2014). Managing stress among lecturer in Polytechnics in South Eastern Nigeria. *Mediterranean Journal of Social Sciences*, 5 (6), 333-338.
- Ejue, J.B. (2013). Comparison of occupational stress among academics in federal and state universities in Nigeria. *Research in Education*, 89 (2), 85-89.
- Ekundayo, H.T. & Aayi, I.A. (2009). Towards effective management of university education in Nigeria. *International NGO Journal*, 4(8), 342-347.
- Ekundayo, H.T., Konwea, P.E., & Yusuf, M.A. (2010). Towards effective time management among lecturers in Nigerian universities. *Journal of Emerging Trends in Educational Research and Policy Studies*, 1(1), 22-24.
- Erez, A., & Judge, T.A. (2001). Relationship of core self- evaluations to goal setting, motivation and performance. *Journal of Applied Psychology*, 86 (6), 1270-1279.
- Erkutu, H.V., & Chafra, J. (2006 OR 2010). Relationship between leadership power bases and job stress of subordinates: example from boutique hotels. *Journal of Management Research News*, 29 (5), 285-297.
- Essien, I.E. (2010). Stress management differentials among principals of public and private secondary schools in Akwa Ibom State. (*Unpublished doctoral dissertation*). University of Uyo, Nigeria.
- Ezeani, L.U. (2006). Women education: Rationable objectives and principle. In S.P.T. Gbaimanja & D.A. Aboho (Eds). *Emerging issues in education of the special target group*. Onitsha: West and Solomon Publishing Coy Ltd.
- Fairbrother, K., & Warn J. (2003). Workplace dimensions, stress and job satisfaction. *Journal of Managerial Psychology*, 18 (1), 8-21.
- Faith, C.C., & Tesluk S. (2012). Emotional intelligence, teamwork effectiveness and job performance. *Journal of Applied Psychology*, 97 (4), 890-900.
- Faragher, E.B., Cass, M., & Cooper, C.L. (2005). The relationship between job satisfaction and health: A meta-analysis. *Occupational and Environmental Medicine*, 62 (2), 105-112.

- Fawole, J.O. (2006). Stress: the etiology of most health problems. *Nigerian School Health Journal*, 18 (1), 9-19.
- Federal Republic of Nigeria (FRN), (2004). *National Policy on Education*. Lagos. NERDC Press.
- Fevre, M.L., Matherney, J., & Kolt, G.S. (2003). Eustress, distress and interpretation in occupational stress. *Journal of Managerial Psychology* 18, 726-744.
- Finkelstein M., Kubzansky, I.D., Capitman, J., & Goodman, E. (2007). Socioeconomic differences in adolescent stress: The role of psychological resources. *Adolescent Health*, 40 (2), 127-134.
- Fomby, P., & Cherlin, A.J. (2007). Amily instability and child well being. *American Sociological Review*, 72, 181-204.
- Ford, S. (2004). Workplace stress: environmental and individual factors. Retrieved 11th April, 2013 from <http://www.psychology.org.au/publications/inpsych/stress/>
- French, J.R.P., Rodgers, W.L., & Cobb, S. (1974). Adjustments as person-environment fit. In Coelho, G., Hamburg, D., & Adams, J. (eds.) *Coping and adaptation*. New York: Basic Books.
- Galanakis, M., Stalikas, A., Kallia, H., Karagiani, C. & Karela, C. (2009). Gender differences in experiencing occupational stress: The role of age, education and marital status. *Stress and Health*, 25, 397-404.
- Gallow, L.C. & Matthews, K.A. (2003). Understanding the association between socioeconomic status and physical health: Do negative emotions play a role? *Psychological Bulletin*. 129 (1), 10-15.
- Gandapur, S.F., & Rehman, R. (2008). Gender differences in the prevalence of occupational stress among Gomol University teaching staff. *Educational Review*, 15 (2), 246-264.
- Garner, B.A. (2009). *Black's law dictionary* (9TH ed.) U.S.A: West Publishing Co.
- Garrosa, E., Jimenez, B.M., Liang, Y., & Gonzalez, J.L. (2006). The relationship between socio-demographic variables, job stressors, burnout and hardy personality in nurses: An exploratory study. *International Journal of Nursing Studies*, 45 (3), 418-427.
- Gary, M.A. (2012). A quantitative examination whether education mitigates stress levels among law enforcement officers. Retrieved 23rd April, 2013 from <http://gradworks.uni.com/35/16.56161.html>
- Getzels, J. W. & Guba, E.G. (1957). Social behavior and the administrative process. *The School Review*, 65 (4), 423-441.

- Graham, C. (2013). Changing technologies, changing identities: A case study of professional staff and their contributions to learning and teaching. *Policy and Practice in Higher Education*, 17 (2), 62-70.
- Greenberg , J.S. (2002). *Comprehensive stress management*. New York: McGraw Hill.
- Hall, L. (2000). *Principles and practice of business administration*. Oxford: Elbs Publishers.
- Hakala, D. (2008). 16 ways to measure employee performance. Retrieved 15th july, 2014 from <http://www.hrworld.com/eatures/16-ways-measure-performance-02/908/>
- Happell, B., Martin, T., & Pinikahana, J. (2003). Burnout and job satisfaction: A comprehensive study of psychiatric nurses from forensic and a mainstream mental health service. *International Journal of Mental Health Nursing*, 12, 39-47.
- Hardy, M. (2013). Benefits of earning a college degree. Retrieved 24th April, 2013 from http://education.yahoo.net/articles/benefits_of_higher_education.htm
- Harris, R.B., Harris, K.J., & Harvey, P. (2008).An examination of the impact of supervisor on the relationship between job strain and turnover intention for computer workers. *Journal of Applied Social Psychology*, 38 (8), 2108-2131.
- Hashim, C.N., & Kayode, B.K. (2010). Stress management among administrators and senior teachers of private Islamic school. *Journal of Global Business Management*, 6 (2), 1-7.
- Hasselhorn, H.M., Tackenberg, P., & Peter, R. (2003). Working conditions and intent to leave the profession among nursing staff in Europe. Working life Research Report no 7, National Institute for Working Life, Stockholm
- Hawkey, L.C. and Caciopopo, J.T. (2004). Stress and the aging immune system. Retrieved 8th April, 2013 from <http://www.ncbi.nlm.nih.gov/pmc/articles/PMC2805089/>
- Health and Safety Executives (HSE) (2005). *Tackling stress: The management standards approach*. London: Health and Safety Executives.
- Hodgson, G.M. (2006). What are institutions? *Journal of Economic Issues*, 40 (1),
- Hornby, A.S. (2001). Oxford Advanced Learners dictionary (6th ed.) Oxford University Press.
- Husain, A. (2010). Occupational stress and job performance. Retrieved 4th April, 2014 from articlesbase.com/occupational.stress.job.performance-2495418.hti.
- Ibe, U.O., & Obidua, M.A. (2013). Resolution strategies adopted in resolving marital disharmony among couples in Enugu State. Paper presented at the 14th Annual International Conference of the Home Economics Research Association of Nigeria (HERAN) held at Princess Alexandra Auditoriu University of Nigeria, Nsukka. 18th - 21st September.

- Ibia, A.J. (2006). Principals' maintenance practice and the state of educational facilities in secondary schools in Uyo Senatorial District. (*Unpublished master's thesis*). University of Uyo, Nigeria.
- Igbo, R.O. (2002). *Fundamentals of school management*. Enugu, Nigeria: Cheston Ltd.
- Ikeanyibe, O.M. (2009). *Principles and practices of personnel administration: A Nigerian perspective*: Perfect Image.
- Ivancevich, J.M., & Matteson, M.T. (2000). *Organizational behavior and management*, 5th Ed. New York: McGraw-Hill
- Jaiyeoba, A.O. & Jibril, M.A. (2008). Sources of occupational stress among secondary school administrators in Kano State, Nigeria. *African Research Review*, 2 (3), 116-129.
- Jepson, E. & Forrest, S. (2006). Individual contributory factors in teacher stress. The role of achievement striving and occupational commitment. *British Journal of Educational Psychology*, 76, 183-197.
- Johannsen, S.E. (2011). An analysis of the occupational stress factors identified by certified teachers. Retrived 10th August, 2013 from <http://hdl.handle.net/10518/3842>.
- Johnson , S., Cooper, C., Cartwright, S., Donald, I., Taylor, P.J., & Millet, C. (2005). The experience of work-related stress across occupations. *Journal of Managerial Psychology*, 20 (2), 178-187.
- Jones, F. & Fletcher, B.C. (1999). Occupational stress. In D. Messer & K. Jones (eds). *Psychology in social care*. London: Jessica Kingsley.
- Kahn, R.L. (2001). *Organizational stress: Study in role conflict and role ambiguity*. New York: John Wiley and Sons.
- Khan, W. & Igbal, Y. (2013). An investigation of the relationship between work motivation (intrinsic and extrinsic) and employye engagement: A study on Allied Bank of Pakistan. (*Unpublished masters thesis*). Umea University, Sweden.
- Kazmi, R., Amjad, S., & Khan, D. (2008). Occupational stress and its effect on job performance: A case study of medical house officers of District Abbottabad. *Journal of Ayub Medical College Abbottabad*, 20 (3), 135-139.
- Kelderman, E. (2009). Colleges press new ideas as they brace for bumpy state-budget sessions. *Chronicle of Higher Education*, 55 (18), 18.
- Keshavarz, M. & Mohammadi, R. (2011). Occupational stress and organizational performance. Case study: Iran. *Social and Behavioural Sciences* 30 (3), 390-394
- Khanka, S.A, (2000). *Organizational behaviour*. New Delhi: S. Chand and Company.

- Kiel, R.M.K. (2004). Coping and stress: a conceptual analysis. *Journal of Advanced Nursing*, 48 (6), 659-665.
- Kirch, W. (2008). *Encyclopedia of public health*. Massachusetts: Klower Academic Publishers.
- Khurshid, F., Butt, Z.U., & Malik, S.F. (2011). Occupational role stress of the public and private sector university teachers. *Language in India*, 11, (8), 353-36.
- Klassen, R.M., & Chiu, M.M. (2010). Effects on teachers' self-efficacy and job satisfaction: teacher gender, years of experience, and job stress. *Journal of Educational Psychology* 102, (3), 741-756.
- Koolhaas, J. (2011). Stress revisited: A critical evaluation of the stress concept. *Neuroscience and Behavioural Reviews*, 35(5), 1291-1301.
- Koopmas, L., Bernaads, C.M., Hildebrandt, V.H., Schaufeli, W.B., DeVet, C.W & Vanderbeek, A.J. (2011). Conceptual frameworks of individual work performance: A systematic review. *Journal of Occupational and Environmental Medicine*, 53(8), 856-866.
- Korgba, G.T. (2011). *University management in Nigeria*. Ibadan: Spectrum Books.
- Kuo, H.M. (2009). Understanding relationships between academic staff and administrators: an organizational culture perspective. *Journal of Higher Education Policy and Management*, 31(1), 43-54.
- Kupriyanov, R. & Zhdanov, R. (2014). The eustress concept: Problems and outlooks. *World Journal of Medical Sciences*, 2 (2), 117-185.
- Kuttyta, J. (2015). Delegation of authority. Retrieved 13th of January, 2015 from Jacobkuttyta.hubpages.com/Delegation
- Kyriacou, C.(2001). Teacher stress: Directions for future research. *Educational Review*, 53 (1), 27-35.
- Lam, N., Tobias, B. and Bahaudin, M. (2012). Leadership and stress orientations of Germans; An examination based on gender, age and government work experience. *Public Organization Review*, 1 (4), 401-420.
- Larson, K., & Swierzewski, S.J. (2007). Stress overview, types of stress, risk factors. Retrieved 18th April, 2013 from <http://www.healthcommunities.com/stress/overview-types-of-stress-ri...>
- Lau, P.S.Y., Yuen, M.T., & Chan, R.M.C. (2005). Do demographic characteristics make a difference to burnout among Hong Kong secondary school teachers? *Social Indicators Research*, 71, 491-516.

- Lazaridou, A., Reppa, A.A., & Fris, J. (2008). Stress among Greek and Cypriot university administrators: an exploratory study. *Journal of Higher Education Policy and Management*, 3 (1), 87-98.
- Lazarus, R.S. (1996). *Psychological stress and the coping process*. New York: McGraw-Hill.
- Lazarus, R.S., & Folkman, S. (1984). *Stress appraisal and coping*. New York: Springer Verlag Publishers..
- Lee, M. (2009). Age and stress. Retrieved 4th August, 2013 from <http://www.turn-stress-into-bliss.com/age-and-stress.html>
- Legender, A., & Kraft, P. (2003). Control constructs: Do they mediate the relation between educational attainment and health behavior? *Journal of Health Psychology*, 8, 361-372.
- Levey, R.E. (2001). Sources of stress for residents and recommendations for programmes to assist them. *Academic Medicine*, 76 (2), 142-150.
- Lezard, T. (2011). Stress levels get higher in higher education. Retrieved 23rd April, 2013 from <http://union-news.co.uk/2011/11/stress-levels-get-higher-in-higher-education/>
- Liu, Y., & Zhu, B. (2009). Numerical analysis and comparism on stress between male and female academic faculty in Chinese universities. *European Journal of Educational Studies*, 2 (3), 210-225.
- Lohithaksham, P.M. (2007). *Dictionary of Education: A practical Approach*. New Delhi: Kinishka Publishers.
- Logan, E. (2012). University staff deal with above-average stress levels. Retrieved 23rd April, 2013 from <http://www.journal-online.co.uk/article/9426-university-staff-deal-wit...>
- Lox, C., Martin Ginis, K., Petruzzello, S. (2006). *The psychology of exercise: Integrating theory and practice* (2nd ed.). Scottsdale, AZ: Holcomb Hathaway.
- Luthans, F. (2000). *Organizational behaviour. (11th Ed.)*. New Delhi: McGrawhill Inc.
- Maduakolam, A.E. (1998). *Occupational stress: Counselling the workers for survival*. Enugu: Academic Publishing Company.
- Maduewesi, B.U. (2005). *Benchmarks and global trends in education*. Benin-City: Dasylya Influence Enterprises.
- Mahmood, A., Zamir, S., Nudrat, S., & Zahoor, F. (2013). Impact of age and level of experience on occupational stress of academic managers at higher education level. *Mediterranean Journal of Social Sciences*, 4(1), 535-541.
- Manshor, A.T. (2003). Occupational stress among managers: A Malaysian survey. *Journal of Managerial Psychology*, 18(6), 622-628.

- Maree, C. (2000). Defining administrators and new professionals. *Perspectives*, 4(1), 4-5.
- Marmot, M. (2006). *Social determinants of health*. New York: Oxford University Press.
- Matud, M.P. (2004). Gender differences in stress and coping style. *Personality and Individual Differences*, 37 (7), 1410-1415.
- Maslach, C. (2003). *Job burnout: the cost of caring*. Eaglewood Cliffs, New Jersey: Prentice Hall.
- McEwen, B.S. (2004). *Protective and damaging effects of the mediators of stress and adaptation: Allostasis and allostatic load*. New York: Cambridge University Press.
- Mckay, A. (2004). Sexual health education in schools in Canada: A review of behavior and cost effective intervention. *Canadian Journal of Human Sexuality*, 13 (3), 129-141.
- McMillan, H.S., & Morris, L.M. (2007). Demographic correlates in occupational stress compensable injuries. Retrieved 27th August, 2013 from [cstl-hcb.semo.edu/é /McMillan Morris ...](http://cstl-hcb.semo.edu/é/McMillan%20Morris...)
- Mcshane, S., & Glinow, M.V. (2003). *Organizational behaviour*. New York: McGraw-Hill.
- Mba, I. (2012). Management problems of university education in Nigeria, *Nigerian Journal of Research and Production*, 20(1), 94-106.
- Mbipom, G. (1999). *Proposals the for effective administration of education in the 21st century*. Calabar: Rapid Educational Publishers.
- Merrill, A.G., Pope, J.E., Anderson, D.R., Coberley, C.R., Grossmeier, J.J., & Whitner, R.N. (2013). Self-rated job performance and absenteeism according to employee engagement, health behaviours and physical health. *Journal of Occupational and Environmental Medicine*, 55 (1), 8-10.
- Mgbekem, S.J.A. (2004). *Management of university education in Nigeria*. Calabar: University of Calabar Press.
- Mgbodile, T.O. (2003). Principles of educational administration. In T.O. Mgbodile (ed.) *Fundamentals in educational administration and planning*. Enugu: Magnet Enterprises.
- Michaillidis, M., & Asimenos, A. (2002). *Occupational stress as it relates to higher education individuals and organization*. New York: IOS Press.
- Michie, S. (2002). Causes and management of stress at work. *Journal of Occupational and Environmental Medicine*, 59 (1), 67-72.
- Miller, W.C. (1999). Fitness and fatness in relation to health: Implications for a paradigm shift *Journal of Social Issues*, 55 (2), pp 207- 219.

- Mintzberg, H. (2001). Managing exceptionally. *Organization Science*, 6 (6), 759-771.
- Mirowsky, J., & Ross C .E (2007) *Encyclopedia of stress* (2nd Ed.). Academic Press.
- Mirowsky, J., & Ross, C.E. (2008). Education and self-rated health: Cumulative advantage and its rising importance. *Research on Ageing*, 30 (1), 93-122.
- Mkpa, M.A. (2005). Challenges of implementing curriculum in Nigeria. *Nigerian Journal of Curriculum Studies*, 12 (1), 9-7.
- Modebelu, M. N., & Onyali, L.C. (2011). Introducing creativity into university lecturers's administration of knowledge management competencies in Nigeria. *Nigerian Journal of Educational Administration and planning*, 11 (3), 91-104.
- Mokdad, M. (2005). Occupational stress among Algerian teachers. *African Newsletter on Occupational Health and Safety*, 15 (2), 46-47.
- Moorhead, G., and Griffin, R.W. (2001). *Organizational behaviours: Managing people and Organizations*. (5th Ed). New York: Houghton, Mifflin Company.
- Mundell, E. (2002). Relax! Aging puts stress in perspective. Retrieved December, 2012 from <http://www.cliving.org/stress.htm>
- Nasir, A. (2001). *Family health education (Medico-Islamic Approach)*. Ilorin: Al-Iklas Publishers.
- National Institute for Occupational Safety and Health (NIOSH) (1999). Work organization and stress-related disorders. Retrieved 29th January, 2013 from <http://www.cdc.gov/niosh/docs/99-101/>
- National Institute for Mental Health (NIMH) (2013). Mental health 2013: An important public health issue. Retrieved 15th August, 2014 from www.namigc.org
- National Population Commission (2006). Population and housing census priority table, volume iii. Population distribution by sex, LGA and Senatorial district, pp, 1-64.
- Nauert, R. (2010). Gender and age affect stress response. Retrieved 14th January, 2015 from <http://psychcentral.com/news/2010/03/24/gender-and-age-affect-stress-response/12357/html>
- Nelson, T.Q. (2009). Stress levels and sources of occupational stress among Psi Chi Faculty Advisors. (*Unpublished master's thesis*). Utah State University. U. S.A
- Netemeyer, R.G., Maxham, J.G., & Pulig, C. (2005). Conflicts in the work-family interface: Links to job stress, customer service employee performance and customer purchase intent. *Journal of Marketing*, 69(2), 130-143.

- NG, T.W.H., & Feldman, D.C. (2009). How broadly does education contribute to job performance? *Personnel Psychology*, 62(1), 89-134.
- Nkang, I. E. (2002). *Fundamentals in educational administration*. Uyo: Afahide Publishers Ltd.
- Nnabuife, E., Onyeizugbe, C., & Onwuka, E.M. (2012). Stress management and occupational performance among female lecturers in Nigeria. *African Journal of Social Sciences* 2 (3), 166-174.
- Nnuro, E.K. (2012). Occupational stress and its effects on job performance: A case of Koforidua Polytechnic. (*Unpublished master's thesis*). Kwame Nkrumah University of Science and Technology, Ghana.
- Noordin, F., & Jussof, K. (2009). Levels of job satisfaction amongst Malaysian academic staff. *Asian Social Science*, 5 (5), 122-128.
- Nwadiani, M., & Ofoegbu, F.I (2001). Perceived level of stress among first-timers in Nigerian Universities. *College Student Journal*, 35(1), 1-9.
- Nwadiani, M. & Akpotu, N.E. (2012). Academic staff turnover in Nigerian universities (1990-1997). *Education*, 123(2), 305-312.
- Nwafor, S.O. & Nwafor, N.H.A. (2010). *The role of universities in Rivers State, Nigeria*. NAEAP Conference Proceedings, pp 171-180.
- Nwaka, N.G. (2011). Curriculum changes and educational administration in Nigeria in the 21st century. In A.O.Abolade., C.M. Ogbodo., & B.U Maduewesi (Eds). *Contemporary Issues in Nigerian Education*. Onistha: West and Solomon Publishing Coy Ltd.
- Nworgu, B.G. (2015). *Educational research: Basic issues and methodology*. Nsukka: University Trust Publishers.
- Obi, E. (2003). *Educational management: Theory and practice*. Enugu: Jamoa Enterprises.
- Oboegulem, A.I. (2001). Strategies for managing stress among secondary school teachers in two Nigerian States. *International Journal of Educational Research (INJER)*, 5, 76-81.
- Oboegbulem, A.I. (2004). *Teacher stress and management*. Enugu: Magnet Business Enterprises.
- Oboegbulem, A.I. (2007). *Students stress, management and control strategies*. Nsukka: University Trust Publishers.
- Oboegbulem, A.I. (2008). Management of administrative related stress of academic heads of departments in Federal and State universities in South East Nigeria. *Journal of the Nigerian Academy of Education (JONAD)* 4(1), 93-112.

- Oboegbulem, A.I., & Onwurah, C. U. (2011). *Organization and management of Education: A Nigerian perspective*. Nsukka: Great AP Express Publishers Limited.
- Obunadike, J.C. (2007). Constraints to the possession of administrative and managerial skills for effective school management in Nigerian universities. *Nigerian Journal of Educational Administration and Planning*, 9, 44-48.
- Ocho, L.O. (2005). *Issues and concerns in education and life*. Enugu: Institute of Developmental Studies, University of Nigeria, Enugu Campus.
- Ofoegbu, F., & Nwadiani, M. (2006). Level of perceived stress among lecturers in Nigerian universities. *Journal of Instructional Psychology*, 33(1), 66-74.
- Ogbonnaya, N.O. (2000). *Foundations of education finance*. Nsukka: Hallman Publishers.
- Oghenetega, L.U., Ejedafiru, E.F., & Rabi, A.M. (2014). Comparative study of job stress among teaching staff of library and information science in higher institutions in Nigeria. *Journal of Education and Practice*, 5(16), 213-220.
- Ogunde, O.J.K. (2005). *Management and organization.: Theory and behavior*. Lagos: Molofin Nominees.
- Ogunu, M. (2010). *Introduction to educational management*. Benin-City Nigeria: Mabogun Publishers.
- Okagu, G.O. (2012). Management strategies for controlling students' disciplinary problems in universities in South East Nigeria (*Unpublished doctoral dissertation*). University of Nigeria, Nsukka.
- Okeke, B.S. (2002). Quality management and national goal attainment in education: The case of Nigeria. (*Inaugural Lecture Series 28*). Port Harcourt: University of Port Harcourt, Nigeria.
- Okore, A.M. (2011). Demographic and socio-economic attributes as determinants of information And communication technology use for scholarly communication in Nigerian Universities. *Library Philosophy and Practice*. Retrieved 20th December, 2014 from <http://unllib.unl.edu/LPP/>
- Okunamiri, P.O. (2008). Concepts of educational administration and management. In I.C. Anukam., P.O. Okunamiri., & R.N.O. Ogbonna (Eds). *Basic text in educational management*. Owerri: Chinashop Publishers.
- Olaleye, B.A. (2002). Psycho-social effects of job stress and burnout syndrome among nurses in state-owned hospitals in Oyo State. (*Unpublished masters thesis*). University of Ibadan, Nigeria.

- Olasumbo, O.A. (2007). Effective management of higher education: A panacea for quality assurance possibility. *Nigerian Journal of Educational administration and Planning*, 7, 391-395.
- Omoniyi, M.B.I. (2013). Sources of workplace stress among university lecturers in South West Nigeria: Implications for counseling.
- Omoniyi, M.B.I. & Ogunsami, J.O. (2012). Stress among academic staff in South West Nigeria. *The African Symposium*, 12 (1), 126-132.
- Onwurah, C. (2004). Discipline and discipline control in schools. In T.O. Mgbodile (ed). *Fundamentals in educational administration and planning*. Enugu: Magnet Business Enterprise. Pp, 275-287.
- Oraegbunam, N.M. (2004). Psychological and social bases of occupational stress among civil servants in Anambra State. (*Unpublished doctoral dissertation*), Nnamdi Azikiwe University, Awka, Nigeria.
- Osif, B.A. (2008). Stress management. *Journal of Library Administration and Management*, 22 (4), 211-215.
- Osuala, R.C., & Oguoma, C.C. (2012). Appraising gender differences in teacher attributes exhibited by chemistry teachers in Imo State secondary schools, *African Education Indices*, 4(1), 111-118.
- Otu, D.O. (2006). *Human resources management in education*. Lagos: National Open University of Nigeria.
- Paruk, N., & Singh, A.M. (2013). Managing employee stress in South African banks. *African Journal of Business Management*, 6 (15), 5369-5375.
- Pastorino, E., & Doyle, P.S. (2009). *What is psychology?* (2nd ed). Beilmont, California: Thompson Higher Education.
- Patterson, J. (2012). Occupational stress-key contributing factors. Retrived 11th April, 2013 From <http://www.positivehealth.com/article/stress/occupational-stress-key->
- Pearl, G. (2012). Gender differences in stress. Retrieved 25th of April, 2013 from <http://voices.yahoo.com/gender-diferences-stress-10865337.html>
- Pelletier, K.R. (1997). *Mind as healer, mind as slayer*. New York: Delta Publishers
- Peretomode, O. (2012). Work and stress among academic administrators of higher education institutions in Delta State. *European Scientific Journal*, 8(13), 29-46.
- Peretomode, V.F. (2001) (ed). *Introduction to educational administration, planning and supervision*. Lagos: Joja Educational Research and Publishers Ltd.

- Peretomode, V.F. (2003). *Educational administration, applied concepts and theoretical perspectives*. Lagos: Joja Educational Research and Publishers Ltd.
- Pidd, K. (2004). The impact of workplace support and identity on training transfer: A case study of drug and alcohol safety training in Australia. *International Journal of Training and Development*, 8 (4), 274-288.
- Pollard, M.S. & Morgan, S.P. (2002). Emerging parental gender indifference? Sex composition of children and the third birth. *American Sociological Review*, 67(4), 600-613.
- Provine, R.R. (1996). Laughter. *The American Scientist*, 84(1), 38-47.
- Raji, K. (2005). Students unrest in Nigerian Universities: Looking back and forward. *Journal of Social Science*, 10 (1), 17-22.
- Raitano, R.E. & Kleiner, B.H. (2004). Stress management, stressors and prevention measures. *Journal of Management News*, 27 (4), 32-38.
- Ramya, P. and Mallika. N. (2013). The impact of demographic variables on occupational stress among working women. *International Journal of Exclusive Management Research (IJEMR)*, 3 (1), 1
- Reeves, L. (2015). Skills needed for administrative jobs. Retrieved 5th March, 2015 from Everydaylife.globalpost/skills-needed-administrative-jobs-1148.html
- Restak, R. (2013). Laughter and the brain. Retrieved, 10th June, 2014 from <http://theamericanscholar.org/laughter-a...>
- Riggio, R.E. (2003). *Job stress in organizations*. New York: Prentice-Hall.
- Robbins, S.P. (2001). *Organizational behaviour*. Eaglewood Cliffs, N.j: Prentice Hall.
- Robert Wood Johnson Foundation (2009). Education matters for health. *Education and Health, Issue Brief 6*, September.
- Roesler, L.M. (2001). An analysis of stress symptoms and their relation to sex and age. Retrieved 4/8/2013 from <http://clearinghouse.missouriwestern.edu/manuscripts/293.php>.
- Sackey, J., Boahemaa, P., & Sanda, M.A. (2011). Relational impact of job stress on gender based managerial effectiveness in Ghanaian organizations. *World Academy of Science, Engineering and Technology*, 60, 2080-2089
- Saint, W. (2004). Higher education in Ethiopia: The vision, and its challenges. Boston College and Council for the Department of Social Sciences in Africa.
- Salami, S.O. (1994). Analysis of stress among lecturers and their coping methods. *Ilorin Journal of Education (IJE)*, 14 (1), 102-114.

- Salposky, R.M. (2004). *A guide to stress, stress-related diseases and coping strategies*. New York; W.H. Freeman Publishers.
- Sanjay, G. (2012). Why stress makes colds more likely. Retrieved 15th June, 2014 from thechart.blogs.cnn.com/2014/06/15/why-stress-makes-colds-more-likely/
- Saunders, W.B. (2007). *Dorland's Medical Dictionary for Health*. U.S.A: W.B. Saunder
- Schabracq, M.J., & Cooper, C.L. (2000). The changing nature of work and stress. *Journal of Managerial Psychology*, 15(3), 227-242.
- Schneider, J.R. (2006). Stress and gender. Retrieved 25th April, 2013 from <http://www.articletrader.com/self-improvement/stress-and-gender.html>
- Schultz, M.C., & Schultz, J.T. (2003). The effects of age on stress levels and its impact on overall performance. Retrieved April, 8, 2013 from <http://aabss.org/pers>
- Scottsdale, B. (2014). Academic director job description. Retrieved 27th July 2015 from Woman.thenest.com/academic-director-job-description
- Selye, H. (1936). *The stress of life*. New York: McGraw-Hill Book Company.
- Sherring, S., & Knight, D. (2009). An exploration of burnout among city mental health nurses. *British Journal of Nursing*, 18 (20), 1234-1240.
- Silver, H.F., Strong, R., & Perini, F. (2007). *The strategic teacher: Selecting the right research-based strategy for every lesson*. Alexandria, VA: ASCD Books.
- Smith, A. (2007). Lecturers report high levels of stress. Retrieved 23rd, April, 2013 from <http://www.guardian.co.uk/education/2007/jan/26/highereducation.uk1>
- Somer, E. (2007). Stress and diet. In A. Monat., R.S. Lazarus., & G. Reevy (Eds). *The praeger handbook on stress and coping*, Westport, C.T. US: Praeger, 509-527.
- Stanford University Bulletin (2014). *Centers, laboratories and institutes*. U.S.A: Stanford University Press.
- Storey, J. and Billingham, J. (2001). Occupational stress and social work. *Social Work Education*, 20 (6), 659-670.
- Sturman, M.C. (2000). Times and job performance: A three-part study examining the relationship of job experience, organizational tenure and age with job performance. New York: Centre for Advanced Human Resources Studies.
- Sulaiman. F.R., and Akinsanya, P.O. (2011). Stress and instructors' efficiency in Ogun State universities: Implications for Nigerian educational policy. *International Journal of Psychology and Counselling*, 3(1), 9-14.

- Swent, B. (2001). How administrators cope with stress. *Theory into Practice*, 22 (1), 70-74.
- Szekeres, J. (2011). Professional staff carve out a new space. *Journal of Higher Education, Policy and Management*, 33(6), 679-691.
- Taiwo, B.M. (2005). Organizational climate, work stress and lecturers's job performance in Nigerian colleges of education. (*Unpublished doctoral dissertation*). University of Ilorin, Nigeria.
- Taylor, L. (2008). At the heart of the higher education debate: Stress levels fall. Retrieved 23rd April, 2013 from <http://www.timeshighereducation.co.uk/402888.article>
- Telfair, J., & Shelton, T.L. (2012). Educational attainment as a determinant of health. *North Carolina Medical Journal (NCMJ)*, 3 (5), 358-365.
- Thong, J.Y.L., & Yap, C.S (2000). Information systems and occupational stress: A theoretical framework. *The International Journal of Management Science*, 28, 6, 681-692.
- Thomas, A., Matherne, M.M., Buboltz, W.C., & Doyle, A.I. (2012). Coping resources, moderate stress-strain and stress-satisfaction relationships in educational administrators. *Individual Differences Research*, 10 (1), 250-261.
- Triantoro, S., Othman, A., & Wahab, M.N.A (2012). Gender, academic rank, employment status university type and job stress among university academic between staff: A comparison Malaysia and Indonesia Indonesia context. *International Journal of Technology Management*, 1(18), 57-70
- Tubre, T.C., Arthur, W.J., & Benneth, W.J. (2006). General models of job performance: and practice. In W. Benneth., C.E. Lance., & D.J. Woeler (Eds.). *Performance measurement: current perspectives and future challenges*. New Jersey: Lawrence Erlbaum Associates Publishers. Pp, 175-203.
- Turner, H.A., & Turner, R.J. (2005). Understanding variations in exposure to social stress. *Interdisciplinary Journal for the Social Study of Health, Illness and Medicine*, 9 (2), 209-240
- Udo, A. A. (2002). Job satisfaction and performance of academic and non-academic staff in the University of Uyo. (*Unpublished master's thesis*). University of Uyo, Nigeria.
- Ugoji, E.I., & Isele, G. (2009). Stress management and corporate governance in Nigerian organizations. *European Journal of Scientific Research*, 27 (3), 472-478.
- Ugwu, D.I. (2013). Bank employees level of strain-related work-family conflict base on Location. Paper presented at the 14th Annual International Conference of Home Economics Research Association of Nigeria (HERAN), held at the University of Nigeria, Nsukka, 18th-21st. September.

- Ugwuagu, D.N. (2006). Development and validation of stress coping strategies for secondary school principals in Enugu State. (*Unpublished doctoral dissertation*). University of Nigeria, Nsukka.
- Ukeje, B.O. (2000). Education in Nigeria. In A.B. Fafunwa., & J.U. Asike (Eds). *Education in Africa: A comparative survey*. London: George Allen and Unwin.
- Ukhun, C.E., & Asekhauno, A.A. (2011). Feminism and gender equality: A perspectivistic review of barriers on nature and culture among the Etsako of Nigeria. *Jalingo Journal of African Studies*, 11(1), 112-127.
- Ukpai, U.E. (2002). Work stress and job satisfaction among principals of secondary schools in Akwa Ibom State. (*Unpublished master's thesis*). University of Uyo, Nigeria.
- Ulrich, C. (2000). Management of stress evidenced by college women in situations involving competition. *American Association of Health and Physical Education*, 25 (1), 160-192.
- Venagas, G., Axelsson, S.B., & Vanagiene, V. (2004). Do age,gender and marital status influence job strain development for general practitioner? *Journal of Medicine, Kaunas University, Lithuania*, 40, (10), 1014-1018.
- Veenstra, G. (2000). Social capital and health: An individual-level analysis. *Social Science and Medicine* 50, 619-630.
- Viernes, S.R.M.O.P., & Guzman, A.B.D. (2005). Filipino teachers's experience of supportive relationships with colleagues: A narrative- biographical inquiry. *Asia Pacific Education Review*, 6 (2), 137-142.
- Viswesvaran, C., Schmidt, F., & Ones D.S (2005). Is there a general factor in ratings of job performance? A meta-analytic framework for disentangling substantive and error influences. *Journal of Applied Psychology*, 90 (1), 108- 131.
- Wadsworth, E.J., Simpson, S.A., Moss, S.C., & Smith, A.P. (2003). The Bristol stress and health study: Accidents, minor injuries and cognitive failures at work. *Journal of Occupational Medicine*, 53 (6), 392-397.
- Wiggins, T. (2001). Stress and administrative role in educational organizations *Journal of Educational Research*, 82 (21), 120-125.
- Williams, S., & Cooper, L. (2002). *Managing workplace stress- a best practice blueprint*. West Essex, London: John Wiley and Sons, Ltd.
- Wiley, C. (2000). A synthesis of research on the causes, effects and reduction strategies of teacher stress. *Journal of Instructional Psychology*, 27 (2), 1-9.
- Wilson, G. S., Pritchard, M. E., & Ravalee, B. (2005). Individual differences in adolescent health symptoms: The effects of gender and coping. *Journal of Adolescence*, 28, 369-379.

- Winefield, A.H., & Jarret, R. (2001). Occupational stress in university staff. *International Journal of Stress Management*, 8 (4), 285-298.
- Wolfolk, A. (2010). *Educational Psychology*. New Jersey: Pearson.
- Wolfolk, R.L., & Lehrer, P.M. (2004). *Principles and practice of stress management*. New York: Guiliford Press.
- World Health Organization (WHO) (2002). Mainstreaming gender equity in health: The need to move forward. Geneva: World Health Organization.
- World Health Organization (WHO) (2012). Gender and women's health. Geneva: Retrieved 25th April, 2013 from http://www.who.it/mental_health/prevention/genderwomen/en/
- Yates, J.E. (1999). *Managing stress*. New York: AMACOM Publishers.

APPENDIX A

LETTER OF INTRODUCTION TO THE RESPONDENTS

Faculty of Education,
Department of Educational Foundations,
University of Nigeria,
Nsukka.
10th January, 2015.

Dear Sir/Madam,

I am a postgraduate student of the Faculty of Education, Department of Educational Foundations, University of Nigeria, Nsukka, carrying out a research work on ñDemographic variables and work stress among academic administrators of universities in South East Nigeriaò. As an Academic Administrator, you are at an advantaged position to supply the needed responses.

I humbly request that you fill this questionnaire to enable me carry out the research work effectively. The information elicited from you will be used for academic purposes only, and will be treated with utmost confidentiality. Your sincere response is therefore highly solicited.

Thanks for your anticipation cooperation.

Yours Faithfully,

Nwosu Patience. O.
Researcher.

APPENDIX B
QUESTIONNAIRE ON DEMOGRAPHIC VARIABLES AND WORK STRESS AMONG
ACADEMIC ADMINISTRATORS OF UNIVERSITIES IN SOUTH EAST NIGERIA.

SECTION A

DEMOGRAPHIC INFORMATION

Please tick () or complete as applicable

- (1) Institutional ownership: Federal () State ()
- (2) Educational qualification: Masters () Ph.D ()
- (3) Gender: male () female ()
- (4) Age: 30-40 () 41-50 () 50 and above ()
- (5) Work experience: Below 10 years () above 10 years ()

SECTION B:

PART 1: Factors that induce work stress among academic administrators.

In items 1-18 indicate how you agree that the following items induce you to work stress.

Options:

SA = Strongly Agreed = 4 points

A = Agreed = 3 points

D = Disagreed = 2 points

SD = Strongly Disagreed = 1 point

S/N	Item Description: factors that induce work stress among academic administrators	SA	A	D	SD
	The following factors usually induce me to work stress:				
1	Irregular receipt of salaries.				
2	Lack of adequate resources needed to carry out my job.				
3	Combining academic responsibilities with administrative duties.				
4	Pressure of meeting up with the semester calendar.				
5	Making decisions that affect the lives of my staff and students.				
6	Dealing with students' disciplinary problems.				
7	Supervising the tasks of staff members.				
8	Demand of official work on my private time.				
9	Using my official time for private interests.				

		SA	A	D	SD
10	Pressure to complete reports, memos and other communications.				
11	Having my work frequently interrupted by staff members who want to be attended to.				
12	Attending meetings that take up too much time.				
13	Stagnation in promotion.				
14	Pressure of having the required publications for promotion				
15	Lack of funds to conduct research in my area of specialization.				
16	Pressure to attend workshops, conferences and seminars.				
17	Resolving differences among staff members.				
18	Resolving differences among students				

PART 11: Ways work stress impact on academic administrators's job

Performance.

In clusters A, B, C and D, indicate how you agree that each of the following items impact on your job performance.

	Cluster A: Health challenges.	SA	A	D	SD
	When I am under stress at work:				
19	I experience burnout which reduces my efficiency at work.				
20	I usually suffer loss of memory which makes me get involved in workplace accidents.				
21	I am prone to heart diseases such as high-blood-pressure which reduces my ability to do my job.				
22	I often suffer headaches and muscle pains which hinder my job performance.				
23	I suffer gastro-intestinal diseases such as diarrhea which makes me achieve less in my job performance.				
24	I experience eating disorders such as loss of appetite which lowers my strength for work.				
25	I experience sleep difficulties such as insomnia which makes me unable to respond quickly to demands placed on me.				
26	I resort to alcoholic beverages leading to loss of focus in the performance of my job.				
27	I usually incur high costs of health care which dampens my zest for performance in my job.				
	Cluster B: Job tension				
28	I feel tensed which reduces my ability to do my work.				
29	I experience difficulties in concentration leading to aggressiveness to staff and students.				
30	I find it difficult to communicate effectively with my staff leading to serious misunderstandings.				
31	I am unable to complete tasks on time due to frequent mood swings.				

		SA	A	D	SD
32	I find it difficult to make decisions that affect the lives of my staff and students.				
33	I am often late to important appointments that have to do with my job.				
34	I often make careless mistakes in the course of performing my job.				
35	I often forget important things which render me incapable of meeting up with my work schedules.				
	Cluster C: Low morale/ low job satisfaction				
36	I usually experience low morale which reduces my ability to perform my job.				
37	I experience loss of interest in my job which reduces my motivation for task accomplishments.				
38	I am often absent from office and classes due to loss of interest in my job.				
39	I am unable to perform my supervisory role on my staff due to low morale in my job.				
40	I often desire to quit my job due to feelings of dissatisfaction.				
41	Low morale in my job negatively affects my staff members in their job performance.				
	Cluster D: Poor work relationships				
42	I often shout and yell at my staff which hampers their confidence in their job performance.				
43	I find it difficult to delegate responsibilities to my subordinates which increases my workload.				
44	I often withdraw to myself leading to loss of sense of responsibility in my job.				
45	I am predisposed to blaming others which erodes staff morale for productivity.				
46	I find it difficult to listen to my subordinate which obstructs team work.				
47	I find it difficult to express appreciation to my staff which lowers their commitment to their jobs.				
48	I am often intolerant of the mistakes of my staff which hinders their creativity at work.				

PART 111: Stress management strategies employed by academic administrators
in dealing with work stress.

In clusters A, B and C, indicate how you agree that each of the following items is effective in managing work stress.

	I usually employ the following strategies in managing stress at work:	SA	A	D	SD
S/N	Cluster A: physiological Strategies.				
49	Engaging in regular exercises.				
50	Use of meditation/ relaxation techniques.				
51	Getting adequate sleep.				
52	Listening to music/singing.				
53	Eating balanced diet.				
54	Going for clinical counseling				
55	Taking vital medications				
56	Discontinuing the use of alcoholic beverages and narcotics.				
	Cluster B: Cognitive/Psychological Strategies.				
57	Having positive view of situations.				
58	Engaging in recreational or leisure activities.				
59	Cultivating a sense of humour (laugh often).				
60	Use of prayers and keeping faith in God.				
61	Sharing feelings with trusted friends.				
62	Relying on supportive colleagues.				
63	Seeking help from a mentor.				
	Cluster C: Interpersonal /organizational management Strategies.				
64	Respecting the feelings of colleagues, staff and students.				
65	Demonstrating leadership by example.				
66	Showing empathetic understanding to subordinates.				
67	Allowing close relationships to occur among self, staff and students.				
68	Ensuring effective communication with colleagues, staff and students.				
69	Expressing feelings instead of bottling them up.				
70	Delegating responsibilities to subordinates.				
71	Involving staff members in decision making.				
72	Avoiding scheduling too many appointments.				
73	Allocating time to specific tasks according to their degree of importance.				
74	Avoiding procrastinations.				
75	Keeping and maintaining a stress diary.				

APPENDIX C

COMPUTATION OF TRIAL TESTING

Reliability of the Instrument

[DataSet.3]

Part 1

Case Processing Summary

		N	%
Cases	Valid	30	96.8
	Excluded ^a	1	3.2
	Total	31	100.0

a. Listwise deletion based on all variables in the procedure.

Reliability Statistics

Cronbach's Alpha	N of Items
.853	25

RELIABILITY

```

/VARIABLES=item26 item27 item28 item29 item30 item31 item32 item33 item3
4 item35
/SCALE('ALL VARIABLES') ALL
/MODEL=ALPHA.

```

Part II

Cluster A

Case Processing Summary

		N	%
Cases	Valid	30	96.8
	Excluded ^a	1	3.2
	Total	31	100.0

a. Listwise deletion based on all variables in the procedure.

Reliability Statistics

Cronbach's Alpha	N of Items
.785	10

```

RELIABILITY
  /VARIABLES=item36 item37 item38 item39 item40 item41 item42 item43 item4
4 item45
  /SCALE('ALL VARIABLES') ALL
  /MODEL=ALPHA.

[DataSet3]

```

Cluster B

Case Processing Summary

		N	%
Cases	Valid	30	96.8
	Excluded ^a	1	3.2
	Total	31	100.0

a. Listwise deletion based on all variables in the procedure.

Reliability Statistics

Cronbach's Alpha	N of Items
.779	10

```

RELIABILITY
  /VARIABLES=item46 item47 item48 item49 item50 item51 item52
  /SCALE('ALL VARIABLES') ALL
  /MODEL=ALPHA.

```

Reliability

[DataSet3]

Cluster C

Case Processing Summary

		N	%
Cases	Valid	30	96.8
	Excluded ^a	1	3.2
	Total	31	100.0

a. Listwise deletion based on all variables in the procedure.

Reliability Statistics

Cronbach's Alpha	N of Items
.849	7

RELIABILITY

```

/VARIABLES=item53 item54 item55 item56 item57 item58 item59
/SCALE('ALL VARIABLES') ALL
/MODEL=ALPHA.

```

Reliability

[DataSet3]

Cluster D

Case Processing Summary

		N	%
Cases	Valid	30	96.8
	Excluded ^a	1	3.2
	Total	31	100.0

a. Listwise deletion based on all variables in the procedure.

Reliability Statistics

Cronbach's Alpha	N of Items
.723	7

RELIABILITY

```

/VARIABLES=item26 item27 item28 item29 item30 item31 item32 item33 item3
4 item35 item36 item37 item38 item39 item40 item41 item42 item43 item44 it
em45 item46 item47 item48 item49 item50 item51 item52 item53 item54 item55
item56 item57 item58 item59
/SCALE('ALL VARIABLES') ALL
/MODEL=ALPHA.

```

Overall Reliability for Part II

Case Processing Summary

		N	%
Cases	Valid	30	96.8
	Excluded ^a	1	3.2
	Total	31	100.0

a. Listwise deletion based on all variables in the procedure.

Reliability Statistics

Cronbach's Alpha	N of Items
.899	34

RELIABILITY

```

/VARIABLES=item60 item61 item62 item63 item64 item65 item66 item67
/SCALE('ALL VARIABLES') ALL
/MODEL=ALPHA.

```

Reliability

Part III

Cluster A

Case Processing Summary

		N	%
Cases	Valid	30	96.8
	Excluded ^a	1	3.2
	Total	31	100.0

a. Listwise deletion based on all variables in the procedure.

Reliability Statistics

Cronbach's Alpha	N of Items
.790	8

RELIABILITY

```

/VARIABLES=item68 item69 item70 item71 item72 item73 item74 item75 item76
/SCALE('ALL VARIABLES') ALL
/MODEL=ALPHA.

```

Reliability

[DataSet3]

Cluster B

Case Processing Summary

		N	%
Cases	Valid	30	96.8
	Excluded ^a	1	3.2
	Total	31	100.0

a. Listwise deletion based on all variables in the procedure.

Reliability Statistics

Cronbach's Alpha	N of Items
.786	9

RELIABILITY

```

/VARIABLES=item77 item78 item79 item80 item81 item82 item83 item84 item85
item86 item87 item88 item89 item90 item91 item92 item93
/SCALE('ALL VARIABLES') ALL
/MODEL=ALPHA.

```

Reliability

[DataSet3]

Cluster C

Case Processing Summary

		N	%
Cases	Valid	30	96.8
	Excluded ^a	1	3.2
	Total	31	100.0

a. Listwise deletion based on all variables in the procedure.

Reliability Statistics

Cronbach's Alpha	N of Items
.720	17

RELIABILITY

```

/VARIABLES=item60 item61 item62 item63 item64 item65 item66 item67 item6
8 item69 item70 item71 item72 item73 item74 item75 item76 item77 item78 it
em79 item80 item81 item82 item83 item84 item85 item86 item87 item88 item89
item90 item91 item92 item93
/SCALE('ALL VARIABLES') ALL
/MODEL=ALPHA.

```

Overall Reliability for Part III

[DataSet3]

Case Processing Summary

		N	%
Cases	Valid	30	96.8
	Excluded ^a	1	3.2
	Total	31	100.0

a. Listwise deletion based on all variables in the procedure.

Reliability Statistics

Cronbach's Alpha	N of Items
.830	34

RELIABILITY

```

/VARIABLES=item1 item2 item3 item4 item5 item6 item7 item8 item9 item10
item11 item12 item13 item14 item15 item16 item17 item18 item19 item20 item
21 item22 item23 item24 item25 item26 item27 item28 item29 item30 item31 i
tem32 item33 item34 item35 item36
item37 item38 item39 item40 item41 item42 item43 item44 item45 item46 item
47 item48 item49 item50 item51 item52 item53 item54 item55 item56 item57 i
tem58 item59 item60 item61 item62 item63 item64 item65 item66 item67 item
68 item69 item70 item71 item72
item73 item74 item75 item76 item77 item78 item79 item80 item81 item82 item
83 item84 item85 item86 item87 item88 item89 item90 item91 item92 item93
/SCALE('ALL VARIABLES') ALL
/MODEL=ALPHA.

```

Overall Reliability of the Instrument

[DataSet3]

Case Processing Summary

		N	%
Cases	Valid	30	96.8
	Excluded ^a	1	3.2
	Total	31	100.0

a. Listwise deletion based on all variables in the procedure.

Reliability Statistics

Cronbach's Alpha	N of Items
.904	93

APPENDIX D
POPULATION OF ACADEMIC ADMINISTRATORS OF UNIVERSITIES IN SOUTH
EAST NIGERIA.

	Name of institution	State	Ownership	No. of Deans	No. of H.O.Ds	No. of Directors.	Total
1	Abia State University, Uturu (ABSU)	Abia	State	10	56	21	87
2	Chukwuemeka Odumegwu Ojukwu University, Uli.	Anambra	State	10	44	5	59
3	Ebonyi State University, Abakaliki (EBSU)	Ebonyi	State	11	57	10	78
4	Enugu State University of Science and Technology (ESUT)	Enugu	State	9	44	9	62
5	Federal University of Science and Technology, Owerri (FUTO)	Imo	Federal	6	43	17	66
6	Federal University Ndufu-Alike, Ikwo (FUNAI)	Ebonyi	Federal	3	10	3	16
7	Imo State University, Owerri (IMSU)	Imo	State	10	64	10	84
8	Michael Okpara University of Agriculture, Umudike (MOUAAU)	Abia	Federal	12	58	8	78
9	Nnamdi Azikiwe University, Awka (UNIZIK)	Anambra	Federal	14	90	8	112
10	University of Nigeria, Nsukka (UNN)	Enugu	Federal	18	106	20	144
TOTAL				103	572	111	786

SOURCES: Personnel Services Departments/Academic Planning Units of the various universities 2013/2014 Academic Session.

APPENDIX E

OUTPUT OF DATA ANALYSIS

T-Test

Research Question 1

Group Statistics

	Instowners hip	N	Mean	Std. Deviation	Std. Error Mean
item1	Federal	397	2.8312	.81911	.04111
	State	348	2.6034	.75400	.04042
item2	Federal	397	2.8665	.65890	.03307
	State	348	2.9109	.73261	.03927
item3	Federal	397	2.8161	.57203	.02871
	State	348	2.5603	.80297	.04304
item4	Federal	397	2.8463	.71355	.03581
	State	348	2.9167	.80450	.04313
item5	Federal	397	2.7607	.74241	.03726
	State	348	2.9971	.77978	.04180
item6	Federal	397	2.8338	.65718	.03298
	State	348	2.7902	.71960	.03857
item7	Federal	397	2.7305	.64776	.03251
	State	348	2.5057	.70606	.03785
item8	Federal	397	3.0277	.61688	.03096
	State	348	3.0000	.74772	.04008
item9	Federal	397	2.5642	.76477	.03838
	State	348	3.0546	.80338	.04307
item10	Federal	397	2.8791	.63603	.03192
	State	348	2.8793	.73003	.03913
item11	Federal	397	2.8312	.70297	.03528
	State	348	2.6322	.73786	.03955
item12	Federal	397	2.6851	.63890	.03207
	State	348	2.6034	.70256	.03766
item13	Federal	397	2.8564	.57476	.02885

	State	348	2.5661	.73111	.03919
item14	Federal	397	2.7280	.60013	.03012
	State	348	2.6034	.75017	.04021
item15	Federal	397	2.7660	.53369	.02679
	State	348	2.6540	.72871	.03906
item16	Federal	397	2.7103	.75493	.03789
	State	348	3.0115	.83847	.04495
item17	Federal	397	2.5693	.66921	.03359
	State	348	2.7270	.78727	.04220
item18	Federal	397	2.7607	.67470	.03386
	State	348	2.7213	.73599	.03945
Totalstressfact	Federal	397	2.7846	.32276	.01620
	State	348	2.7621	.42901	.02300

Independent Samples Test

		Levene's Test for Equality of Variances		t-test for Equality of Means						
		F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference	
									Lower	Upper
item1	Equal variances assumed	1.909	.167	3.930	743	.000	.22779	.05797	.11399	.34158
	Equal variances not assumed			3.951	7.412E2	.000	.22779	.05765	.11461	.34097
item2	Equal variances assumed	2.378	.123	-.871	743	.384	-4.44208E-2	.05098	-1.44512E-1	.05567

	Equal variances not assumed			-.865	7.036E2	.387	-4.44208E- 2	.05134	-1.45220E-1	.05638
item3	Equal variances assumed	80.255	.000	5.051	743	.000	.25578	.05064	.15637	.35519
	Equal variances not assumed			4.944	6.173E2	.000	.25578	.05174	.15417	.35738
item4	Equal variances assumed	6.262	.013	-1.264	743	.207	-7.03191E- 2	.05562	-1.79505E-1	.03887
	Equal variances not assumed			-1.254	6.992E2	.210	-7.03191E- 2	.05606	-1.80378E-1	.03974
item5	Equal variances assumed	2.866	.091	-4.236	743	.000	-2.36421E- 1	.05582	-3.45998E-1	-.12684
	Equal variances not assumed			-4.222	7.195E2	.000	-2.36421E- 1	.05600	-3.46358E-1	-.12648
item6	Equal variances assumed	6.369	.012	.863	743	.389	.04352	.05045	-5.55216E-2	.14257
	Equal variances not assumed			.858	7.082E2	.391	.04352	.05075	-5.61216E-2	.14317
item7	Equal variances assumed	7.932	.005	4.530	743	.000	.22473	.04961	.12733	.32213

	Equal variances not assumed			4.504	7.095E2	.000	.22473	.04989	.12677	.32269
item8	Equal variances assumed	18.772	.000	.554	743	.580	.02771	.05002	-7.04834E-2	.12590
	Equal variances not assumed			.547	6.743E2	.585	.02771	.05065	-7.17365E-2	.12715
item9	Equal variances assumed	.702	.403	-8.528	743	.000	-4.90366E-1	.05750	-6.03251E-1	-.37748
	Equal variances not assumed			-8.500	7.194E2	.000	-4.90366E-1	.05769	-6.03623E-1	-.37711
item10	Equal variances assumed	10.573	.001	-.004	743	.997	-2.17146E-4	.05005	-9.84699E-2	.09804
	Equal variances not assumed			-.004	6.934E2	.997	-2.17146E-4	.05050	-9.93718E-2	.09894
item11	Equal variances assumed	8.001	.005	3.767	743	.000	.19905	.05283	.09533	.30277
	Equal variances not assumed			3.756	7.196E2	.000	.19905	.05300	.09499	.30311
item12	Equal variances assumed	5.434	.020	1.662	743	.097	.08169	.04915	-1.48089E-2	.17819

	Equal variances not assumed			1.652	7.069E2	.099	.08169	.04946	-1.54208E-2	.17880
item13	Equal variances assumed	66.795	.000	6.060	743	.000	.29033	.04791	.19627	.38439
	Equal variances not assumed			5.966	6.561E2	.000	.29033	.04866	.19478	.38589
item14	Equal variances assumed	32.884	.000	2.514	743	.012	.12451	.04952	.02729	.22173
	Equal variances not assumed			2.478	6.628E2	.013	.12451	.05024	.02586	.22316
item15	Equal variances assumed	37.592	.000	.258	743	.797	.01197	.04643	-7.91816E-2	.10313
	Equal variances not assumed			.253	6.283E2	.801	.01197	.04736	-8.10393E-2	.10498
item16	Equal variances assumed	1.421	.234	-5.159	743	.000	-3.01167E-1	.05838	-4.15781E-1	-.18655
	Equal variances not assumed			-5.123	7.039E2	.000	-3.01167E-1	.05879	-4.16584E-1	-.18575
item17	Equal variances assumed	11.498	.001	-2.956	743	.003	-1.57742E-1	.05337	-2.62509E-1	-.05297

	Equal variances not assumed			-2.925	6.850E2	.004	-1.57742E-1	.05394	-2.63641E-1	-.05184
item18	Equal variances assumed	6.771	.009	.763	743	.446	.03944	.05170	-6.20470E-2	.14093
	Equal variances not assumed			.759	7.093E2	.448	.03944	.05199	-6.26363E-2	.14152
Totalstr	Equal variances assumed	26.798	.000	.454	743	.650	.01255	.02762	-4.16761E-2	.06677
essfact	Equal variances not assumed			.446	6.389E2	.656	.01255	.02813	-4.26897E-2	.06779

Research Question 2 and Hypothesis 1

Group Statistics

	Instowners hip	N	Mean	Std. Deviation	Std. Error Mean
item19	Federal	397	2.7179	.84746	.04253
	State	348	2.7270	.72236	.03872
item20	Federal	397	3.2317	.88289	.04431
	State	348	2.8966	.76350	.04093
item21	Federal	397	3.0806	.77756	.03902
	State	348	2.9684	.76421	.04097
item22	Federal	397	2.8161	.80337	.04032
	State	348	2.6839	.72666	.03895

item23	Federal	397	2.8841	.88001	.04417
	State	348	2.6264	.63843	.03422
item24	Federal	397	3.1713	.86508	.04342
	State	348	2.7902	.73152	.03921
item25	Federal	397	2.8967	.78940	.03962
	State	348	2.6897	.68849	.03691
item26	Federal	397	2.8514	.83217	.04177
	State	348	2.7615	.68581	.03676
item27	Federal	397	3.2494	.79505	.03990
	State	348	3.2213	.75149	.04028
item28	Federal	397	2.7531	.78465	.03938
	State	348	2.7931	.71843	.03851
item29	Federal	397	2.5642	.70998	.03563
	State	348	2.6322	.66817	.03582
item30	Federal	397	2.9270	.83012	.04166
	State	348	2.9195	.78851	.04227
item31	Federal	397	3.4257	.56644	.02843
	State	348	2.6638	.70336	.03770
item32	Federal	397	2.4987	.77728	.03901
	State	348	2.6724	.63667	.03413
item33	Federal	397	2.3325	.72144	.03621
	State	348	2.6379	.66267	.03552
item34	Federal	397	2.3602	.73080	.03668
	State	348	2.6897	.67153	.03600
item35	Federal	397	2.8388	.55886	.02805
	State	348	2.7759	.73707	.03951
item36	Federal	397	2.4836	.50036	.02511
	State	348	2.2816	.45678	.02449
item37	Federal	397	2.5970	.49624	.02491
	State	348	2.6810	.55684	.02985
item38	Federal	397	2.3013	.50063	.02513
	State	348	2.2759	.44759	.02399
item39	Federal	397	2.5819	.49388	.02479

	State	348	2.6494	.56617	.03035
item40	Federal	397	2.4212	.63226	.03173
	State	348	2.1494	.67527	.03620
item41	Federal	397	2.5919	.52679	.02644
	State	348	2.6954	.53606	.02874
item42	Federal	397	2.9295	.26603	.01335
	State	348	2.3305	.82991	.04449
item43	Federal	397	2.8212	.39023	.01959
	State	348	2.2443	.81809	.04385
item44	Federal	397	2.8816	.33119	.01662
	State	348	2.2586	.84322	.04520
item45	Federal	397	2.3073	.46739	.02346
	State	348	2.2701	.65000	.03484
item46	Federal	397	2.7683	.42841	.02150
	State	348	2.2557	.80746	.04328
item47	Federal	397	2.5743	.50015	.02510
	State	348	2.2011	.76282	.04089
item48	Federal	397	2.5340	.50450	.02532
	State	348	2.1839	.70041	.03755
Totalstressimp	Federal	397	2.9564	.22002	.01104
	State	348	2.7409	.25154	.01348

Independent Samples Test

		Levene's Test for Equality of Variances		t-test for Equality of Means						95% Confidence Interval of the Difference	
		F	Sig.	T	Df	Sig. (2-tailed)	Mean Difference	Std. Error Difference		Lower	Upper
item19	Equal variances assumed	25.067	.000	-.157	743	.875	-.00913	.05812		-.12323	.10498

	Equal variances not assumed			-.159	7.424E2	.874	-.00913	.05752	-.12205	.10379
item20	Equal variances assumed	27.757	.000	5.504	743	.000	.33519	.06090	.21564	.45474
	Equal variances not assumed			5.557	7.429E2	.000	.33519	.06032	.21677	.45360
item21	Equal variances assumed	1.322	.251	1.981	743	.048	.11221	.05664	.00101	.22341
	Equal variances not assumed			1.983	7.334E2	.048	.11221	.05658	.00114	.22329
item22	Equal variances assumed	4.219	.040	2.343	743	.019	.13221	.05643	.02143	.24300
	Equal variances not assumed			2.358	7.423E2	.019	.13221	.05606	.02215	.24227
item23	Equal variances assumed	53.466	.000	4.519	743	.000	.25769	.05703	.14574	.36965
	Equal variances not assumed			4.612	7.186E2	.000	.25769	.05587	.14800	.36739
item24	Equal variances assumed	20.346	.000	6.442	743	.000	.38105	.05915	.26494	.49717

	Equal variances not assumed			6.513	7.421E2	.000	.38105	.05850	.26620	.49591
item25	Equal variances assumed	2.447	.118	3.790	743	.000	.20707	.05463	.09982	.31432
	Equal variances not assumed			3.824	7.430E2	.000	.20707	.05415	.10077	.31337
item26	Equal variances assumed	19.745	.000	1.595	743	.111	.08989	.05635	-.02072	.20051
	Equal variances not assumed			1.616	7.402E2	.107	.08989	.05564	-.01934	.19912
item27	Equal variances assumed	1.198	.274	.494	743	.622	.02811	.05691	-.08362	.13983
	Equal variances not assumed			.496	7.388E2	.620	.02811	.05670	-.08321	.13942
item28	Equal variances assumed	6.524	.011	-.721	743	.471	-.03995	.05540	-.14872	.06881
	Equal variances not assumed			-.725	7.416E2	.468	-.03995	.05508	-.14809	.06818
item29	Equal variances assumed	2.678	.102	-1.340	743	.181	-.06795	.05073	-.16753	.03163

	Equal variances not assumed			-1.345	7.392E2	.179	-.06795	.05052	-.16714	.03123
item30	Equal variances assumed	3.479	.063	.124	743	.901	.00741	.05955	-.10950	.12432
	Equal variances not assumed			.125	7.382E2	.901	.00741	.05935	-.10910	.12393
item31	Equal variances assumed	23.986	.000	1.636E1	743	.000	.76190	.04656	.67049	.85331
	Equal variances not assumed			1.613E1	6.653E2	.000	.76190	.04722	.66918	.85462
item32	Equal variances assumed	19.772	.000	-3.307	743	.001	-.17367	.05251	-.27676	-7.05890E-2
	Equal variances not assumed			-3.351	7.397E2	.001	-.17367	.05183	-.27543	-7.19168E-2
item33	Equal variances assumed	4.120	.043	-5.988	743	.000	-.30544	.05101	-.40557	-2.05301E-1
	Equal variances not assumed			-6.022	7.414E2	.000	-.30544	.05072	-.40502	-2.05858E-1
item34	Equal variances assumed	6.547	.011	-6.375	743	.000	-.32945	.05168	-.43091	-2.28001E-1

	Equal variances not assumed			-6.411	7.413E2	.000	-.32945	.05139	-.43034	-2.28563E-1
item35	Equal variances assumed	61.619	.000	1.322	743	.187	.06293	.04760	-.03052	.15638
	Equal variances not assumed			1.299	6.420E2	.195	.06293	.04845	-.03222	.15808
item36	Equal variances assumed	79.420	.000	5.725	743	.000	.20202	.03528	.13275	.27129
	Equal variances not assumed			5.760	7.418E2	.000	.20202	.03507	.13316	.27087
item37	Equal variances assumed	.877	.349	-2.179	743	.030	-.08406	.03858	-.15980	-8.31290E-3
	Equal variances not assumed			-2.162	7.007E2	.031	-.08406	.03888	-.16038	-7.73095E-3
item38	Equal variances assumed	99.562	.000	6.440	743	.000	.22540	.03500	.15669	.29410
	Equal variances not assumed			6.488	7.427E2	.000	.22540	.03474	.15719	.29360
item39	Equal variances assumed	5.193	.023	-1.740	743	.082	-.06756	.03884	-.14380	.00868

	Equal variances not assumed			-1.724	6.938E2	.085	-.06756	.03919	-.14450	.00938
item40	Equal variances assumed	1.214	.271	-6.849	743	.000	-.32827	.04793	-.42236	-2.34172E-1
	Equal variances not assumed			-6.819	7.152E2	.000	-.32827	.04814	-.42278	-2.33758E-1
item41	Equal variances assumed	3.691	.055	-2.653	743	.008	-.10346	.03900	-.18003	-2.68929E-2
	Equal variances not assumed			-2.650	7.268E2	.008	-.10346	.03905	-.18012	-2.68022E-2
item42	Equal variances assumed	8.588E2	.000	1.361E1	743	.000	.59901	.04402	.51259	.68543
	Equal variances not assumed			1.290E1	4.094E2	.000	.59901	.04645	.50770	.69032
item43	Equal variances assumed	3.769E2	.000	1.252E1	743	.000	.57691	.04608	.48645	.66736
	Equal variances not assumed			1.201E1	4.824E2	.000	.57691	.04803	.48253	.67128
item44	Equal variances assumed	6.294E2	.000	1.358E1	743	.000	.62299	.04589	.53290	.71308

	Equal variances not assumed			1.294E1	4.401E2	.000	.62299	.04816	.52834	.71764
item45	Equal variances assumed	44.160	.000	.904	743	.366	.03719	.04113	-.04356	.11794
	Equal variances not assumed			.885	6.210E2	.376	.03719	.04200	-.04530	.11968
item46	Equal variances assumed	2.774E2	.000	1.100E1	743	.000	.51251	.04658	.42108	.60395
	Equal variances not assumed			1.060E1	5.121E2	.000	.51251	.04833	.41756	.60747
item47	Equal variances assumed	68.269	.000	7.984	743	.000	.37316	.04674	.28140	.46491
	Equal variances not assumed			7.777	5.850E2	.000	.37316	.04798	.27892	.46739
item48	Equal variances assumed	14.550	.000	7.894	743	.000	.35010	.04435	.26303	.43716
	Equal variances not assumed			7.731	6.217E2	.000	.35010	.04529	.26117	.43903
Totalstress simp	Equal variances assumed	10.146	.002	8.424	743	.000	.14553	.01728	.11162	.17945

Equal variances not assumed			8.350	6.947E2	.000	.14553	.01743	.11131	.17975
--------------------------------------	--	--	-------	---------	------	--------	--------	--------	--------

Research Question 3 and Hypothesis 2

Group Statistics

	Gender	N	Mean	Std. Deviation	Std. Error Mean
item19	Male	493	2.7039	.78446	.03533
	Female	252	2.7570	.80542	.05084
item20	Male	493	3.0568	.84873	.03822
	Female	252	3.1076	.83927	.05297
item21	Male	493	3.0467	.77029	.03469
	Female	252	2.9920	.77970	.04921
item22	Male	493	2.7606	.77007	.03468
	Female	252	2.7450	.77377	.04884
item23	Male	493	2.7546	.79032	.03559
	Female	252	2.7809	.78217	.04937
item24	Male	493	2.9939	.82514	.03716
	Female	252	2.9880	.83178	.05250
item25	Male	493	2.7911	.74556	.03358
	Female	252	2.8167	.76307	.04816
item26	Male	493	2.8114	.76171	.03431
	Female	252	2.8048	.78341	.04945
item27	Male	493	3.2292	.76920	.03464
	Female	252	3.2510	.78788	.04973
item28	Male	493	2.7546	.74804	.03369
	Female	252	2.8088	.76634	.04837
item29	Male	493	2.5842	.68929	.03104
	Female	252	2.6175	.69651	.04396
item30	Male	493	2.9006	.81666	.03678
	Female	252	2.9641	.79669	.05029

item31	Male	493	3.0446	.73393	.03305
	Female	252	3.1195	.74944	.04730
item32	Male	493	2.6187	.71612	.03225
	Female	252	2.5060	.72316	.04565
item33	Male	493	2.5091	.69436	.03127
	Female	252	2.4104	.73955	.04668
item34	Male	493	2.5456	.71599	.03225
	Female	252	2.4502	.73247	.04623
item35	Male	493	2.8093	.64088	.02886
	Female	252	2.8048	.66162	.04176
item36	Male	493	2.3692	.48307	.02176
	Female	252	2.4303	.50410	.03182
item37	Male	493	2.6369	.51405	.02315
	Female	252	2.6375	.55139	.03480
item38	Male	493	2.3813	.48621	.02190
	Female	252	2.4263	.49553	.03128
item39	Male	493	2.6024	.52591	.02369
	Female	252	2.6375	.53669	.03388
item40	Male	493	2.4417	.68793	.03098
	Female	252	2.4202	.64374	.04063
item41	Male	493	2.6329	.54203	.02441
	Female	252	2.6574	.51588	.03256
item42	Male	493	2.6247	.67712	.03050
	Female	252	2.6972	.65418	.04129
item43	Male	493	2.5355	.69643	.03137
	Female	252	2.5857	.67796	.04279
item44	Male	493	2.5801	.70435	.03172
	Female	252	2.6135	.68561	.04328
item45	Male	493	2.2779	.55018	.02478
	Female	252	2.3147	.58012	.03662
item46	Male	493	2.5112	.68549	.03087
	Female	252	2.5657	.68019	.04293
item47	Male	493	2.3874	.66106	.02977

	Female	252	2.4263	.66749	.04213
item48	Male	493	2.3712	.62318	.02807
	Female	252	2.3705	.64044	.04042
Totalstressimp	Male	493	2.6736	.24852	.01119
	Female	252	2.6982	.24187	.01527

Independent Samples Test

		Levene's Test for Equality of Variances		t-test for Equality of Means						
		F	Sig.	t	Df	Sig. (2- tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference	
									Lower	Upper
item19	Equal variances assumed	.400	.527	-.865	743	.387	-.05312	.06138	-.17362	.06738
	Equal variances not assumed			-.858	4.915E2	.391	-.05312	.06191	-.17476	.06852
item20	Equal variances assumed	.034	.853	-.774	743	.439	-.05077	.06556	-.17949	.07794
	Equal variances not assumed			-.777	5.081E2	.437	-.05077	.06533	-.17912	.07757
item21	Equal variances assumed	.004	.948	.911	743	.363	.05462	.05998	-.06312	.17236
	Equal variances not assumed			.907	4.977E2	.365	.05462	.06021	-.06368	.17292
item22	Equal variances assumed	.100	.752	.261	743	.794	.01563	.05981	-.10178	.13304

	Equal variances not assumed			.261	5.010E2	.794	.01563	.05990	-.10206	.13332
item23	Equal variances assumed	.257	.612	-.431	743	.667	-.02631	.06107	-.14620	.09358
	Equal variances not assumed			-.432	5.077E2	.666	-.02631	.06086	-.14589	.09326
item24	Equal variances assumed	.175	.675	.091	743	.927	.00587	.06416	-.12008	.13181
	Equal variances not assumed			.091	4.996E2	.927	.00587	.06432	-.12051	.13224
item25	Equal variances assumed	.306	.580	-.440	743	.660	-.02566	.05827	-.14005	.08874
	Equal variances not assumed			-.437	4.929E2	.662	-.02566	.05871	-.14102	.08970
item26	Equal variances assumed	.808	.369	.110	743	.912	.00658	.05964	-.11050	.12365
	Equal variances not assumed			.109	4.908E2	.913	.00658	.06018	-.11167	.12483
item27	Equal variances assumed	.942	.332	-.362	743	.717	-.02179	.06014	-.13984	.09627
	Equal variances not assumed			-.359	4.926E2	.719	-.02179	.06061	-.14087	.09729
item28	Equal variances assumed	.015	.902	-.927	743	.354	-.05420	.05848	-.16902	.06061

	Equal variances not assumed			-.919	4.925E2	.358	-.05420	.05895	-.17002	.06162
item29	Equal variances assumed	.040	.841	-.622	743	.534	-.03335	.05364	-.13865	.07195
	Equal variances not assumed			-.620	4.985E2	.536	-.03335	.05382	-.13909	.07239
item30	Equal variances assumed	2.393E 0	.122	-1.012E0	743	.312	-.06353	.06281	-.18683	.05976
	Equal variances not assumed			-1.020E0	5.143E2	.308	-.06353	.06230	-.18593	.05886
item31	Equal variances assumed	2.129E 0	.145	-1.307E0	743	.192	-.07490	.05732	-.18742	.03763
	Equal variances not assumed			-1.298E0	4.939E2	.195	-.07490	.05771	-.18828	.03849
item32	Equal variances assumed	.150	.699	2.023	743	.043	.11269	.05571	.00331	.22206
	Equal variances not assumed			2.016	4.988E2	.044	.11269	.05589	.00288	.22249
item33	Equal variances assumed	1.107E 0	.293	1.794	743	.073	.09877	.05505	-.00930	.20683
	Equal variances not assumed			1.758	4.760E2	.079	.09877	.05619	-.01164	.20917
item34	Equal variances assumed	.361	.548	1.706	743	.088	.09544	.05595	-.01440	.20528

	Equal variances not assumed			1.693	4.931E2	.091	.09544	.05637	-.01531	.20619
item35	Equal variances assumed	.616	.433	.091	743	.928	.00455	.05024	-.09408	.10318
	Equal variances not assumed			.090	4.892E2	.929	.00455	.05077	-.09519	.10429
item36	Equal variances assumed	9.436E 0	.002	-1.608E0	743	.108	-.06111	.03801	-.13574	.01352
	Equal variances not assumed			-1.585E0	4.846E2	.114	-.06111	.03855	-.13685	.01463
item37	Equal variances assumed	2.889E 0	.090	-.013	743	.990	-.00053	.04086	-.08074	.07968
	Equal variances not assumed			-.013	4.731E2	.990	-.00053	.04180	-.08267	.08160
item38	Equal variances assumed	4.682E 0	.031	-1.185E0	743	.236	-.04496	.03795	-.11945	.02954
	Equal variances not assumed			-1.177E0	4.947E2	.240	-.04496	.03818	-.11997	.03006
item39	Equal variances assumed	.059	.809	-.853	743	.394	-.03502	.04106	-.11563	.04560
	Equal variances not assumed			-.847	4.942E2	.397	-.03502	.04133	-.11623	.04620
item40	Equal variances assumed	1.487E 0	.223	.413	743	.679	.02159	.05221	-.08092	.12409

	Equal variances not assumed			.422	5.336E2	.673	.02159	.05110	-.07879	.12196
item41	Equal variances assumed	2.977E 0	.085	-.593	743	.554	-.02451	.04136	-.10570	.05668
	Equal variances not assumed			-.602	5.256E2	.547	-.02451	.04070	-.10446	.05544
item42	Equal variances assumed	4.292E 0	.039	-1.396E0	743	.163	-.07246	.05191	-.17438	.02945
	Equal variances not assumed			-1.412E0	5.187E2	.159	-.07246	.05133	-.17331	.02838
item43	Equal variances assumed	1.444E 0	.230	-.937	743	.349	-.05016	.05352	-.15524	.05491
	Equal variances not assumed			-.945	5.152E2	.345	-.05016	.05306	-.15439	.05407
item44	Equal variances assumed	.972	.325	-.617	743	.537	-.03342	.05413	-.13969	.07284
	Equal variances not assumed			-.623	5.153E2	.534	-.03342	.05366	-.13884	.07199
item45	Equal variances assumed	3.304E 0	.070	-.848	743	.397	-.03685	.04346	-.12216	.04846
	Equal variances not assumed			-.833	4.802E2	.405	-.03685	.04421	-.12373	.05002
item46	Equal variances assumed	.755	.385	-1.030E0	743	.304	-.05458	.05301	-.15866	.04950

	Equal variances not assumed			-1.032E0	5.066E2	.302	-.05458	.05288	-.15847	.04931
item47	Equal variances assumed	.101	.750	-.756	743	.450	-.03887	.05143	-.13983	.06209
	Equal variances not assumed			-.753	4.988E2	.452	-.03887	.05159	-.14023	.06249
item48	Equal variances assumed	.394	.530	.014	743	.989	.00068	.04878	-.09508	.09644
	Equal variances not assumed			.014	4.911E2	.989	.00068	.04921	-.09601	.09737
Totalstressimp	Equal variances assumed	.304	.582	-.767	743	.443	-.01466	.01910	-.05215	.02284
	Equal variances not assumed			-.774	5.153E2	.439	-.01466	.01893	-.05185	.02253

Research Question 4 and Hypothesis 3

Descriptives

		N	Mean	Std. Deviation	Std. Error	95% Confidence Interval for Mean		Minimum	Maximum
						Lower Bound	Upper Bound		
item19	30-40yrs	61	2.8033	.77071	.09868	2.6059E0	3.0007E0	2.00	4.00
	41-50yrs	232	2.7845	.78190	.05133	2.6833E0	2.8856E0	2.00	4.00
	50yrs and above	452	2.6792	.79701	.03749	2.6055E0	2.7529E0	1.00	4.00
	Total	745	2.7221	.79098	.02898	2.6653E0	2.7790E0	1.00	4.00
item20	30-40yrs	61	3.1803	.80640	.10325	2.9738E0	3.3869E0	2.00	4.00
	41-50yrs	232	3.1121	.83507	.05483	3.0040E0	3.2201E0	1.00	4.00

	50yrs and above	452	3.0420	.85566	.04025	2.9629E0	3.1211E0	1.00	4.00
	Total	745	3.0752	.84544	.03097	3.0144E0	3.1360E0	1.00	4.00
item21	30-40yrs	61	3.0164	.78511	.10052	2.8153E0	3.2175E0	2.00	4.00
	41-50yrs	232	2.9741	.76686	.05035	2.8749E0	3.0733E0	2.00	4.00
	50yrs and above	452	3.0575	.77446	.03643	2.9859E0	3.1291E0	2.00	4.00
	Total	745	3.0282	.77287	.02832	2.9726E0	3.0838E0	2.00	4.00
item22	30-40yrs	61	2.5246	.72126	.09235	2.3399E0	2.7093E0	2.00	4.00
	41-50yrs	232	2.7931	.76749	.05039	2.6938E0	2.8924E0	2.00	4.00
	50yrs and above	452	2.7655	.77537	.03647	2.6938E0	2.8372E0	1.00	4.00
	Total	745	2.7544	.77081	.02824	2.6989E0	2.8098E0	1.00	4.00
item23	30-40yrs	61	2.5574	.71937	.09211	2.3731E0	2.7416E0	1.00	4.00
	41-50yrs	232	2.7371	.75295	.04943	2.6397E0	2.8345E0	2.00	4.00
	50yrs and above	452	2.8053	.80858	.03803	2.7306E0	2.8801E0	1.00	4.00
	Total	745	2.7638	.78667	.02882	2.7072E0	2.8203E0	1.00	4.00
item24	30-40yrs	61	2.9508	.78371	.10034	2.7501E0	3.1515E0	1.00	4.00
	41-50yrs	232	3.0129	.77000	.05055	2.9133E0	3.1125E0	2.00	4.00
	50yrs and above	452	2.9889	.86178	.04053	2.9093E0	3.0686E0	1.00	4.00
	Total	745	2.9933	.82710	.03030	2.9338E0	3.0528E0	1.00	4.00
item25	30-40yrs	61	2.6066	.71365	.09137	2.4238E0	2.7893E0	2.00	4.00
	41-50yrs	232	2.8448	.76281	.05008	2.7462E0	2.9435E0	2.00	4.00
	50yrs and above	452	2.8031	.74672	.03512	2.7341E0	2.8721E0	1.00	4.00
	Total	745	2.8000	.75063	.02750	2.7460E0	2.8540E0	1.00	4.00
item26	30-40yrs	61	2.6885	.78615	.10066	2.4872E0	2.8899E0	2.00	4.00
	41-50yrs	232	2.7888	.71669	.04705	2.6961E0	2.8815E0	2.00	4.00
	50yrs and above	452	2.8363	.79058	.03719	2.7632E0	2.9094E0	1.00	4.00
	Total	745	2.8094	.76809	.02814	2.7542E0	2.8646E0	1.00	4.00
item27	30-40yrs	61	3.2623	.77248	.09891	3.0645E0	3.4601E0	1.00	4.00
	41-50yrs	232	3.2672	.75430	.04952	3.1697E0	3.3648E0	2.00	4.00
	50yrs and above	452	3.2168	.78618	.03698	3.1441E0	3.2895E0	1.00	4.00
	Total	745	3.2362	.77462	.02838	3.1805E0	3.2920E0	1.00	4.00
item28	30-40yrs	61	2.7049	.76036	.09735	2.5102E0	2.8997E0	1.00	4.00
	41-50yrs	232	2.8578	.75680	.04969	2.7599E0	2.9557E0	2.00	4.00
	50yrs and above	452	2.7367	.74997	.03528	2.6674E0	2.8061E0	1.00	4.00

	Total	745	2.7718	.75421	.02763	2.7176E0	2.8261E0	1.00	4.00
item29	30-40yrs	61	2.7377	.68073	.08716	2.5634E0	2.9120E0	2.00	4.00
	41-50yrs	232	2.6552	.67872	.04456	2.5674E0	2.7430E0	2.00	4.00
	50yrs and above	452	2.5465	.69529	.03270	2.4822E0	2.6107E0	1.00	4.00
	Total	745	2.5960	.69114	.02532	2.5463E0	2.6457E0	1.00	4.00
item30	30-40yrs	61	2.8033	.79204	.10141	2.6004E0	3.0061E0	2.00	4.00
	41-50yrs	232	2.9871	.79762	.05237	2.8839E0	3.0902E0	2.00	4.00
	50yrs and above	452	2.9071	.81844	.03850	2.8314E0	2.9827E0	2.00	4.00
	Total	745	2.9235	.81042	.02969	2.8652E0	2.9818E0	2.00	4.00
item31	30-40yrs	61	3.0000	.70711	.09054	2.8189E0	3.1811E0	2.00	4.00
	41-50yrs	232	3.1164	.75552	.04960	3.0186E0	3.2141E0	2.00	4.00
	50yrs and above	452	3.0553	.73496	.03457	2.9874E0	3.1232E0	2.00	4.00
	Total	745	3.0698	.73905	.02708	3.0166E0	3.1230E0	2.00	4.00
item32	30-40yrs	61	2.4426	.74217	.09503	2.2525E0	2.6327E0	1.00	4.00
	41-50yrs	232	2.5129	.76152	.05000	2.4144E0	2.6114E0	1.00	4.00
	50yrs and above	452	2.6327	.69050	.03248	2.5689E0	2.6966E0	1.00	4.00
	Total	745	2.5799	.71982	.02637	2.5281E0	2.6316E0	1.00	4.00
item33	30-40yrs	61	2.2951	.76036	.09735	2.1003E0	2.4898E0	1.00	4.00
	41-50yrs	232	2.4181	.76289	.05009	2.3194E0	2.5168E0	1.00	4.00
	50yrs and above	452	2.5288	.67028	.03153	2.4668E0	2.5907E0	1.00	4.00
	Total	745	2.4752	.71070	.02604	2.4241E0	2.5263E0	1.00	4.00
item34	30-40yrs	61	2.3115	.78615	.10066	2.1101E0	2.5128E0	1.00	4.00
	41-50yrs	232	2.4224	.75192	.04937	2.3251E0	2.5197E0	1.00	4.00
	50yrs and above	452	2.5885	.68797	.03236	2.5249E0	2.6521E0	1.00	4.00
	Total	745	2.5141	.72225	.02646	2.4621E0	2.5660E0	1.00	4.00
item35	30-40yrs	61	2.7869	.58065	.07435	2.6382E0	2.9356E0	2.00	4.00
	41-50yrs	232	2.8621	.64996	.04267	2.7780E0	2.9461E0	2.00	4.00
	50yrs and above	452	2.7854	.65617	.03086	2.7247E0	2.8461E0	2.00	4.00
	Total	745	2.8094	.64854	.02376	2.7627E0	2.8560E0	2.00	4.00
item36	30-40yrs	61	2.3443	.47907	.06134	2.2216E0	2.4670E0	2.00	3.00
	41-50yrs	232	2.4181	.50300	.03302	2.3530E0	2.4832E0	2.00	4.00
	50yrs and above	452	2.3805	.48606	.02286	2.3356E0	2.4255E0	2.00	3.00
	Total	745	2.3893	.49066	.01798	2.3540E0	2.4246E0	2.00	4.00

item37	30-40yrs	61	2.5902	.52843	.06766	2.4548E0	2.7255E0	2.00	4.00
	41-50yrs	232	2.6638	.52544	.03450	2.5958E0	2.7318E0	2.00	4.00
	50yrs and above	452	2.6283	.52763	.02482	2.5795E0	2.6771E0	2.00	4.00
	Total	745	2.6362	.52673	.01930	2.5984E0	2.6741E0	2.00	4.00
item38	30-40yrs	61	2.4426	.50082	.06412	2.3144E0	2.5709E0	2.00	3.00
	41-50yrs	232	2.3879	.48833	.03206	2.3248E0	2.4511E0	2.00	3.00
	50yrs and above	452	2.3938	.48913	.02301	2.3486E0	2.4390E0	2.00	3.00
	Total	745	2.3960	.48939	.01793	2.3608E0	2.4312E0	2.00	3.00
item39	30-40yrs	61	2.5902	.52843	.06766	2.4548E0	2.7255E0	2.00	4.00
	41-50yrs	232	2.6336	.52578	.03452	2.5656E0	2.7016E0	2.00	4.00
	50yrs and above	452	2.6062	.53254	.02505	2.5570E0	2.6554E0	2.00	4.00
	Total	745	2.6134	.52959	.01940	2.5753E0	2.6515E0	2.00	4.00
item40	30-40yrs	61	2.3180	.73700	.09436	2.7293E0	3.1068E0	2.00	4.00
	41-50yrs	232	2.3612	.65350	.04290	2.8767E0	3.0457E0	2.00	4.00
	50yrs and above	452	2.3889	.67411	.03171	2.9266E0	3.0513E0	2.00	4.00
	Total	745	2.3565	.67254	.02464	2.9261E0	3.0229E0	2.00	4.00
item41	30-40yrs	61	2.5574	.59230	.07584	2.4057E0	2.7091E0	2.00	4.00
	41-50yrs	232	2.6595	.51007	.03349	2.5935E0	2.7255E0	2.00	4.00
	50yrs and above	452	2.6416	.53676	.02525	2.5920E0	2.6912E0	2.00	4.00
	Total	745	2.6403	.53329	.01954	2.6019E0	2.6786E0	2.00	4.00
item42	30-40yrs	61	2.6721	.65119	.08338	2.5054E0	2.8389E0	1.00	3.00
	41-50yrs	232	2.6336	.65748	.04317	2.5486E0	2.7187E0	1.00	3.00
	50yrs and above	452	2.6549	.67938	.03196	2.5921E0	2.7177E0	1.00	3.00
	Total	745	2.6497	.66958	.02453	2.6015E0	2.6978E0	1.00	3.00
item43	30-40yrs	61	2.5902	.69227	.08864	2.4129E0	2.7675E0	1.00	3.00
	41-50yrs	232	2.5733	.67341	.04421	2.4862E0	2.6604E0	1.00	3.00
	50yrs and above	452	2.5354	.69912	.03288	2.4708E0	2.6000E0	1.00	3.00
	Total	745	2.5517	.69004	.02528	2.5020E0	2.6013E0	1.00	3.00
item44	30-40yrs	61	2.6721	.67630	.08659	2.4989E0	2.8453E0	1.00	3.00
	41-50yrs	232	2.6164	.68014	.04465	2.5284E0	2.7044E0	1.00	3.00
	50yrs and above	452	2.5664	.70947	.03337	2.5008E0	2.6320E0	1.00	3.00
	Total	745	2.5906	.69767	.02556	2.5404E0	2.6408E0	1.00	3.00
item45	30-40yrs	61	2.3607	.57830	.07404	2.2125E0	2.5088E0	1.00	3.00

	41-50yrs	232	2.2802	.56134	.03685	2.2076E0	2.3528E0	1.00	3.00
	50yrs and above	452	2.2854	.55752	.02622	2.2339E0	2.3369E0	1.00	3.00
	Total	745	2.2899	.56007	.02052	2.2497E0	2.3302E0	1.00	3.00
item46	30-40yrs	61	2.6066	.66530	.08518	2.4362E0	2.7769E0	1.00	3.00
	41-50yrs	232	2.5388	.67629	.04440	2.4513E0	2.6263E0	1.00	3.00
	50yrs and above	452	2.5133	.69032	.03247	2.4495E0	2.5771E0	1.00	3.00
	Total	745	2.5289	.68355	.02504	2.4797E0	2.5780E0	1.00	3.00
item47	30-40yrs	61	2.3934	.63976	.08191	2.2296E0	2.5573E0	1.00	3.00
	41-50yrs	232	2.4267	.64719	.04249	2.3430E0	2.5104E0	1.00	3.00
	50yrs and above	452	2.3872	.67460	.03173	2.3248E0	2.4495E0	1.00	3.00
	Total	745	2.4000	.66276	.02428	2.3523E0	2.4477E0	1.00	3.00
item48	30-40yrs	61	2.3770	.58206	.07453	2.2280E0	2.5261E0	1.00	3.00
	41-50yrs	232	2.4009	.61623	.04046	2.3211E0	2.4806E0	1.00	3.00
	50yrs and above	452	2.3540	.64110	.03015	2.2947E0	2.4132E0	1.00	3.00
	Total	745	2.3705	.62835	.02302	2.3253E0	2.4157E0	1.00	3.00
Totalstressimp	30-40yrs	61	2.6306	.23302	.02984	2.5999E0	2.7192E0	2.23	3.13
	41-50yrs	232	2.6914	.24276	.01594	2.6799E0	2.7428E0	2.10	3.20
	50yrs and above	452	2.6701	.24939	.01173	2.6740E0	2.7201E0	2.13	3.23
	Total	745	2.6684	.24608	.00902	2.6807E0	2.7161E0	2.10	3.23

ANOVA

		Sum of Squares	Df	Mean Square	F	Sig.
item19	Between Groups	2.137	2	1.068	1.711	.181
	Within Groups	463.348	743	.624		
	Total	465.485	745			
item20	Between Groups	1.487	2	.743	1.040	.354
	Within Groups	530.304	743	.715		
	Total	531.791	745			
item21	Between Groups	1.075	2	.538	.900	.407
	Within Groups	443.333	743	.597		
	Total	444.408	745			

item22	Between Groups	3.625	2	1.812	3.067	.047
	Within Groups	438.424	743	.591		
	Total	442.048	745			
item23	Between Groups	3.544	2	1.772	2.878	.057
	Within Groups	456.878	743	.616		
	Total	460.421	745			
item24	Between Groups	.208	2	.104	.152	.859
	Within Groups	508.758	743	.686		
	Total	508.966	745			
item25	Between Groups	2.753	2	1.377	2.453	.087
	Within Groups	416.447	743	.561		
	Total	419.200	745			
item26	Between Groups	1.316	2	.658	1.116	.328
	Within Groups	437.618	743	.590		
	Total	438.934	745			
item27	Between Groups	.435	2	.217	.362	.697
	Within Groups	445.987	743	.601		
	Total	446.421	745			
item28	Between Groups	2.543	2	1.272	2.243	.107
	Within Groups	420.665	743	.567		
	Total	423.208	745			
item29	Between Groups	3.147	2	1.573	3.314	.037
	Within Groups	352.241	743	.475		
	Total	355.388	745			
item30	Between Groups	1.941	2	.971	1.480	.228
	Within Groups	486.698	743	.656		
	Total	488.639	745			
item31	Between Groups	.895	2	.448	.819	.441
	Within Groups	405.475	743	.546		
	Total	406.370	745			
item32	Between Groups	3.452	2	1.726	3.352	.036
	Within Groups	382.046	743	.515		
	Total	385.498	745			

item33	Between Groups	4.032	2	2.016	4.024	.018
	Within Groups	371.759	743	.501		
	Total	375.791	745			
item34	Between Groups	6.956	2	3.478	6.771	.001
	Within Groups	381.146	743	.514		
	Total	388.102	745			
item35	Between Groups	.935	2	.467	1.112	.330
	Within Groups	311.999	743	.420		
	Total	312.934	745			
item36	Between Groups	.351	2	.175	.728	.483
	Within Groups	178.763	743	.241		
	Total	179.114	745			
item37	Between Groups	.334	2	.167	.601	.548
	Within Groups	206.087	743	.278		
	Total	206.421	745			
item38	Between Groups	.150	2	.075	.312	.732
	Within Groups	178.038	743	.240		
	Total	178.188	745			
item39	Between Groups	.151	2	.076	.269	.764
	Within Groups	208.515	743	.281		
	Total	208.666	745			
item40	Between Groups	.330	2	.165	.364	.695
	Within Groups	336.186	743	.453		
	Total	336.515	745			
item41	Between Groups	.506	2	.253	.889	.412
	Within Groups	211.086	743	.284		
	Total	211.592	745			
item42	Between Groups	.103	2	.051	.114	.892
	Within Groups	333.460	743	.449		
	Total	333.562	745			
item43	Between Groups	.318	2	.159	.334	.716
	Within Groups	353.942	743	.477		
	Total	354.260	745			

item44	Between Groups	.825	2	.412	.847	.429
	Within Groups	361.309	743	.487		
	Total	362.134	745			
item45	Between Groups	.337	2	.168	.536	.585
	Within Groups	233.038	743	.314		
	Total	233.374	745			
item46	Between Groups	.501	2	.250	.535	.586
	Within Groups	347.129	743	.468		
	Total	347.630	745			
item47	Between Groups	.243	2	.121	.276	.759
	Within Groups	326.557	743	.440		
	Total	326.800	745			
item48	Between Groups	.340	2	.170	.430	.651
	Within Groups	293.411	743	.395		
	Total	293.750	745			
Totalstressimp	Between Groups	.132	2	.066	1.088	.337
	Within Groups	44.921	743	.061		
	Total	45.053	745			

Research Question 5 and hypothesis 4

Group Statistics

	Workexp	N	Mean	Std. Deviation	Std. Error Mean
item19	Below 10yrs	138	2.7883	.78992	.06749
	10yrs and above	607	2.7084	.79123	.03212
item20	Below 10yrs	138	3.1387	.80607	.06887
	10yrs and above	607	3.0626	.85367	.03465
item21	Below 10yrs	138	3.0073	.75241	.06428
	10yrs and above	607	3.0313	.77758	.03156
item22	Below 10yrs	138	2.6861	.76458	.06532
	10yrs and above	607	2.7694	.77258	.03136

item23	Below 10yrs	138	2.6496	.74351	.06352
	10yrs and above	607	2.7924	.79171	.03213
item24	Below 10yrs	138	2.9562	.79399	.06784
	10yrs and above	607	3.0049	.83150	.03375
item25	Below 10yrs	138	2.7883	.75177	.06423
	10yrs and above	607	2.8023	.75154	.03050
item26	Below 10yrs	138	2.7591	.76240	.06514
	10yrs and above	607	2.8237	.76661	.03112
item27	Below 10yrs	138	3.2263	.73757	.06301
	10yrs and above	607	3.2422	.77863	.03160
item28	Below 10yrs	138	2.8394	.75958	.06490
	10yrs and above	607	2.7595	.75001	.03044
item29	Below 10yrs	138	2.7080	.68771	.05876
	10yrs and above	607	2.5717	.69014	.02801
item30	Below 10yrs	138	2.9051	.79413	.06785
	10yrs and above	607	2.9275	.81529	.03309
item31	Below 10yrs	138	3.0511	.74084	.06329
	10yrs and above	607	3.0741	.73980	.03003
item32	Below 10yrs	138	2.4453	.75654	.06464
	10yrs and above	607	2.6129	.70596	.02865
item33	Below 10yrs	138	2.3577	.76444	.06531
	10yrs and above	607	2.5008	.69623	.02826
item34	Below 10yrs	138	2.4088	.80945	.06916
	10yrs and above	607	2.5371	.69997	.02841
item35	Below 10yrs	138	2.8102	.64777	.05534
	10yrs and above	607	2.8089	.64974	.02637
item36	Below 10yrs	138	2.3285	.47138	.04027
	10yrs and above	607	2.4036	.49438	.02007
item37	Below 10yrs	138	2.6277	.56889	.04860
	10yrs and above	607	2.6392	.51702	.02099
item38	Below 10yrs	138	2.4307	.49699	.04246
	10yrs and above	607	2.3888	.48788	.01980
item39	Below 10yrs	138	2.5693	.52574	.04492

	10yrs and above	607	2.6244	.53021	.02152
item40	Below 10yrs	138	2.4343	.69878	.05970
	10yrs and above	607	2.3852	.66609	.02704
item41	Below 10yrs	138	2.5766	.56520	.04829
	10yrs and above	607	2.6557	.52501	.02131
item42	Below 10yrs	138	2.5985	.69091	.05903
	10yrs and above	607	2.6606	.66512	.02700
item43	Below 10yrs	138	2.4964	.72886	.06227
	10yrs and above	607	2.5634	.68133	.02765
item44	Below 10yrs	138	2.5620	.72620	.06204
	10yrs and above	607	2.5964	.69191	.02808
item45	Below 10yrs	138	2.2920	.57087	.04877
	10yrs and above	607	2.2900	.55842	.02267
item46	Below 10yrs	138	2.4964	.69794	.05963
	10yrs and above	607	2.5354	.68094	.02764
item47	Below 10yrs	138	2.3139	.66146	.05651
	10yrs and above	607	2.4201	.66237	.02688
item48	Below 10yrs	138	2.3139	.61539	.05258
	10yrs and above	607	2.3839	.63136	.02563
Totalstressimp	Below 10yrs	138	2.6709	.24274	.02074
	10yrs and above	607	2.6959	.24599	.00998

Independent Samples Test

		Levene's Test for Equality of Variances		t-test for Equality of Means						
		F	Sig.	T	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference	
									Lower	Upper
item19	Equal variances assumed	.124	.724	1.068	743	.286	.07992	.07482	-.06696	.22680

	Equal variances not assumed			1.069	2.022E2	.286	.07992	.07474	-.06745	.22729
item20	Equal variances assumed	.436	.509	.952	743	.342	.07608	.07994	-.08085	.23302
	Equal variances not assumed			.987	2.105E	.325	.07608	.07709	-.07589	.22805
item21	Equal variances assumed	1.265	.261	-.328	743	.743	-.02400	.07312	-.16755	.11954
	Equal variances not assumed			-.335	2.068E2	.738	-.02400	.07161	-.16519	.11718
item22	Equal variances assumed	.030	.862	-1.141	743	.254	-.08323	.07294	-.22642	.05996
	Equal variances not assumed			-1.149	2.035E2	.252	-.08323	.07246	-.22609	.05964
item23	Equal variances assumed	.483	.487	-1.928	743	.054	-.14279	.07407	-.28820	.00263
	Equal variances not assumed			-2.006	2.114E2	.046	-.14279	.07119	-.28312	-2.45709E-3
item24	Equal variances assumed	1.037	.309	-.625	743	.532	-.04874	.07801	-.20189	.10441

	Equal variances not assumed			-.643	2.088E2	.521	-.04874	.07577	-.19810	.10063
item25	Equal variances assumed	.027	.870	-.197	743	.844	-.01399	.07109	-.15355	.12558
	Equal variances not assumed			-.197	2.020E2	.844	-.01399	.07110	-.15419	.12622
item26	Equal variances assumed	.311	.577	-.892	743	.373	-.06460	.07244	-.20681	.07761
	Equal variances not assumed			-.895	2.028E2	.372	-.06460	.07219	-.20693	.07773
item27	Equal variances assumed	2.064	.151	-.218	743	.828	-.01590	.07295	-.15911	.12732
	Equal variances not assumed			-.226	2.100E2	.822	-.01590	.07050	-.15487	.12307
item28	Equal variances assumed	.267	.606	1.124	743	.261	.07994	.07111	-.05965	.21954
	Equal variances not assumed			1.115	2.003E2	.266	.07994	.07168	-.06140	.22129
item29	Equal variances assumed	.557	.456	2.090	743	.037	.13637	.06524	.00830	.26443

	Equal variances not assumed			2.095	2.025E2	.037	.13637	.06509	.00802	.26471
item30	Equal variances assumed	.425	.515	-.292	743	.770	-.02240	.07675	-.17308	.12828
	Equal variances not assumed			-.297	2.058E2	.767	-.02240	.07549	-.17123	.12642
item31	Equal variances assumed	.071	.790	-.329	743	.742	-.02304	.06999	-.16045	.11437
	Equal variances not assumed			-.329	2.018E2	.743	-.02304	.07006	-.16117	.11509
item32	Equal variances assumed	1.289	.257	-2.476	743	.013	-.16759	.06768	-.30046	-3.47334E- 2
	Equal variances not assumed			-2.370	1.930E2	.019	-.16759	.07070	-.30704	-2.81468E- 2
item33	Equal variances assumed	2.220	.137	-2.134	743	.033	-.14316	.06708	-.27486	-1.14637E- 2
	Equal variances not assumed			-2.012	1.902E2	.046	-.14316	.07116	-.28353	-2.79099E- 3
item34	Equal variances assumed	6.697	.010	-1.881	743	.060	-.12831	.06822	-.26224	.00563

	Equal variances not assumed			-1.716	1.846E2	.088	-.12831	.07476	-.27581	.01920
item35	Equal variances assumed	.016	.898	.022	743	.983	.00132	.06142	-.11926	.12191
	Equal variances not assumed			.022	2.024E2	.983	.00132	.06130	-.11955	.12220
item36	Equal variances assumed	1.406E1	.000	-1.621	743	.105	-.07516	.04637	-.16619	.01588
	Equal variances not assumed			-1.670	2.090E2	.096	-.07516	.04499	-.16386	.01354
item37	Equal variances assumed	4.559	.033	-.230	743	.818	-.01147	.04984	-.10931	.08637
	Equal variances not assumed			-.217	1.899E2	.829	-.01147	.05294	-.11590	.09295
item38	Equal variances assumed	2.435	.119	.904	743	.366	.04186	.04631	-.04905	.13277
	Equal variances not assumed			.893	1.995E2	.373	.04186	.04685	-.05053	.13425
item39	Equal variances assumed	.311	.577	-1.099	743	.272	-.05504	.05007	-.15334	.04326

	Equal variances not assumed			-1.105	2.032E2	.270	-.05504	.04981	-.15324	.04316
item40	Equal variances assumed	2.135	.144	-.800	743	.424	-.05087	.06358	-.17569	.07395
	Equal variances not assumed			-.776	1.957E2	.439	-.05087	.06554	-.18012	.07838
item41	Equal variances assumed	5.995	.015	-1.569	743	.117	-.07904	.05038	-.17794	.01986
	Equal variances not assumed			-1.498	1.925E2	.136	-.07904	.05278	-.18315	.02506
item42	Equal variances assumed	1.845	.175	-.980	743	.328	-.06209	.06337	-.18648	.06231
	Equal variances not assumed			-.957	1.969E2	.340	-.06209	.06491	-.19009	.06592
item43	Equal variances assumed	2.613	.106	-1.027	743	.305	-.06708	.06529	-.19526	.06110
	Equal variances not assumed			-.984	1.932E2	.326	-.06708	.06814	-.20146	.06731
item44	Equal variances assumed	1.029	.311	-.520	743	.603	-.03433	.06605	-.16400	.09534

	Equal variances not assumed			-.504	1.956E2	.615	-.03433	.06810	-.16864	.09998
item45	Equal variances assumed	.134	.714	.038	743	.970	.00202	.05304	-.10210	.10614
	Equal variances not assumed			.038	1.990E2	.970	.00202	.05378	-.10404	.10808
item46	Equal variances assumed	.449	.503	-.604	743	.546	-.03907	.06471	-.16610	.08796
	Equal variances not assumed			-.594	1.987E2	.553	-.03907	.06572	-.16867	.09053
item47	Equal variances assumed	.494	.482	-1.696	743	.090	-.10623	.06264	-.22920	.01673
	Equal variances not assumed			-1.697	2.022E2	.091	-.10623	.06258	-.22963	.01717
item48	Equal variances assumed	1.533	.216	-1.177	743	.239	-.06999	.05944	-.18669	.04671
	Equal variances not assumed			-1.197	2.057E2	.233	-.06999	.05849	-.18530	.04533
Totalstre ssimp	Equal variances assumed	.148	.701	-1.595	743	.111	-.03702	.02321	-.08259	.00855

Equal variances not assumed			-1.608	2.039E2	.109	-.03702	.02302	-.08240	.00836
--------------------------------------	--	--	--------	---------	------	---------	--------	---------	--------

Research Question 6 and Hypothesis 5

Group Statistics

	Qualificati on	N	Mean	Std. Deviation	Std. Error Mean
item19	Master	157	2.7516	.75464	.06101
	PhD	588	2.7143	.80034	.03301
item20	Master	157	3.0523	.81750	.06609
	PhD	588	3.0782	.85429	.03523
item21	Master	157	2.9673	.74708	.06040
	PhD	588	3.0442	.78188	.03224
item22	Master	157	2.6209	.73455	.05938
	PhD	588	2.7857	.77548	.03198
item23	Master	157	2.6078	.70929	.05734
	PhD	588	2.8061	.80023	.03300
item24	Master	157	2.9085	.77255	.06246
	PhD	588	3.0153	.84068	.03467
item25	Master	157	2.7647	.74131	.05993
	PhD	588	2.8078	.75351	.03107
item26	Master	157	2.6667	.74339	.06010
	PhD	588	2.8469	.77242	.03185
item27	Master	157	3.1634	.78185	.06321
	PhD	588	3.2534	.77354	.03190
item28	Master	157	2.7712	.75652	.06116
	PhD	588	2.7704	.75206	.03101
item29	Master	157	2.6340	.63610	.05143
	PhD	588	2.5833	.70156	.02893

item30	Master	157	2.9020	.75885	.06135
	PhD	588	2.9286	.82446	.03400
item31	Master	157	3.0065	.76517	.06186
	PhD	588	3.0867	.73206	.03019
item32	Master	157	2.4575	.71623	.05790
	PhD	588	2.6105	.71705	.02957
item33	Master	157	2.3595	.73997	.05982
	PhD	588	2.5017	.69923	.02884
item34	Master	157	2.3922	.74547	.06027
	PhD	588	2.5442	.71233	.02938
item35	Master	157	2.7974	.63203	.05110
	PhD	588	2.8129	.65446	.02699
item36	Master	157	2.3464	.47739	.03859
	PhD	588	2.3997	.49371	.02036
item37	Master	157	2.5882	.56812	.04593
	PhD	588	2.6480	.51573	.02127
item38	Master	157	2.4444	.49854	.04030
	PhD	588	2.3827	.48645	.02006
item39	Master	157	2.5752	.54643	.04418
	PhD	588	2.6190	.52317	.02158
item40	Master	157	2.4758	.70075	.05665
	PhD	588	2.3983	.66425	.02739
item41	Master	157	2.5294	.51374	.04153
	PhD	588	2.6667	.53604	.02211
item42	Master	157	2.5882	.72120	.05831
	PhD	588	2.6735	.64645	.02666
item43	Master	157	2.5033	.73560	.05947
	PhD	588	2.5714	.67063	.02766
item44	Master	157	2.5163	.74432	.06017
	PhD	588	2.6173	.67683	.02791
item45	Master	157	2.2876	.59242	.04789
	PhD	588	2.2959	.54836	.02261
item46	Master	157	2.5033	.72660	.05874

	PhD	588	2.5425	.66545	.02744
item47	Master	157	2.3203	.66544	.05380
	PhD	588	2.4269	.65502	.02701
item48	Master	157	2.3007	.62917	.05087
	PhD	588	2.3929	.62357	.02572
Totalstressimp	Master	157	2.6201	.23463	.01897
	PhD	588	2.6842	.24683	.01018

Independent Samples Test

		Levene's Test for Equality of Variances		t-test for Equality of Means						
		F	Sig.	T	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference	
									Lower	Upper
item19	Equal variances assumed	3.460	.063	.520	743	.603	.03735	.07180	-.10361	.17831
	Equal variances not assumed			.538	2.485E2	.591	.03735	.06936	-.09927	.17397
item20	Equal variances assumed	3.264	.071	-.338	743	.736	2.59437E-2	.07686	-.17683	.12494
	Equal variances not assumed			-.346	2.455E2	.729	2.59437E-2	.07489	-.17346	.12157
item21	Equal variances assumed	1.883	.170	-1.094	743	.275	7.68974E-2	.07032	-.21495	.06116

	Equal variances not assumed			-1.123	2.458E2	.262	7.68974E-2	.06847	-.21175	.05796
item22	Equal variances assumed	.248	.619	-2.367	743	.018	1.64799E-1	.06963	-.30150	-2.81008E-2
	Equal variances not assumed			-2.443	2.476E2	.015	1.64799E-1	.06745	-.29764	-3.19537E-2
item23	Equal variances assumed	3.072	.080	-2.792	743	.005	1.98279E-1	.07101	-.33768	-5.88806E-2
	Equal variances not assumed			-2.997	2.619E2	.003	1.98279E-1	.06616	-.32855	-6.80042E-2
item24	Equal variances assumed	3.919	.048	-1.423	743	.155	1.06809E-1	.07507	-.25418	.04056
	Equal variances not assumed			-1.495	2.539E2	.136	1.06809E-1	.07143	-.24749	.03387
item25	Equal variances assumed	.001	.978	-.633	743	.527	4.31172E-2	.06816	-.17693	.09069
	Equal variances not assumed			-.639	2.402E2	.524	4.31172E-2	.06751	-.17610	.08987
item26	Equal variances assumed	.179	.672	-2.591	743	.010	1.80272E-1	.06957	-.31685	-4.36976E-2

	Equal variances not assumed			-2.650	2.444E2	.009	1.80272E-1	.06802	-.31425	-4.62928E-2
item27	Equal variances assumed	.490	.484	-1.279	743	.201	9.00027E-2	.07036	-.22813	.04813
	Equal variances not assumed			-1.271	2.353E2	.205	9.00027E-2	.07080	-.22949	.04948
item28	Equal variances assumed	.020	.889	.012	743	.990	.00083	.06834	-.13333	.13499
	Equal variances not assumed			.012	2.362E2	.990	.00083	.06858	-.13426	.13593
item29	Equal variances assumed	4.610	.032	.811	743	.418	.05065	.06250	-.07204	.17334
	Equal variances not assumed			.858	2.568E2	.391	.05065	.05901	-.06554	.16685
item30	Equal variances assumed	4.973	.026	-.361	743	.718	2.66106E-2	.07364	-.17118	.11796
	Equal variances not assumed			-.379	2.535E2	.705	2.66106E-2	.07014	-.16474	.11152
item31	Equal variances assumed	.054	.816	-1.196	743	.232	8.01987E-2	.06707	-.21186	.05147

	Equal variances not assumed			-1.165	2.297E2	.245	8.01987E- 2	.06883	-.21583	.05543
item32	Equal variances assumed	.000	.984	-2.352	743	.019	1.53028E- 1	.06506	-.28076	-2.53007E-2
	Equal variances not assumed			-2.354	2.374E2	.019	1.53028E- 1	.06502	-.28111	-2.49430E-2
item33	Equal variances assumed	.454	.500	-2.214	743	.027	1.42224E- 1	.06424	-.26833	-1.61144E-2
	Equal variances not assumed			-2.142	2.277E2	.033	1.42224E- 1	.06641	-.27308	-1.13664E-2
item34	Equal variances assumed	.677	.411	-2.329	743	.020	1.52061E- 1	.06528	-.28021	-2.39085E-2
	Equal variances not assumed			-2.268	2.295E2	.024	1.52061E- 1	.06705	-.28417	-1.99565E-2
item35	Equal variances assumed	.250	.617	-.263	743	.792	1.55395E- 2	.05898	-.13133	.10025
	Equal variances not assumed			-.269	2.437E2	.788	1.55395E- 2	.05779	-.12936	.09829
item36	Equal variances assumed	7.110	.008	-1.197	743	.232	5.32546E- 2	.04451	-.14063	.03412

	Equal variances not assumed			-1.220	2.435E2	.223	5.32546E-2	.04364	-.13921	.03270
item37	Equal variances assumed	8.538	.004	-1.249	743	.212	5.97239E-2	.04782	-.15361	.03416
	Equal variances not assumed			-1.180	2.215E2	.239	5.97239E-2	.05061	-.15947	.04002
item38	Equal variances assumed	5.047	.025	1.392	743	.164	.06179	.04438	-.02533	.14891
	Equal variances not assumed			1.373	2.329E2	.171	.06179	.04502	-.02691	.15049
item39	Equal variances assumed	2.463	.117	-.916	743	.360	4.38842E-2	.04792	-.13797	.05020
	Equal variances not assumed			-.893	2.298E2	.373	4.38842E-2	.04916	-.14075	.05298
item40	Equal variances assumed	6.066	.014	-2.009	743	.045	1.22482E-1	.06098	-.24220	-2.76672E-3
	Equal variances not assumed			-1.946	2.282E2	.053	1.22482E-1	.06293	-.24648	.00151
item41	Equal variances assumed	.934	.334	-2.845	743	.005	1.37255E-1	.04824	-.23196	-4.25524E-2

	Equal variances not assumed			-2.917	2.452E2	.004	1.37255E- 1	.04705	-.22993	-4.45810E-2
item42	Equal variances assumed	6.485	.011	-1.418	743	.157	8.52341E- 2	.06013	-.20327	.03281
	Equal variances not assumed			-1.329	2.197E2	.185	8.52341E- 2	.06411	-.21159	.04112
item43	Equal variances assumed	4.430	.036	-1.097	743	.273	6.81606E- 2	.06212	-.19012	.05380
	Equal variances not assumed			-1.039	2.222E2	.300	6.81606E- 2	.06559	-.19741	.06109
item44	Equal variances assumed	6.466	.011	-1.610	743	.108	1.01007E- 1	.06273	-.22417	.02215
	Equal variances not assumed			-1.523	2.218E2	.129	1.01007E- 1	.06633	-.23173	.02972
item45	Equal variances assumed	1.595	.207	-.165	743	.869	8.33667E- 3	.05062	-.10770	.09103
	Equal variances not assumed			-.157	2.244E2	.875	8.33667E- 3	.05296	-.11271	.09604
item46	Equal variances assumed	3.063	.080	-.637	743	.524	3.92490E- 2	.06158	-.16013	.08164

	Equal variances not assumed			-.605	2.228E2	.546	3.92490E-2	.06484	-.16702	.08852
item47	Equal variances assumed	.101	.751	-1.787	743	.074	1.06609E-1	.05964	-.22370	.01048
	Equal variances not assumed			-1.771	2.344E2	.078	1.06609E-1	.06020	-.22521	.01199
item48	Equal variances assumed	.640	.424	-1.626	743	.104	9.22035E-2	.05670	-.20351	.01910
	Equal variances not assumed			-1.618	2.356E2	.107	9.22035E-2	.05700	-.20449	.02008
Totalstre ssimp	Equal variances assumed	1.674	.196	-3.340	743	.001	7.40852E-2	.02218	-.11763	-3.05453E-2
	Equal variances not assumed			-3.441	2.469E2	.001	7.40852E-2	.02153	-.11649	-3.16850E-2

Research Question 7

Group Statistics

	Instowners hip	N	Mean	Std. Deviation	Std. Error Mean
item49	Federal	397	2.8715	.34248	.01719
	State	348	2.6931	.85574	.04587
item50	Federal	397	2.7406	.44460	.02231
	State	348	2.6218	.80695	.04326
item51	Federal	397	2.8814	.42918	.02154

	State	348	2.7609	.55527	.02977
item52	Federal	397	2.7217	.47273	.02373
	State	348	2.6552	.54116	.02901
item53	Federal	397	2.9620	.44596	.02238
	State	348	2.8299	.67821	.03636
item54	Federal	397	2.6348	.48210	.02420
	State	348	2.5362	.74707	.04005
item55	Federal	397	2.8652	.48210	.02420
	State	348	2.8190	.64329	.03448
item56	Federal	397	2.7028	.46310	.02324
	State	348	2.6764	.80289	.04304
item57	Federal	397	3.1436	.77982	.03914
	State	348	2.6351	.82233	.04408
item58	Federal	397	2.6804	.65050	.03265
	State	348	2.5408	.53710	.02879
item59	Federal	397	2.9572	.68215	.03424
	State	348	2.9598	.55123	.02955
item60	Federal	397	1.7380	.79575	.03994
	State	348	2.1178	.88888	.04765
item61	Federal	397	2.7025	.66096	.03317
	State	348	2.9253	.46198	.02476
item62	Federal	397	2.8312	.75494	.03789
	State	348	2.8862	.80240	.04301
item63	Federal	397	3.2166	.90923	.04563
	State	348	3.1379	.78049	.04184
item64	Federal	397	3.0076	1.01874	.05113
	State	348	2.9799	.72195	.03870
item65	Federal	397	3.5844	.65986	.03312
	State	348	3.6092	.53373	.02861
item66	Federal	397	3.3753	.83345	.04183
	State	348	3.0833	.76408	.04096
item67	Federal	397	3.4836	.75066	.03767
	State	348	3.4885	.56547	.03031

item68	Federal	397	2.9678	.63227	.03173
	State	348	2.8420	.82173	.04405
item69	Federal	397	3.4736	.70884	.03558
	State	348	3.1408	.93306	.05002
item70	Federal	397	3.2141	.85103	.04271
	State	348	3.3190	.77347	.04146
item71	Federal	397	3.3149	.79716	.04001
	State	348	3.2155	.97348	.05218
item72	Federal	397	3.4610	.75986	.03814
	State	348	3.5575	.56265	.03016
item73	Federal	397	3.2040	.85350	.04284
	State	348	3.0833	.69287	.03714
item74	Federal	397	3.4282	.68388	.03432
	State	348	2.7902	.76991	.04127
item75	Federal	397	3.1436	.59632	.02993
	State	348	3.3305	.72222	.03872
Totalstressman	Federal	397	2.9702	.20861	.01047
	State	348	2.8902	.20038	.01074

Independent Samples Test

	Levene's Test for Equality of Variances		t-test for Equality of Means						
	F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference	
								Lower	Upper
item49 Equal variances assumed	647.836	.000	12.385	743	.000	.57843	.04670	.48674	.67012
			11.808	443.619	.000	.57843	.04899	.48216	.67471

item50	Equal variances assumed	268.976	.000	8.911	743	.000	.41872	.04699	.32647	.51096
	Equal variances not assumed			8.603	523.744	.000	.41872	.04867	.32310	.51433
item51	Equal variances assumed	19.479	.000	.566	743	.572	.02044	.03614	-5.05020E-2	.09138
	Equal variances not assumed			.556	649.512	.578	.02044	.03674	-5.17064E-2	.09259
item52	Equal variances assumed	2.516	.113	1.790	743	.074	.06649	.03715	-6.43260E-3	.13941
	Equal variances not assumed			1.774	694.271	.076	.06649	.03748	-7.08933E-3	.14007
item53	Equal variances assumed	69.727	.000	.771	743	.441	.03208	.04159	-4.95741E-2	.11373
	Equal variances not assumed			.751	586.102	.453	.03208	.04269	-5.17704E-2	.11593
item54	Equal variances assumed	126.643	.000	6.556	743	.000	.29855	.04554	.20916	.38795
	Equal variances not assumed			6.381	578.978	.000	.29855	.04679	.20666	.39045
item55	Equal variances assumed	38.906	.000	1.119	743	.264	.04627	.04135	-3.49111E-2	.12746

	Equal variances not assumed			1.098	637.406	.272	.04627	.04213	-3.64484E-2	.12900
item56	Equal variances assumed	226.479	.000	6.895	743	.000	.32633	.04733	.23342	.41924
	Equal variances not assumed			6.672	538.751	.000	.32633	.04891	.23025	.42242
item57	Equal variances assumed	8.966	.003	8.657	743	.000	.50852	.05874	.39320	.62384
	Equal variances not assumed			8.626	718.479	.000	.50852	.05895	.39279	.62425
item58	Equal variances assumed	66.195	.000	5.435	743	.000	.23955	.04408	.15302	.32608
	Equal variances not assumed			5.503	740.404	.000	.23955	.04353	.15409	.32500
item59	Equal variances assumed	21.320	.000	-.057	743	.955	-2.59127E-3	.04585	-9.26106E-2	.08743
	Equal variances not assumed			-.057	738.227	.954	-2.59127E-3	.04522	-9.13754E-2	.08619
item60	Equal variances assumed	14.701	.000	-6.153	743	.000	-3.79781E-1	.06172	-5.00953E-1	-.25861

	Equal variances not assumed			-6.108	702.148	.000	-3.79781E- 1	.06217	-5.01848E-1	-.25771
item61	Equal variances assumed	26.074	.000	1.824	743	.069	.07723	.04234	-5.89731E-3	.16036
	Equal variances not assumed			1.866	709.060	.063	.07723	.04140	-4.04333E-3	.15851
item62	Equal variances assumed	1.341	.247	-4.466	743	.000	-2.54973E- 1	.05709	-3.67053E-1	-.14289
	Equal variances not assumed			-4.448	716.443	.000	-2.54973E- 1	.05732	-3.67510E-1	-.14244
item63	Equal variances assumed	48.098	.000	1.258	743	.209	.07869	.06253	-4.40640E-2	.20145
	Equal variances not assumed			1.271	742.682	.204	.07869	.06191	-4.28453E-2	.20023
item64	Equal variances assumed	137.312	.000	.422	743	.673	.02767	.06554	-1.00992E-1	.15634
	Equal variances not assumed			.432	712.750	.666	.02767	.06412	-9.82228E-2	.15357
item65	Equal variances assumed	11.359	.001	-.559	743	.576	-2.48125E- 2	.04437	-1.11921E-1	.06230

	Equal variances not assumed			-567	738.339	.571	-2.48125E- 2	.04376	-1.10731E-1	.06111
item66	Equal variances assumed	27.336	.000	4.959	743	.000	.29198	.05888	.17639	.40757
	Equal variances not assumed			4.987	741.498	.000	.29198	.05854	.17705	.40691
item67	Equal variances assumed	21.217	.000	-.099	743	.921	-4.87854E- 3	.04924	-1.01549E-1	.09179
	Equal variances not assumed			-.101	726.979	.920	-4.87854E- 3	.04836	-9.98107E-2	.09005
item68	Equal variances assumed	41.087	.000	-8.883	743	.000	-4.74196E- 1	.05338	-5.78990E-1	-.36940
	Equal variances not assumed			-8.735	647.749	.000	-4.74196E- 1	.05429	-5.80800E-1	-.36759
item69	Equal variances assumed	16.754	.000	5.518	743	.000	.33275	.06030	.21436	.45113
	Equal variances not assumed			5.421	642.755	.000	.33275	.06138	.21222	.45327
item70	Equal variances assumed	9.538	.002	-1.751	743	.080	-1.04860E- 1	.05990	-2.22456E-1	.01274

	Equal variances not assumed			-1.762	742.020	.079	-1.04860E-1	.05953	-2.21720E-1	.01200
item71	Equal variances assumed	7.331	.007	1.531	743	.126	.09934	.06491	-2.80788E-2	.22677
	Equal variances not assumed			1.511	671.517	.131	.09934	.06576	-2.97671E-2	.22846
item72	Equal variances assumed	28.862	.000	-1.947	743	.052	-9.65141E-2	.04957	-1.93818E-1	.00079
	Equal variances not assumed			-1.985	723.352	.048	-9.65141E-2	.04862	-1.91970E-1	-.00106
item73	Equal variances assumed	76.904	.000	2.100	743	.036	.12070	.05747	.00788	.23352
	Equal variances not assumed			2.129	738.744	.034	.12070	.05670	.00939	.23200
item74	Equal variances assumed	2.130	.145	11.978	743	.000	.63798	.05326	.53342	.74255
	Equal variances not assumed			11.885	699.692	.000	.63798	.05368	.53259	.74337
item75	Equal variances assumed	49.718	.000	-3.867	743	.000	-1.86883E-1	.04833	-2.81759E-1	-.09201

Equal variances not assumed			-3.819	674.559	.000	-1.86883E-1	.04893	-2.82965E-1	-.09080
Totalstr Equal essman variances assumed	.816	.367	6.581	743	.000	.09897	.01504	.06945	.12850
Equal variances not assumed			6.598	736.796	.000	.09897	.01500	.06953	.12842