Time Management and Job Performance of Lecturers in State Universities Across South-East Nigeria: A Stress Management Approach

[1]Udeh, Promise Chukwuedozie,
[2]Onwuka, Julius O., &
[3]Oti, Evaristus O.

[1]*Nigeria Maritime University, Okerenkoko, Delta State.*
[2&3]*Department of Sociology, Abia State University, Uturu, Nigeria*

Corresponding Author:
Udeh, Promise Chukwuedozie

Abstract

Lecturers in Nigerian universities are confronted with enormous career challenges occasioned by inability to harness their performance through effective time management. The study therefore examined the time management and job performance of lecturers in state universities across south-east Nigeria. The pickle jar theory of time management was used as a framework, and a cross-sectional descriptive survey was utilized. A sample size of 1,422 respondents, comprising 1,414 respondents and 8 key persons' interviewees were randomly drawn from the four selected universities namely: Abia State University, Chukwuemeka Odumegwu Ojukwu University, Enugu State University of Science and Technology and Imo State University. A structured questionnaire was administered proportionally to the respondents using Yamane's (1967) formula. The multi-stage sampling techniques involving simple random sampling, and purposive sampling was adopted to select respondents and 10 faculties were randomly drawn. 3 departments were selected by simple random sampling from each faculty. The departments were proportionately sampled, and quantitative data was analysed using descriptive statistics such as simple frequency distribution tables, percentages, weighted mean score. ANOVA inferential statistics was used to test the stated hypothesis (P value= < 0.01), while qualitative data was collected through in-depth interview. The study found that majority of university lecturers do not utilize time management tools such as ICT, delegation of duties, utilization of work plan and job prioritization. It recommends that academics should adopt time management strategies such as ICT and delegate responsibilities to maximize their performance.

Background to the Study

Increasing enrollment into universities across Nigeria has increased pressure to accomplish job tasks to meet the mandate of producing the needed professional manpower for the country. Specifically, lecturers are saddled with the implementation of formal education curriculum and require effective performance to produce competent manpower for cultural, scientific, and technological development of Nigeria. Hence, the success of the university system in achieving its objectives depends on lecturers' ability to allot time to tasks that may lead to stress. Every activity carried out in an educational institution depends on time allocated to it, hence, time is a veritable strategy in stress management. Muhammad, Sami, Ehsan, Khan & Rahim (2011) averred that time is an intellectual structure which related to space, event or activity. Time is measurable, hence, when lost, time cannot be regained. By matching time with schedules, man can apportion tasks, prioritize goals, and attain ambitions without which stress sets in. Stress is a result of incongruence arising from job demands and expectations. Stress includes the physical, mental, or emotional factors that cause bodily or mental tension (Sadiq & Rehman, 2018; Amaraegbu, 2019). In a university setting, stress arises from poor time allotted to excessive workloads, large class sizes and other factors which may distort work plan, reduce concentration and loss of interest on the job.

Unmanaged stress has been attributed to poor relationship with colleagues, students and family members, and poor concentration in the classroom (Yang, Shen, Zhu, Liu, Deng, Chen & See, 2016; Adom, Chukwuere & Osei, 2020). On the other hand, time management have been adduced to improve employees' ability to accomplish tasks in record time by adding expected value to the organization. In tertiary institutions, lecturers' values include ability to impact knowledge, grade examination results, supervise students research work, adequately publish quality books and journals, gain globally recognized research citations that increases professional visibility and university ranking, win award and honors, and participate in community service schedules as and when expected.

School activities are allocated within time frames which specifies tasks and methods of accomplishing each. Proper time management enables lecturers to set achievable short-term and long-term goals. A short-term goal may include marking specific numbers of examination scripts per day and attending to number of supervisees per week. Time management stresses the need to outline schedules according to priority. Setting priorities for each day, week, month and semester can help lecturers to prioritize goals. Prioritization ensures that important activities such as religious events, sleep, physical exercises, and domestic tasks which are not urgent, do not take precedence over academic demands. Time management also considers long-term goals which includes setting out research targets to embark upon within a defined time frame. Adoption and implementation of time management strategies is also an important strategy for improving job performance. This is because, knowledge and implementation of time management is beneficial for stress management, personal growth and group building activities (Majidi, Jafari & Hosseini, 2012). Time management may be tailored to meet core areas such as, the need for delegation of duties to junior academics to ease overburden and
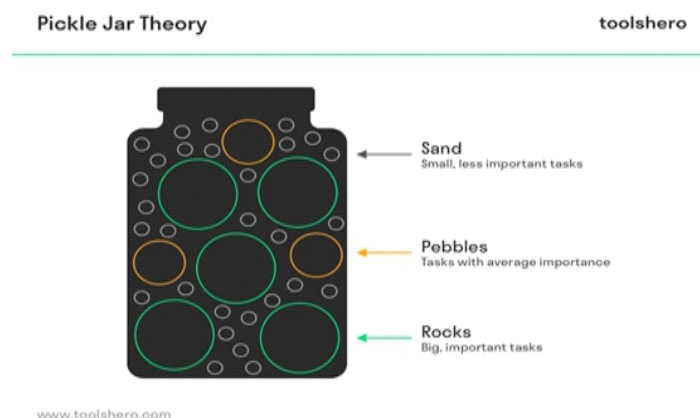
provide ample opportunities for senior academics to plan adopt modern Information Communication Technology (ICT) tools and participate in university committees and administrative positions.

Adoption and implementation of modern ICT tools such as online classes to reduce the overburden of physical class attendance, present conference papers, and save precious time associated with road trips are potent time management strategies that reduces work stress and increase performance. In the university system, indices such as the ability to impact knowledge, grade examination results, supervise students research work, adequately publish quality books and journals and gain globally recognized research citations that increases professional visibility and university ranking are key performance indicators. Despite these indicators, poor research output from Nigeria universities which may not may not be unconnected to poor time management skills required to combine assessment of large numbers of examination scripts, attend faculty and department meetings, partake in board meetings and university committees alongside domestic roles (Nwabueze, Edikpa & Chukwuma, 2018). These unplanned schedules arising from poor time management leads to lack of priorities and focus, procrastination, lack of sleep and low punctuality (Knowlden, 2023). These have commensurate negative implications on research output in Nigerian universities and the quality of local graduates who are expected to contribute to national development (Osaat & Ekechukwu, 2017). Considering the implications of unmanaged stress, is it clear that poor time management debilitates lecturers' performance.

Theoretical Framework
The pickle jar theory of time management developed by Jeremy Wright in 2002 is suitable for this study. The theory serves as a visual metaphor to determine what is useful and what is not useful with the goal of ensuring that daily priorities of employees are planned in relation to time and priorities. Nwabueze, et al (2018) posit that, "individuals have many large priorities in lives such as studies, workload, leisure, family responsibilities, sleep and rest, which must be followed with time management. In wright's Analogy, a typical jar comprises of sand, pebbles, rocks and water.

Fig. 1

The jar of pickles represents a typical day, while the sand, pebbles, and rocks represent everyday activities. Wright (2002) explained that:

1. The sand represents trivial works such as social networking.
2. The pebbles are the tasks with higher levels of significance than sand. They include responding to emails, meetings, telephone calls, etc.
3. The rocks comprise of the most significant tasks in every workday work which include teaching, research and administrative duties.
4. Water represents time spent with family and friends.

The pickle jar emphasize that time management promotes prioritization of task in Nigerian universities (Nwabueze, 2016). The theory is relevant to this study in view of numerous challenges such as 'perception of role in the university', 'career development' and unfriendly 'university climate' which face lecturers in state owned universities in comparison to their counterparts in federal universities (The Free Library, 2013). To mitigate stressors that promotes underperformance, individuals must give special attention to daily priorities as the best time management strategy for accomplishing major tasks (Mraovic, 2023). Without adherence to time management principles as enunciated in the pickle jar framework, it is difficult to adopt strategies that will enhance work-life balance needed for better performance.

Research Design
The study adopts a descriptive survey design, employing pre-set questions for respondents from five southeastern Nigerian state-owned universities: Abia State University, Chukwuemeka Odumegwu Ojukwu University, Ebonyi State University, Enugu State University of Science and Technology, and Imo State University. These universities comprise 3,130 lecturers. The research sample consists of 1,414 lecturers, statistically determined using Yamane's formula. Additionally, qualitative insights were gathered from eight interviewees, including faculty deans and ASUU executive members. A multi-stage sampling method involving simple random and purposive techniques was used. Quantitative data relied on a Likert scale questionnaire while qualitative data stemmed from in-depth interviews. SPSS analyzed quantitative data, employing descriptive statistics and ANOVA for hypotheses testing, while QDA Miner software processed and interpreted qualitative insights.

Test of Hypothesis
H_O: Time management practice of lecturers of state universities in the south-east has no significant variation on their job performance.
H_1.   Time management practice of lecturers of state universities in the south-east has significant variation on their job performance.

To determine the statistical variation between time management practices of lecturers of state universities in the south-east and job performance, an ANOVA test was conducted. The result is presented below:

Table 1: Cross Tabulation between Time Management and Job Performance

	Sum of Squares	Df	Mean Square	F	Sig.
Between Groups	239.486	1	239.486	184.530	.000
Within Groups	3379.513	2604	1.298		
Total	3618.999	2605			

Mean Square = 239.486, df=1, P value= < 0.01
*Significant variation on job performance

The research unveiled a statistically significant variation between the time management practices of lecturers in state universities in the south-east and their job performance, with a p-value of less than 0.01. This suggests that there is a significant difference of time management practices on the job performance of lecturers in state universities in the south-east.

Results and Analysis
For this study 1,414 copies of the questionnaire were distributed and only 1,303 (92.1%) were returned. The socio-demographic profile of the respondents revealed that 134 (10.3%) respondents are within the ages of 20-29 years. 381 (29.2%) respondents are within the ages of 30-39 years, 33.0% (430%) are between the age of 40 – 49 years of age, 430 (33.0) respondents are within 40-49 years, 150 respondents representing 11.5% are within the age bracket of 50-59, and 208% respondents representing 16.0% are 60 years above. Hence, most of the respondents fall within the age bracket of 40-49 years. In terms of sex composition 892 respondents (68.5%) are male, while 411 female respondents representing 31.5% are selected for the study. Therefore, majority of the respondents are male lecturers. Data shows that 1,104 (84.7%) are Christians, 49 (3.8%) are Muslims, while 150 (11.5%) are traditional religion adherents. This shows that majority of the respondents are Christian religion adherents.

With regards to marital status, 358 respondents (27.4%) are single, 139 respondents (11.6%) are divorced, 143 respondents (11.9%) are separated, 127 respondents (9.6%) are widowed, 74 respondents (5.6%) are co-habiting, while 462 respondents (35.4%) are married. Hence, we conclude that a high proportion of the respondents are married. The study also found that 882 respondents which constitute 67.7% are Ph.D. holders in their various disciplines, while only 421 respondents which make up 32.2% percent are second degree certificate holders. Therefore, majority of the respondents in this study are Ph.D. holders. In terms of official rank, data reveals that 127 respondents (10.0%) are assistant lecturers, 261 (20.0%) are lecturer 2, 234 (31.7%) are lecturer 1, 414 (12.5%) are senior lecturers, 163 (8.0%) are associate professors, while 104 (18.0) are professors. This means that lecturer 2 are more in the sample.

Substantive Issues on Stress Management and Job Performance among Lecturers
Analyses are made using the Likert scale technique which involves the computation of the scores of responses and means. The mean for each questionnaire item is compared with

the criterion mean and decision is taken on whether the questionnaire item is "positive" or "negative" to the issue under discussion. The mid-point of 2.50 is taken as the criterion mean. Questionnaire item with a mean value of 2.5 or more is regarded as "positive" while item with mean value less than 2.5 is regarded as "negative".

Table 2: Responses on Whether Lecturers in State Universities in Southeast Nigeria Implement Time Management Strategies to Overcome Stress

S/N	Item Caption	Response				Total Weighted score	Total number of respondents	Mean score	Decision	Group Mean
		SA	A	D	SD					
1	Delegation as time management strategy	218 (872)	300 (900)	446 (892)	276 (276)					
2	Workplan to manage time and reduce stress	207 (828)	187 (561)	675 (1350)	234 (234)	2973	1303	2.28	Reject	
3	ICT to reduce paperwork's and manage time	120 (480)	454 (1362)	729 (1458)	0	3300	1303	2.53	Accept	
4	Time allocation to each daily academic activity	126 (504)	320 (960)	509 (1018)	348 (348)	2830	1303	2.17	Reject	
5	Trained on time management upon employment	150 (600)	175 (525)	497 (994)	481 (481)	2600	1303	1.99	Reject	
6	Time management alleviates job stress	290 (1160)	95 (285)	503 (1006)	415 (415)	2866	1303	2.19	Reject	
7	Time management alleviates job stress and helps job performance	172 (688)	105 (315)	589 (1178)	439 (439)	2620	1303	2.01	Reject	

Source: Field Survey, 2023

Table 2 shows the responses on whether lecturers in state universities in south-east Nigeria implement time management strategies to overcome stress. To uncover whether lecturers utilize delegation as a personal time management strategy to improve their job performance, questionnaire item 1 show that 218 respondents strongly agree that they delegate responsibilities as strategy to improve their job performance and 300 respondents agree. However, 446 respondents and 276 respondents disagree and strongly disagree that they delegate duties as method of managing their time. The mean score of 2.25 is therefore in the negative meaning that lecturers do not use delegation as time management strategy.

Questionnaire item 2 probe whether lecturers specify their workplans as a time management and stress reduction technique. 297 respondents strongly agree that they draw up a work plan for their academic activities, while 187 agree. On the other hand, 675 and 234 respondents disagree and strongly disagree with the item. Their mean score which is 2.28 shows that lecturers do not specify their workplans as a time management strategy.

Questionnaire item 3 enquired if the lecturers utilize ICT to reduce paper works and manage their time. Responses show that 120 respondents strongly agree, 454 agree, while 729 disagree. The mean score of 2.53 indicates that lecturers utilize ICT tools to reduce paperwork and manage their time. Questionnaire item 4 seek to know whether lecturers allocate time to their daily academic activities. Data show that 126 respondents strongly agree that they allocate time to their daily activities, 320 agree, 509 disagree, while 348 strongly disagree. The mean score of 2.17 indicates that lecturers do not allocate time to their daily activities.

Furthermore, questionnaire item 5 sought to know whether lecturers were trained on time management upon employment. 150 and 175 respondents strongly agree and agree with the question respectively, while 497 and 481 respondents disagree and strongly disagree respectively. The mean score of 1.99 is negative and rejected. This shows that state universities in the zone do not train their lecturers on time management when they are employed.

Questionnaire item 6 examined whether time management practice alleviates job stress among lecturers. From the responses, 290 respondents strongly agree that job stress is alleviated when time management strategies are utilized, 95 agree, while 503 and 415 respondents disagree and strongly disagree respectively. The mean score of 2.19 rejects that time management in the opinion of the research is an effective stress management practice among lecturers.

Finally, the study uncovered if time management practices alleviate stress experience and helps job performance. To this end, responses to questionnaire item 7 show that 172 respondents strongly agree, 105 agree, while 589 and 439 respondents disagree and strongly disagree respectively. The mean score of 2.01 shows that time management does not alleviate job stress and increases lecturers' performance. In summary, the group mean score of 2.20 shows that lecturers of state universities in southeast Nigeria do not implement time management strategies to overcome stress.

Analysis of Qualitative Data (Key Person Interviews)
For the analysis of qualitative data, majority of the interviewees explained that they do not utilize time management strategies in their daily academic activities. For instance, on the use of ICT in time management, a respondent explained thus:

> *Our universities are mostly outdated. Except you have purchased a personal data or computer, the institution wifi has gone comatose, I don't think we even have an internet network here (Male, Age 64; Married; Ph.D.; length of service 11 years; Dean).*

In other to find out if computers and other ICT equipment are readily available to lecturers in discharging their duties, respondent reveal that:

> *There was a time the university provided a tablet to every HOD. But because of the poor lighting system, that equipment are no longer in*

use. There was also a time that every HODs were given digital notebooks to ease the work, but I don't know whether those notebooks are still working because when I was HOD, I handed over my own to the person that succeeded me. But apart from that, lecturers are not given such devices…I don't think funds are even allocated for lecturers to purchase ICT equipment. (Male, Age 51; Married; Ph.D.; length of service 21 years; Dean).

In time management training, a respondent explained that:
I was not trained on any time management technique. We don't even know if such trainings exist here…I can tell you that none of my colleagues have ever attended trainings on time management (Male, Age 46; Married; Ph.D.; length of service 21 years; Dean).

When probed further on the state of delegation as a time management strategy, an interviewee noted that:
Most senior academics want to do the jobs all by themselves, they have doubt on the capacity of junior ones to deliver. For instance, many professors find it difficult to give their examination scripts to their juniors for assessment (Female, Age 40; Married; Ph.D.; length of service 10 years; ASUU executive).

Findings from the qualitative data falls in line with the quantitative findings which showed that lecturers in state universities in south-east Nigeria are not provided with adequate knowledge on time management tools required to overcome stress.

Discussion of Findings
The study examined the impact of time management in relieving job stress and promoting job performance of lecturers in state universities across south-east Nigeria. It found that majority of lecturers do not leverage on time management tools such as delegation of duties, utilization of workplan and time allocation. While studies by Abubakari, Inusah & Abdulai (2023) showed that heavy reliance on ICT reduces paperwork and increases efficiency, findings from qualitative data generated from this study reveal that although, lecturers are aware of the benefits of ICT to stress management, there is low ICT use among lecturers in state universities in south-east Nigeria.

Responses from interviewees further show that state universities in the southeast do not provide their academic staff with time management training upon employment. Whence, lecturers are unable to manage their time in the face of daunting academic expectations. Although, the quantitative data showed high compliance to ICT knowledge among lecturers, the study decipher that this position may be tied to the individual initiatives of lecturers to use their own ICT equipment because of the inability of university administrations to provide same. The implication is, what then is the fate of lecturers who cannot afford computers and other ICT systems to reduce paper works and manage time?

The inability to efficiently manage time has reverberating effect on stress and job performance (Nwabueze et al, 2018). The findings from interviewees are in line with the revelations of Abubakari *et al* (2023) which found that inadequate budgetary allocation and unstable internet connections are major challenges bedeviling the deployment of ICT in Tamale Technical University, Ghana, and Nigeria is not exempted from this challenge.

The hypothesis found that there is a significant variation between time management and job performance at *p = 0.01.* The study found that adoption of ICT facilities particularly and a combination of other factors proved useful in management of time thereby enhancing efficiency among the lecturers. The hypothesis corroborates the findings of Nwabueze (2016) and Nwabueze *et al* (2018) which explained that effective performance among academics is tied to proper time management.

Recommendations
In other to improve the job performance of university lecturers in state owned universities across south-east Nigeria, the study recommends that academics should adopt time management strategies such as drawing up a to-do-list and delegate responsibilities to their colleagues, this will enable them to work in line Wright's pickle jar theory; ensuring that academics prioritize their tasks and improve their performance. Furthermore, university management should distribute ICT tools to reduce paperwork, introduce time management trainings to new employees as a stress reduction strategy.

References

Abubakari, A., Inusah, M., & Abdulai, A. (2023). The effects of information technology on administrative efficiency of tamale technical university, *American Journal of Industrial and Business Management.* 13, 394-417.

Adom, D., Chukwuere, J., & Osei, M. (2020). Review: Academic stress among faculty and students in higher institutions, *Journal of Humanities and Social Sciences.* 28 (2), 1055-1064.

Amaraegbu, P. (2019). Managing workplace stress. *The Guardian.* *https://guardian.ng/eatures/health/managing-workplace-stress.*

Knowlden, A. (2023). *Poor time management causes poor sleep for college students,* Retrieved from sciencedaily.com/releases/2023/08/230808151250.htm.

Majidi, T., Jafari, P., & Hosseini, A. A. (2012). The effect of stress management technique on the ports and shipping organization employees' happiness. *Procedia - Social and Behavioral Sciences.* 47, 2162-2168.

Mraovic, J. (2023). *The pickle jar theory of time management*, Retrieved from *https://clockify.me/blog/managing-time/pickle-jar-theory/*

Muhammad, U. S., Sami, E. F. H., Ehsam, A. K., Ekhan, S. & Rahim, J. (2011). High level principles of time management in Islam, *International Journal of Sociality and Economics Development (IPEDR).* 10, 290-296.

Nwabueze, A. I. (2016*). Time management for quality service delivery in universities in south-east, Nigeria.* Ph.D. Thesis, university of Port Harcourt, department of educational management.

Nwabueze, A. I., Edikpa, E. C., & Chukwuma, I. S. (2018). Timing the work for enhanced administrative performance in universities, *International Journal of Development Research.* 8 (7). 21982-21991.

Osaat, D. S. & Ekechukwu, R. (2017). Managing workload of academic staff for job effectiveness in Nigerian universities: A study of university of Port Harcourt in south-south geopolitical zone of Nigeria, *International Journal of Humanities Social Sciences and Education.* 4(12), 102-108.

Sadiq, M. & Rehman, K. U. (2018). Impact of stress on student academic performance of secondary school level at district vehari, *International Journal of Learning and Development.* 8 (1). 84-93.

The Free Library (2013). Comparison of occupational stress among academics in federal universities in Nigeria, *https://www. The free library. com/ comparison of+ occupational+stress+academics+in+federal+and+state0367546129*

Wright, J. (2002). Time management: the pickle jar theory, *Project Management Journal* 4(1).

Yamane, T. (1967). *Statistics: an introductory analysis*, 2nd ed, New York: Harper and Row.

Yang, T., Shen, Y., Zhu, M., Liu, Y., Deng, J., Chen, Q. & See, L. (2016). Effects of co-worker and supervisor support on job stress and presenteeism in an aging workforce: A structural equation modeling approach, *International Journal of Environmental Research and Public Health.* 13(1).