

PAPER • OPEN ACCESS

FACTORS AFFECTING THE EFFECTIVENESS OF MAINTENANCE IN POSTGRADUATE HOSTELS IN HIGHLY RANKED NIGERIAN UNIVERSITIES

To cite this article: O.N. Osazuwa *et al* 2021 *IOP Conf. Ser.: Earth Environ. Sci.* **655** 012002

View the [article online](#) for updates and enhancements.



ECS **240th ECS Meeting**
Oct 10-14, 2021, Orlando, Florida
**Register early and save
up to 20% on registration costs**
Early registration deadline Sep 13
REGISTER NOW

FACTORS AFFECTING THE EFFECTIVENESS OF MAINTENANCE IN POSTGRADUATE HOSTELS IN HIGHLY RANKED NIGERIAN UNIVERSITIES

O.N. Osazuwa, C. O. Iroham, A. O. Oluwunmi

Department of Estate Management, Covenant University, Ota, Ogun State, Nigeria

Corresponding email: osmond.iroham@covenantuniversity.edu.ng

Abstract. This paper examined factors affecting efficient maintenance of postgraduate hostels in highly ranked Nigerian Universities. The study population consists of selected top-ranked universities in south-western Nigeria according to times higher education ranking year 2020 namely: Covenant University, University of Ibadan and University of Lagos. The sample size was made up of 120 students, 40 selected from each institution based on convenient sampling techniques. A well self-structured questionnaire was administered as an instrument to collect relevant data appropriate for the survey. Out of the 120 questionnaires distributed, the entire 120 were retrieved. The aim of this paper is to determine the major factors that affect efficient maintenance in Postgraduate hostels. The study which is a survey collated data that were analyzed using descriptive statistics on an excel spreadsheet with the aid of the SPSS software. The findings showed that response time is a major factor that affects efficient maintenance in the hostels which could affect students comfort. The study recommends that the universities should create a special facility management office in each of the postgraduate halls of resident's order than the existing facility management team and employ facility management professionals. That way, students will conveniently have easy access to the team so as to lay their complaints. The university management should also create an electronic customer service platform for laying down complaints and collecting feedback for progress of work done, while evaluation of Student's occupancy should be a routine exercise.

Keywords: Facilities, Maintenance, Universities, Nigeria.

1. Introduction

Facility maintenance is very significant for long term preservation and infrastructural survival in any given university environment. Generally, 80% of assets like class tables, chairs, air conditioners, toilet facilities and wardrobes amongst others owned by well-established institutions (Universities) represent facilities, [1].

Tertiary institutions are usually considered as a number one priority to individual and societal aspirations [2]. Our immediate society is of the opinion that tertiary institutions are the training hub to develop the minds of the future industry stakeholders. The maintenance of higher institutions should therefore be given utmost consideration for basic improvements and student's welfare. Maintenance is also paramount for long life span of any given structure. [3] asserted that lack of proper maintenance causes the structure to deteriorate or become obsolete faster than it ought to. This however should not be an option in any tertiary institution considering the general believe of the society about universities. Furthermore, poor maintenance of facilities has negative effects on the general performances of students, [4]. The conducive environment, accommodation and satisfaction level of students residing in hostels has been studied by various researchers over the years. These studies has revealed that good facilities and proper hostel conditions have positive influence on students enrolment [5]. However, satisfaction level of students cannot be positive if the structure and facilities are not



effectively maintained. According to [6] student's accommodation in Nigeria has not been given much attention by both the government and management of tertiary institutions. Student's need comfortable accommodations in an environment that is well conducive with good facilities to enable them carry out their primary function in their various institutions as expected. However, this has proven otherwise as recent studies have revealed facility deficiencies and dissatisfaction amongst students in Nigerian universities, [7]. It is therefore necessary for the management team in tertiary institutions to frequently and adequately maintain the facilities to improve student's wellbeing as well as their performances. Numerous works have been done with respect to factors that affect efficient maintenance of buildings. One of such works can be seen in the study carried out by [8] on establishing factors influencing building maintenance practices from Ghanaian perspective which revealed that inadequate funding, use of unskilled laborers, poor design from inception and misuse after completion are some of the factors militating against maintenance decisions. Their study however recommended that in every building, maintenance should be considered in the planning and design stage. [9] undertook a study on factors affecting maintenance management of education Trust Fund buildings of tertiary institutions in Osun state and opined that discernable maintenance culture should be practiced in public buildings to give rise to productive maintenance and adequate funds should be set aside for maintenance management of buildings. When a building lacks adequate phasing of maintenance workload, there will be increased uneconomical maintenance management practice, [10]. Their study was centered on maintenance confined to the undergraduate hostels amongst other structures in public schools in Kaduna State. It was discovered by [11] in an analytical study of factors affecting building maintenance that lack of maintenance knowledge by investors has prevented the introduction or application of professional approach to maintenance culture. However, it appears that there are no works on the efficient maintenance of postgraduate halls of residence. What has been studied concerning the postgraduate hall of residence has been related to the satisfaction of users [12]. This present study is geared towards ascertaining the factors affecting the effectiveness of maintenance of postgraduate halls of residence. The focus is on three (3) selected Southern-Nigerian top ranked universities chosen based on world ranking by the Times Higher Education (THE) ranking body. The Universities are Covenant University, Ota; University of Ibadan and University of Lagos. These universities that are doing well in research and other parameters of ranking are expected to have a holistic approach in operation that does also cater for the buildings of which the postgraduate hall of residence forms part. An exclusive study of the postgraduate hall of residence is due to the research focus which these set of occupants are expected to drive. This happens to be the crux of this present study.

2. Literature Review

Education as it is generally known is a platform for learning. It is the empowerment and adequate development of industrial, social and economic growth in any given country, [13]. For state, federal and private university institutions, it is the duty of the government as well as the management team in private institutions to ensure adequate provision for students and most importantly maintain the facilities adequately and regularly. According to [14], Universities in Nigeria has witnessed a massive growth in student's yearly admission. Due to the singular fact that students are the primary beneficiaries of all academic facilities, it is advised that they are given primary attention in terms of satisfaction over other users, [15]. Their study investigated student's satisfaction with classroom facilities and recommended

that the Universities should keep working towards ensuring that facilities are first considered when making financial decisions.

Student's hostel has been researched upon by different scholars from various perspectives. In a study carried out by [16], they are of the opinion that students hostel is a major consideration that must be put in place before making a choice for higher learning. On-campus accommodation for students covers a larger part of the built environment in higher institutions and it represents the largest facility assets in any given university, [17]. This buttresses the view of [1] that 80% of assets owned by well-established institutions represent facilities. Facility Maintenance is of utmost importance in the success of service and manufacturing establishments, [18]. Another study was examined by [19] on international student's satisfaction. They suggested that there should be a maintenance management practice to university hostels facilities to improve the already existing comfort of overseas students. According to [20], qualitative adequacy should be a major concern to the management of the universities, the government, parents and all other stakeholders. This is simply to ensure the comfort of students in the pursuit of an excellent academic carrier. An assessment of quality condition of student's hostels was studied and it was revealed that part of the facilities were in good condition however, overcrowding was a major concern [21]. They advised that the issues of squatters in the student's hostels should be promptly tackled. Further research was carried out by [2], the authors were of the opinion that maintenance programme in tertiary institutions are highly influenced by environmental and climatic conditions, his study also revealed availability of funds to be the most critical factor influencing maintenance programme in southwestern Nigerian universities. Maintenance of hostels has been linked with students' satisfaction. Hence, the understanding of students' satisfaction predicting factors can serve as a guide to tertiary institutions to embark on changes to improve the level of satisfaction amongst students [5]. For students' to actually be satisfied with accommodation provided there is need for expansion and growth to accommodate all their numerous activities. The growth has however been linked to prevailing interest rate and loan [22]. When such growth has been established, it is expected to be furnished with adequate facilities, quality of service, preferred location and neighbourhood, affordable price and sufficient security to appeal to students [23].

Students' satisfaction could be quite expensive in any given tertiary institution. However, [24] have advocated the build, operate and transfer approach in meeting the required needs for students. A study on the assessment of facility management service in Henry Carr postgraduate hostel in University of Lagos was carried out by [12]. They focused on comparing student's expectation and perception on the quality of service in the hostel. Their findings revealed low quality service in the hostel contrary to student's expectations and they were of the opinions that prompt managerial and quality service delivery should be a priority even as they strive towards achieving the institutions cooperate goal. [25] analyzed private school hostels in Nigerian tertiary institutions using federal university of technology (FUTA) as a case study. Their study suggested that investors should focus on investing on campus rather than off campus. The numerous reports on student's ill health in hostels agitated the minds of [26] to assess facilities in male hostels in University environments. Their aim was to establish necessary guidelines or platforms to improve the worth, aesthetics and quality of hostels in Nigerian tertiary institutions. [27] studied the level of satisfaction with undergraduate hostels and it revealed three 3 main challenges disturbing the comfort of

students which are electrical works, civil works and the general poor services been provided in the building. They recommended steady and effective maintenance for student's welfare as well as the management team. According to [28] student's hostels are seen from two main perspectives. It either assesses satisfaction, quality and perception with a common goal of students comfort or general academic performance. Although, several studies have been carried out on student's hostels, there appears to be no work that has centred on factors affecting the efficient maintenance of facilities in postgraduate hostels in southwest Nigeria. This study therefore tends to partly fill this gap in literature by examining the major factors that militates against the effective maintenance of postgraduate halls of residence in the selected Universities.

3. Material and Methods

The research design used for this study is the cross sectional survey whereby questionnaires were administered as an instrument for the collection of relevant data. This method was suitable and ideal for the study because it involved gathering information from university students with a view of determining the major factors that affect effective maintenance of their hostels. Convenience sampling technique which is a type of non probability sampling technique was adopted to reach the target population of which 40 students each were selected from Covenant University, University of Lagos and University of Ibadan being the selected universities for the study which gives a total of 120 students and this represents the sample size for the survey. SPSS software was used to analyze the data with the help of an excel spreadsheet.

4. Results and Discussion

Results and Discussion

Table 1. What is your Degree of study?

Degree	Freq	Percent	Valid Percent	Cumulative Percent
Msc.	104	86.7	86.7	86.7
MBA	9	7.5	7.5	94.2
Ph.D.	7	5.8	5.8	100.0
Total	120	100	100	

Table 1 shows the respondents degree of study in the three (3) selected universities. The result reveals that 104 respondents (86.7%) are studying M.sc, 9 respondents (7.5%) MBA while 7 respondents (5.8%) are studying PhD

Table 2. Which institution do you attend?

Institution	Frequency	Percent	Valid Percent	Cumulative Percent
Covenant University	40	33.3	33.3	33.3
University of Lagos	40	33.3	33.3	66.7
University of Ibadan	40	33.3	33.3	100.0
Total	120	100.0	100.0	

Table 2 represents the various institutions attended by the respondents. The results shows that 40 respondents (33.3%) attend covenant university, 40(33.3%) attend university of Lagos while 40 (33.3%) attend university of Ibadan. The results are the same due to the fact that all the questioners were received from 40 students in each university, selected based on convenient sampling technique.

Table 3. What is your year of study?

Year	Frequency	Percent	Valid Percent	Cumulative Percent
1st year	49	40.8	40.8	40.8
2nd year	66	55.0	55.0	95.8
3rd year	5	4.2	4.2	100.0
Total	120	100.0	100.0	

Table 3 shows the year of study of the respondents. From the table, 49 (40.8%) are in their first year, 66 (55.0%) are in their second year while 5(4.2%) of the respondents are in their third year of study

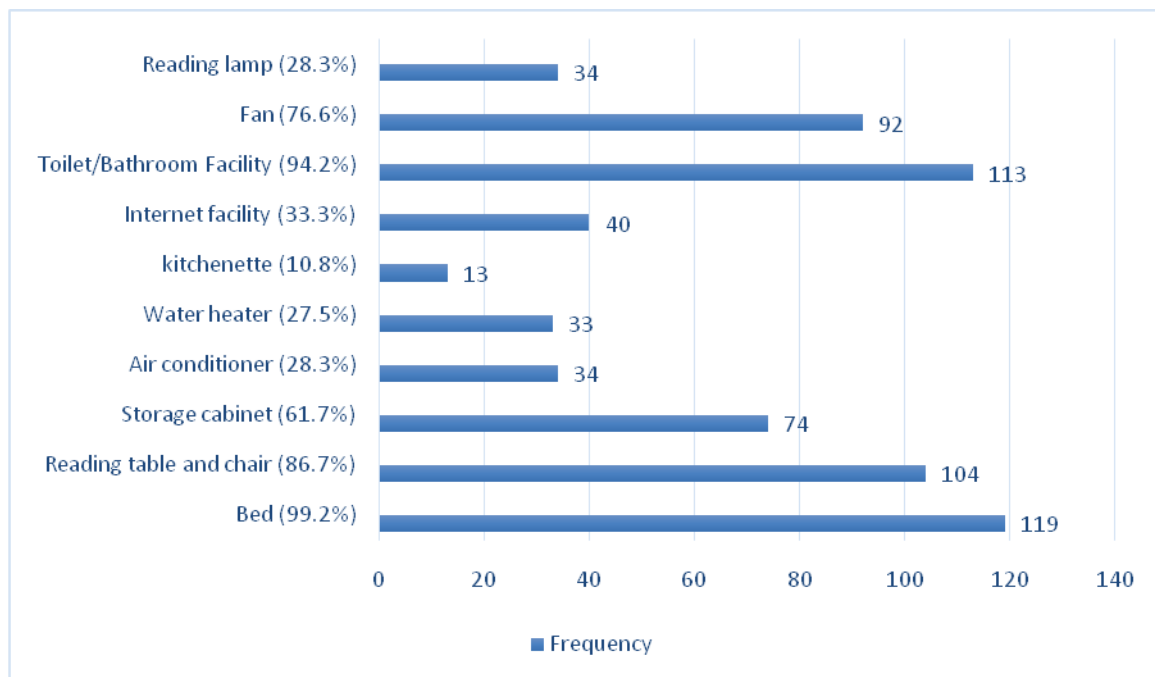


Figure 1: A simple bar chart showing the available facilities in the selected universities.

From the above bar chart various facilities were identified to ascertain whether the necessary facilities are available to give the students some level of comfort with an aim to improve student's wellbeing. The facilities identified were, reading lamp, Fan, toilet and bathroom facilities, internet facilities, kitchenette, water heater, air conditioner, storage cabinet, reading table and chair, bed. From the result, (28.3%) had reading lamps, (76.6%) had fan, (94.2%) had toilet and bathroom facilities, (33.3%) had internet facilities, (10.8%) had kitchenette, 27.5% water heater, (28.3%) had air conditioner, (61.7%) had storage cabinets, (86.7%) had reading table and chair while (99.2%) had beds. The results have revealed that there are available facilities in the various hostels which can enhance student's performance.

Table 4. The aforementioned facilities are properly maintained.

	Frequency	Percent	Valid Percent	Cumulative Percent
Strongly Disagree	13	10.8	10.8	10.8
Disagree	57	47.5	47.5	58.3
Undecided	7	5.8	5.8	64.2
Agree	41	34.2	34.2	98.3
strongly Agree	2	1.7	1.7	100.0
Total	120	100.0	100.0	

Table 4 shows the level of maintenance carried out in each university. Here, the respondents were asked if the available facilities are properly maintained. The results were measured using the 5-points Likert scale of 5= strongly agree; 4= Agree; 3 = Undecided; 2 = Disagree; 1 = strongly disagree. From table 4, 13(10.8%) Strongly disagreed to proper maintenance culture, 57(47.5%) Disagreed, 7(5.8%) were undecided, 41(34.2%) agreed while 2(1.7%) strongly agree. We can see that 47.5% disagreed with the highest frequency of 57 respondents. This result simply reveals that there is a general poor maintenance culture of the available facilities in the three (3) selected universities which affects student's wellbeing.

Table 5. Facility maintenance is frequently carried out in your hall of residence

	Frequency	Percent	Valid Percent	Cumulative Percent
Strongly Disagree	19	15.8	15.8	15.8
Disagree	60	50.0	50.0	65.8
Undecided	9	7.5	7.5	73.3
Agree	29	24.2	24.2	97.5
strongly Agree	3	2.5	2.5	100.0
Total	120	100.0	100.0	

Table 5 as shown above shows the frequency of facilities maintenance in the hall of residence. Results here were also analyzed using the 5-points Likert scale of 5= strongly agree; 4= Agree; 3 = Undecided; 2 = Disagree; 1 = strongly disagree. The results have revealed that 19 (15.8%) of the respondents strongly disagreed on the frequency of maintenance of their hostels, 60(50.0%) disagreed, 9(7.5%) were undecided, 29(24.2%) Agreed while 3(2.5%) strongly agreed. Based on the above interpretation, (50.0%) disagreed and this has the highest percentage amongst others. We can therefore conclusively say that the frequency of facilities maintenance in the selected universities is very poor.

Table 6: Does any platform exist in your university to lay down complaints regarding the quality of service and maintenance?

	Frequency	Percent	Valid Percent	Cumulative Percent
Strongly Disagree	1	.8	.8	.8
Disagree	12	10.0	10.0	10.8
Undecided	20	16.7	16.7	27.5
Agree	80	66.7	66.7	94.2
strongly Agree	7	5.8	5.8	100.0
Total	120	100.0	100.0	

Table 6 shows the respondents responses concerning existing platforms in their individual universities for laying down of complaints. Using the 5-points Likert scale of 5= strongly agree; 4= Agree; 3 = Undecided; 2 = Disagree; 1 = strongly disagree. 1 respondent, (8%) Strongly disagreed that such platforms exist, 12(10.0%) disagreed, 20(16.7%) were undecided, 80(66.7%) agreed while 7(5.8%) strongly agreed. The result has therefore revealed that platforms exists in the selected universities with the highest percentage 66.7% agreeing to this.

Table 7: Factors affecting maintenance of facilities in postgraduate hall of residences

Factors affecting maintenance	Mean Score	RII	Rank	Remarks
Response Time	4.04	0.81	1 st	Strongly Agree
Bureaucracy	4.00	0.80	2 nd	Agree
Use of Quacks	3.75	0.75	3 rd	Agree
Time	3.66	0.731	4 th	Agree
Cost	3.63	0.73	5 th	Agree
Convenience during maintenance	3.58	0.72	6 th	Agree
Low labor Force	3.54	0.71	7 th	Agree
Availability of Materials	3.45	0.69	8 th	Agree

Maintenance of facilities should be effectively practiced in any housing system. However, there are various factors that affect maintenance practices which have an impact on students. Table 7 showed the factors affecting the maintenance of postgraduate hostels. The factors were measured using the 5-points Likert scale of 5= strongly agree; 4= Agree; 3 = Undecided; 2 = Disagree; 1 = strongly disagree. In table 7, the mean score of the factors affecting the maintenance of postgraduate halls of residence revealed response time (mean score = 4.04), Bureaucracy (mean score = 4.00), Use of quacks (mean score = 3.75), Time (mean score = 3.66), cost (mean score = 3.63), Convenience during maintenance (Mean score = 3.58), Low labor force (mean score = 3.54), availability of materials (mean score = 3.45). The result has revealed that response time is the major factor that affects the maintenance in hostels amongst other factors (with a mean score of 4.04) which is ranked 1.

Table 8: Factors Affecting maintenance in the various Universities

Which institution do you attend?		Time	Cost	Convenience	Response Time	Availability of materials	Low labor force	Use of quacks	Bureaucracy
Covenant University	Mean	3.48	3.15	3.38	4.1	3.03	3.28	3.38	3.95
	RII	0.696	0.63	0.676	0.82	0.606	0.656	0.676	0.79
	Rank	3 rd	7 th	4 th	1 st	8 th	6 th	4 th	2 nd
University of Lagos	Mean	3.55	3.75	3.65	3.85	3.5	3.45	3.63	3.8
	RII	0.71	0.75	0.73	0.77	0.7	0.69	0.726	0.76
	Rank	6 th	3 rd	4 th	1 st	7 th	8 th	5 th	2 nd
University of Ibadan	Mean	3.95	3.98	3.7	4.18	3.83	3.9	4.25	4.25
	RII	0.79	0.796	0.74	0.836	0.766	0.78	0.85	0.85
	Rank	5 th	4 th	8 th	3 rd	7 th	6 th	1 st	1 st
Total	Mean	3.66	3.63	3.58	4.04	3.45	3.54	3.75	4
	RII	0.732	0.726	0.716	0.808	0.69	0.708	0.75	0.8
	Rank	3 rd	4 th	5 th	1 st	8 th	7 th	6 th	2 nd

Table 8 shows the responses from each university studied. From the table, Covenant University and University of Lagos reveals that response time has the most effect on maintenance in students hostels as they are ranked 1st (with a mean score of 4.1 and 3.85) respectively. However, evaluating the factors in university of Ibadan reveals Bureaucracy and use of quacks as a major factor that affects effective maintenance (with a mean score of 4.25) respectively. Response time was however seen as the major factor that affects effective maintenance of student's hostels (with a total mean score of 4.04)

Table 9: Effects of the state of maintenance

Effects of the state of maintenance	Mean Score	RII	Rank	Remarks
Discomfort	3.98	0.79	1 st	Agree
exposure to danger	3.96	0.79	2 nd	Agree
increase in the cost of maintenance	3.92	0.78	3 rd	Agree
Under-utilization of facilities	3.91	0.78	4 th	Agree
Pollution	3.78	0.76	5 th	Agree
Bad publicity of school	3.76	0.75	6 th	Agree
Introduction of unauthorized facilities	3.67	0.73	7 th	Agree
Outbreak of disease	3.52	0.70	8 th	Agree

Poor academic performance	3.50	0.70	9 th	Agree
student riot	3.47	0.69	10 th	Agree

Table 9 examined the effects of maintenance of postgraduate hostel on students. From the table, it was shown that there are various effects of the state of maintenance on the students which include discomfort, exposure to danger, increase in the cost of maintenance, underutilization of facilities, pollution, and poor publicity of schools. However, the results have revealed that there are three (3) major effects of the state of maintenance on students which are discomfort (with a mean score = 3.98), exposure to danger (with a mean score = 3.96), and increase in cost of maintenance (with a mean score of 3.92). Discomfort which has the highest mean score is seen to be the major effect on the state of maintenance on students causing dissatisfaction and on the long run has negative effects on academic performance.

Table 10: Effects of the state of maintenance

Institution		Under-utilization of facilities	Discomfort	outbreak of disease	Pollution	increase in cost of maintenance	Student Riot	Bad publicity of school	exposure to danger	Introduction of unauthorized facility	Poor academic performance
Covenant University	Mean	4.08	4.13	3.5	3.78	4.03	2.78	3.8	3.98	3.58	2.88
	RII	0.816	0.826	0.7	0.756	0.806	0.556	0.76	0.796	0.716	0.576
	Rank	2 nd	1 st	8 th	6 th	3 rd	10 th	5 th	4 th	7 th	9 th
University of Lagos	Mean	3.55	3.73	3.48	3.68	3.83	3.68	3.65	3.88	3.63	3.63
	RII	0.71	0.746	0.696	0.736	0.766	0.736	0.73	0.776	0.726	0.726
	Rank	9 th	3 rd	10 th	4 th	2 nd	4 th	6 th	1 st	7 th	7 th
University of Ibadan	Mean	4.1	4.08	3.58	3.9	3.9	3.95	3.83	4.03	3.8	4
	RII	0.82	0.816	0.716	0.78	0.78	0.79	0.766	0.806	0.76	0.8
	Rank	1 st	2 nd	10 th	6 th	6 th	5 th	8 th	3 rd	9 th	4 th
Total	Mean	3.91	3.98	3.52	3.78	3.92	3.47	3.76	3.96	3.67	3.5
	RII	0.782	0.796	0.704	0.756	0.784	0.694	0.752	0.792	0.734	0.7
	Rank	4 th	1 st	8 th	5 th	3 rd	10 th	6 th	2 nd	7 th	9 th

Table 10 shows the effects of the state of maintenance on students residing in postgraduate hostels. As shown in table 10, there are various effects lack of proper maintenance pose on students. It has been revealed from the responses that discomfort ranked 1st (with a mean score of 4.13) as the major effect caused by lack of proper maintenance in Covenant University, Exposure to danger ranked 1st in University of Lagos (with a mean score of 3.88) while University of Ibadan revealed underutilization of facilities as the effects caused by lack of maintenance. It was however generally revealed from the survey that discomfort is a factor that has the most effects of students due to lack of effective maintenance (with a total mean score of 3.98)

Conclusion and Recommendation

The study has revealed the major factors that affect effective maintenance in postgraduate hostels in top ranked Nigerian universities. Amongst these factors are poor response time, bureaucracy, and use of quacks. Amongst these major factors, Poor response time was revealed to be the most pressing negative effect of maintenance. It can however be generally concluded that the efficient maintenance of postgraduate hostels in the selected top ranked South-western Nigerian universities are limited due to poor response from the management of the institutions. The researchers have found it necessary to recommend possible mitigations to combat these challenges. These recommendations include that the universities should create a special facility management office in each of the postgraduate halls of resident's order than the existing facility management team and employ facility management professionals. This gives students easy access to the officials to lay their complaints. This way, the issue of bureaucracy will not exist and slow response in attending to issues will be reduced or be totally eliminated. The university management should create an electronic customer service platform for lying down of complaints and collecting feedback for the progress of work done as it tends to get quick feedback [29]; [30]. Also student's occupancy evaluation should be a routine exercise to collate necessary inventory's, issues and complains of students to improve the efficiency of maintenance as advocated by [31].

Acknowledgement

The authors wish to acknowledge the financial support offered by Covenant University in actualization of this research work for publication.

References

- [1] Oladokun, S., & Ajayi, C. (2019). Assessing Users' Perception of Facilities Management Service in a Public University: A Case Study Approach. *Journal of Facility Management and Research*, 2(2), pp 62-73.
- [2] Akinsola, O. E., Hussaini, P. O., Oyenuga, S. O., & Fatokun, A. O. (2012). Critical factors influencing facility maintenance management of tertiary institutional buildings in South West Nigeria. *Mediterranean journal of social sciences*, 3(11), 489-496.
- [3] Usman N.D, Gambo M.J, & Chen J.A (2012) Maintenance culture and its impact on the construction of residential buildings in Nigeria. *Journal of environmental science and resource management*, 4, pp 69-81
- [4] Bilbo, D. & Lavy, S. (2009). Facilities Maintenance Management Practices in Large Public School, Texas. *Facilities Maintenance Management*. 27(1/2), pp 5-20.
- [5] Khozaei, F., Ayub, N., Hassan, A. S., & Khozaei, Z. (2010). The factors predicting students' satisfaction with university hostels, case study, universiti sains Malaysia. *Asian Culture and History*, 2(2), 148-158
- [6] Azeez, T., Taiwo, D., Mogaji-Allison, B., & Bello, A. (2016). Comparative Assessment of Students' Satisfaction with Hostel Accommodation in Selected

Private Universities in Ogun State, Nigeria. *European Scientific Journal, ESJ*, 12, 32.

[7] Adama, U, Aghimien, O & Fabumi, O. (2018). Students housing in private universities in Nigeria: Influencing Factors and effects on academic performance. *International journal of built environment and sustainability*, 5(1), pp 12-22.

[8] Ofori .I. Duodu P.M. & Bonney S.O (2015) Establishing factors influencing building maintenance practice: Ghaniana perspective. *Journal of economics and sustainable development*, 6(24), pp184-193.

[9] Akeem .A. Ajayi (2014) Factors affecting maintenance management of education trust fund (ETF) Building of Tertiary institutions in Osun State. pp1-14.

[10] Owolabi J.D, Amusan L.M, Gani T.P, Peter J and Omuh .I. (2014). Assessing the effectiveness of maintenance practices in public schools. *European international journal of sciencr and technology*, 3(3) pp 103-109

[11] Ogunmakinde, O.E, Akinola A.A & Siyanbola A.B (2013) Analysis of the factors affecting building maintemnance in government residential estates in Akure Ondo State Nigeria. *Journal of environmental sciences & resources management*, 5(2), pp 89-103.

[12] Mohammad M.I, Gambo Y.L & Omirin M.M (2012) Assessing facilities management services in post graduate hostel using SERVQUAL technique, *Journal of emerging trends in economics & management services (JETEMS)*,3(3), 252-256.

[13] Ainon .R. & Rosmaizura M.Z (2018) The impact of facilities on students academic performance. *Sci.int(Lahore)*, 30(2), 299-311.

[14] Arogundade, B. (2010). Problems off facilities in South-West Nigerian Universities and the Way Forward. *Journal of Education Administration and Policy Studies*. 2(2), pp39-43.

[15] Oluwunmi, A., Durodola, D.,& Ajayi, A. (2015). Comparative Analysis of Students' Satisfaction with Classroom Facilities in Nigerian Private Universities. *Journal of Studies in Education*. 5(4), pp 242-257.

[16] Sawyerr, P., & Yusof, N. (2013). Student Satisfaction with Hostel Facilities in Nigeria Polytechnics. *Journal of Facilities Management*. 11(4), pp 306-322.

[17] Ayuba, P., Abdul, C., & Abdulrahman, M. (2018). Post-Occupancy Evaluation of Students Hostel Facilities in Federal Universities in North Central, Nigeria. *Architecture Research*. 8(4), pp123-128.

[18] Sapri, M., Kaka, A., & Finch, E. (2009). Factors that Influence Student's Level of Satisfaction with Regards to Higher Educational Facilities Services. *Malaysian Journal of Real Estate*. 4(1), pp 34-51.

[19] Jamshed, Anees and Mohammad (2018). Critical factors affecting international students' satisfaction of hostel facilities: A case study of university Sians Malaysia. *Journal of Governans, institusi and Pengurusan Kewangan*, 72-79

[20] Amaniampong, Ameyaw and Akortsu (2017). Qualitative adequacy of students hostels in Wa, Ghana. *Journal of civil engineering and Architecture*, 5(6) pp 193-206

- [21] Ado M.B. Ado .A. and Abdu .I A (2018) Assessment of quality and condition of students Hostel in Kano University of science and technology, WUDIL, Kano state Nigeria. *International journal of advancements in research and technology* 7(12) pp 9-33
- [22] Koskei & Moroge (2014). Factors influencing growth of hostels in Kenya: A case study of hostels in JUJA. *European journal of business management.* 1(11), 141-161.
- [23] Tuan, (2018) Study the factors affecting the choice of accommodation for new students: Case in Da Nang City, Vietnam. *International research journal of advanced Engineering and Science.* 3(4), pp 143-147.
- [24] Opowale .A. & Kajumo-Shakantu .K. (2018) Assessment of Build-Operate- Transfer model for Hostel facilities procurement in Nigerian public Universities. *International conference on education, development and innovation,* pp 187-197.
- [25] Ogungbe M.A, Olukalojo M.A & Binuyo O.P (2018) An investment analysis of private student hostels in Nigerian Tertiary institutions: A case study of FUTA campus. *International journal of investment management and financial innovations,* 4(1), pp 1-8.
- [26] Odaudu U.S & Yahaya B.F (2019) Assessment of facilities in the male hostels of university environments in Nigeria. *British journal of environmental sciences,* 7(2) pp 21-30.
- [27] Ilyana B.M.N, Norhaslina .J., Lizawati .A. Faza F.M.F, Huraizah .A., Mudirah .S., Norazlin .M. & Fatimeh S.N (2014) Students satisfaction towards hostel maintenance in UiTM Perak. *2nd international journal conference on innovation and technology for sustainable built environment,* pp 1-8
- [28] Maina J.J & Aji J.Y (2017) Influence of accommodation on the performance of Architecture students. *Built environment journal,* 14(2) pp 47-59
- [29] Iroham, C. O., Oluwunmi, A. O., Ekenta, C. Bello, F. O. (2017). Service quality delivery of facilities in Covenant University Lecture Theatre: Assessing end users' satisfaction. *Covenant Journal of Research in the Built Environment,* 5(1), 48-68
- [30] Oluwunmi, A. O., Akinjare, O. A., Ajibola, M. O. and Oloke, O. C. (2018). *International Journal of Civil Engineering and Technology,* 9(9), 476-484
- [31] Ayedun, C. A., Omonijo, D. O., Durodola, O. D., Ajibola, M. O., Oloke, C. O., Remilekun, K. and Akinjare, O. A. (2019). An evaluation of users' satisfaction level with the quality of the office facilities in some selected private universities in Ogun State, Nigeria. *Proceedings of the 33rd International Business Information Management Association Conference, IBIMA 2019: Education Excellence and Innovation Management through Vision 20202019,* 5424-5432