

## **Plant Management in Tertiary Institutions in Nigeria: Problems and way Forward**

**Hayab Fortune Josiah**

forhayab@yahoo.com

**Ogunode Niyi Jacob**

Ogunodejacob@gmail.com

**Abstract:** *School plant is one of the most important facility that the tertiary institutions cannot do without. School plant is very critical to the realization of tertiary institutions goals. The management of school plant is the function of the school administrators and effective school plant management is key to the attainment of the tertiary institutions objectives. This paper looked at the problems hindering effective school plant management in the Nigerian tertiary institutions. Secondary and primary data were used in the paper. The secondary data were sorted from hardcopies and softcopies resource from libraries and internet. The paper identified inadequate funding, poor maintenance culture, insecurity/internal school crisis and corruption as problems hindering effective school plant management in the Nigerian tertiary institutions. The paper also the roles of Government and school administrators in school plant management to include adequate funding, procurement and supervision of school plant. Based on the problems identified, the government should increase the funding of the tertiary institutions to enable the institutions acquire necessary materials resources for the development of the institution. Adequate provision of school plant should be the major priority of government in all tertiary institutions. All forms of corruption in the tertiary institutions should be fought by the government and its anti-corruption agencies. The school manager should ensure that the plants available in the school are used for effective teaching and learning in the institutions.*

**Keywords:** *Administration, Management, Tertiary Institutions, Problem, Plant.*

### **Introduction**

Tertiary education is an organized and planned education that specializes in carrying out teaching programme, research programme and community service. Tertiary education is an advance education that is provided for those who are through with Post-Basic Education and Career Development (PBECD) education. The Federal Republic of Nigeria in her national policy on education (2013) viewed tertiary education as education given after Post Basic Education in institutions such as Universities and Inter-University Centres such as the Nigeria French Language Village, Nigeria Arabic Language Village, National Institute of Nigerian Languages, institutions such as Innovation Enterprise Institutions (IEIs), and Colleges of Education, Monotechnics, Polytechnics, and other specialized institutions such as Colleges of Agriculture, Schools of Health and Technology and the National Teachers' Institutes (NTI) (FRN, 2013). Contribute to national development through high level manpower training; provide accessible and affordable quality learning opportunities in formal and informal education in response to the needs and interests of all Nigerians; provide high quality career

# Kresna Social Science and Humanities Research

Proceedings of the International Conference on Sustainable Development:  
Problems, Analysis And Prospects

counseling and lifelong learning programmes that prepare students with the knowledge and skills for self-reliance and the world of work; reduce skill shortages through the production of skilled manpower relevant to the needs of the labour market; promote and encourage scholarship, entrepreneurship and community service; forge and cement national unity; and promote national and international understanding and interaction were outlined as goals of Tertiary Education according to national policy (FRN, 2013).

Federal Republic of Nigeria national policy on education (2013) acknowledged that tertiary Educational institutions shall pursue her goals through: Quality student intake; quality teaching and learning; research and development; high standards in the quality of facilities, services and resources; staff welfare and development programmes; provision of a more practical based curriculum relevant to the needs of the labour market; generation and dissemination of knowledge, skills and competencies that contribute to national and local economic goals which enable students to succeed in a knowledge-based economy; a variety of flexible learning modes including full-time, part time, block release, day-release, and sandwich programmes; access to training funds such as those provided by the Industrial Training Fund (ITF), Tertiary Education Trust Fund (TETFund); Students Industrial Work Experience Scheme (SIWES) that is well structured, coordinated and supervised; maintenance of minimum educational standards through appropriate regulatory agencies; an all-inclusive credible admissions policy for national unity; supporting affordable, equitable access to tertiary education through scholarships and students' loans; inter-institutional co-operation and linkages; and dedicated services to the community through extra-mural and extension services (FRN, 2013). The realization of the objectives of tertiary education hinges on the availability of human and material resources. One of the key materials resources is the energy resources/ power supply or light. School plant management is an essential tool in the achievement of tertiary education objectives and programme. The effective and efficient management of school plant in higher institutions contributes immensely to high quality development in higher education (Orji, Ogar & Aiyedun, 2018).

Aiyedun, Olatunde-Aiyedun and Ogunode (2021) stated that the poor condition of some school plants in Nigerian tertiary institutions may have led to low rankings of Nigerian Universities in global ranking of Universities. Musa (2016) lamented the condition he met some school plant facilities in some universities visited. He complained of total neglect of important school plants. It has been observed that the state of art facilities of many tertiary institutions in the country is not good. There have been poor management of the facilities by those in care of them. It is against this background that this paper discussed the problem hindering effective school plant management in tertiary institutions in Nigeria.

## **Theoretical Framework**

This study is hinged on the system theory. According to Katz and Khan (1966), the system theory is basically concerned with the problem of relationship, of structure and of interdependence rather than the constant attributes of objects and individuals. The world and all that it contains is an assembly of small and distinct parts, fit largely for analysis and study in isolation (Laszlo & Krippner, 1997). The system approach focuses attention on the whole and also on the complex interrelationships among its constituent parts. The system theory emphasizes the relationship between parts and interaction with each other. This theory views the organization as a unified whole and purposeful system composed of interrelated parts (Stonner, Freeman, & Gilbert, 2009). The whole is greater than its component parts. A change in any component of a part may affect the entire system functionally or adversely.

ISSN 2774-3918 (online), <https://kssshr.kresnanusantara.co.id>. Published by Kresna Nusantara

Copyright © Author(s). This is an open-access article distributed under the terms of the Creative Commons Attribution License (CC BY).

To view a copy of this license, visit <https://creativecommons.org/licenses/by/4.0/>.

# Kresna Social Science and Humanities Research

Proceedings of the International Conference on Sustainable Development:  
Problems, Analysis And Prospects

Systems are composed of key major elements such as input, process and output (Lucey, 2002). Egwunyenga (2010) and Aiyedun (2020) indicated that the input into educational systems could be categorized into three types namely: school facilities, money, supplies, curriculum, and equipment, personnel such as students, lecturers, administration staff, management staff and non-academic staff. The inputs are subjected to various processing activities such as teaching, lectures, assignments, seminars, workshops, researches, publications, studies, discussion and counseling. As a result, they come out as outputs capable of satisfying the systems aspirations and expectations. The outputs comprised of individuals who are rich in positive values, more learned, well skilled, highly knowledgeable, well cultured, disciplined, employable and productive. But when the inputs are inadequate and short in supply it affects the entire system resulting to poor quality output. So, school plant is part and parcel of the tertiary institutions that must be given high priority (Ogunode, Eyiolorunse-Aiyedun & Olatunde-Aiyedun, 2021).

## **Conceptualized Framework**

### **School**

The school is a social organization that brings people together to learn. A School is a place where teaching and learning take place. The school a formal or informal organization that is established for teaching and learning. The school system is operated with some physical structures such as the school buildings, water supply sources, electricity supply etc. which are required for the smooth running of the schools. These support items to the running of schools are generally referred to as the school plant (Ojelade, Aiyedun & Aregbesola, 2019).

### **School Plant**

School plant refers to are planned and organized materials resources meant for the implementation of teaching and learning programme. Ololube, Kpolovie, Amaele, Amanchukwu and Briggs (2013) described school plant as the site, the buildings, the equipment and all the essential structures, permanent and semi-permanent as well machines, laboratory equipment as well as blackboard/chalkboard needed for effective teaching and learning. Amanchukwu and Nwachukwu (2015) defined school plant as the school site, all the essential structures-permanent and semi-permanent such as machines and laboratory equipment and chalkboard needed for effective teaching and learning, other scholars have defined school plant in different perspectives. Yusuf, Ajayi, and Sofoluwe (2013) defined school plant as space interpretation of the school curriculum. It will be impossible for the curriculum to be implemented if the physical facilities required for teaching and learning are not available. Absence of school plant makes teaching ineffective and also hampers desired learning. School plants are made up of the school land and all the physical structures on it. It also includes the site, buildings, physical equipment, recreational spaces and books used for the achievement of educational objectives (Oluchukwu, 2002). Njoku (2004) viewed school plant as educational facilities that are tangible such as buildings, land equipment, machineries, furniture, fixtures and fittings which are put into use and capable of providing excellent educational services. Yusuf (2008) stated that school plant is the space interpretation of the school curriculum. In this perspective, the curriculum will be impossible to implement if the physical facilities required for teaching and learning are neither available nor inadequately provided and maintained.

### **School Plant Management**

# Kresna Social Science and Humanities Research

Proceedings of the International Conference on Sustainable Development:  
Problems, Analysis And Prospects

School plant management has been considered by several scholars in different dimensions. It involves the effective utilization of school plant to ensure that its optimum benefits are felt in the teaching and learning process to achieve school objectives. Adelabu (2012), defined school plant management as the process of planning, organizing, coordinating and budgeting for the building of school plant to ensure that service delivery is facilitated and supported in the provision of education by a school. Articulating these views, school plant management in this context is the application of management functions of planning, organizing, coordinating and controlling the physical environment of learning for the actualization of educational goals (Ekpo& Aiyedun, 2018). Olga (2011) viewed school plant management as a series of decisions by individuals and groups in the school system in building school plant according to need, operating and using it effectively and efficiently to ensure that they are functional for use in course of implementing school programmes.

Ogunode, Olatunde-Aiyedun and Akin-Ibidiran stated that school plant management involves planning and keeping records of school facilities, supervising and evaluating their availability as well as encouraging teachers and students to participate in maintenance of school plant. Fencer (2004), stated that school plant management is the process that ensures buildings and other technical systems support the programmes of an organization. The importance of school plant management has been emphasized. Asiabaka (2008), maintains that school plant management plays a pivotal role in the actualization of educational goals and objectives by satisfying the physical and emotional needs of staff and students. Asiabakastated that the physical needs of the learners are met through the provision of safe structures, adequate sanitary facilities a balanced visual and thermal environment, sufficient shelter space for work and play; while the emotional needs are met by creating a pleasant surroundings, friendly atmosphere and an inspiring environment.

## **Problems Militating Against Plant Management in Tertiary Institutions**

The following are considered as problems militating against effective plant management in Nigerian tertiary institutions. The problems include; inadequate funding, poor maintenance culture, insecurity/internal school crisis and corruption

### **Inadequate Funding**

Inadequate funding is a challenge to effective plant management in the tertiary institutions in Nigeria. Funding is critical to effective school plant management. School plant management and maintenance is very expensive to carry out quarterly. Ogunode&Abubakar (2021); Ogunode, Yiolokun, &Akeredolu, (2019)Ogunode, Jegede, Adah, Audu, &Ajape, (2021)submits that inadequate funding is a major challenge facing the administration of tertiary institutions in Nigeria. The annual budgetary allocation for the administration of universities in Nigeria is grossly inadequate. The inability of the federal government to stick to the UNESCO 26% of national budget for education is affecting the management of Nigerian universities. Over a decade now, the annual budget for the entire educational sector in Nigeria is below 15% and this is affecting the effective administration of the different levels of education in the country, including the university system. Ogunode (2021) observed that the poor funding of education is responsible for the poor quality of the universities' education in Nigeria. The annual budget for the administration of universities in the country is not adequate to provide the needed infrastructural facilities and human resources that the various universities required to function properly. Ogunode, Abubakar&Ajape (2021) did a study that investigated the causes of inadequate funds in Nigerian Public Universities. The

# Kresna Social Science and Humanities Research

Proceedings of the International Conference on Sustainable Development:  
Problems, Analysis And Prospects

study reveals that poor government allocations, low internally generated revenue, low school fees, institutional corruptions, poor planning/projection, poor research income and poor contribution from private sector, NGO and alumnus. The study also confirmed that the effect of inadequate funding of Nigerian public universities is responsible for poor teaching and learning, inadequate infrastructural facilities, shortage of academic staff, poor research programme, poor staff development programme and poor quality of education.

## **Poor Maintenance Culture**

The maintenance of university facilities is important for the well-being of users; students, lecturers, administration, clerical, technical and support staff. It is indispensable for the promotion of productive activities and social development. The vast majority of people spend over Ninety95% of their time in or next to a building of one kind or another, so in this sense the built environment has become our natural environment (words worth, 2001). Bastidas (1998) suggest that a school maintenance programme is an organizational activity that needs to be carried out by the school community in order to prolong the life expectancy of the school buildings, the furniture and equipment. Maintenance is a continuous operation to keep the school building as a shelter in case of an emergency caused by natural and hazardous events. Buys (2004), regular maintenance inspection are perceived to be one of the most important criteria in maintenance management. By having regular inspections of the building and all its facilities to identify any defective work, maintenance work can be carried out before expensive corrective maintenance is required. Oyenuga, Akinsola, Hussaini, & Fatokun, (2012) did a study into the maintenance of Lagos state university Ojo Campus Nigeria with a view to identify certain factors responsible for the deteriorating state of the facilities and also proffer remedial solution to the problems. The study revealed that; lack of planned maintenance, lack of maintenance policies in the institution, lack of update security system and qualified personnel are among the major factor influencing deteriorating state of facilities Atthe University. The research work concludes that lack of planning approach to maintenance issue and structured maintenance policy is the banes of the university facilities problem. The study also conclude that there are no regular inspections of the facilities to check maintenance needs and the university does not use facilities to generate fund, other than government funding for maintenance purposes. Most developing countries neglect maintenance and have no policy in dealing with the deteriorating facilities. Neglecting maintenance implies increased in cost of operating facilities and a waste of related natural and financial resources (Jackson, 2003). Banful (2004), the financial consequences of neglecting maintenance are often not only to be seen in terms of reduced asset life and premature replacement, but also increased the cost of operating and waste of related natural and financial resources.

## **Insecurity/Internal School Crisis**

Insecurity and internal crisis within the institutions is a major problem preventing effective school plant management in the higher institutions. Internal crisis in the tertiary institutions often leads to destruction of school plant. It have been reported that students of higher institutions during a dispute with school management always resulted to damaging school facilities and plants to show their displeasure with the school authority. Sometime, this insecurity in the campuses involves breaking down of doors or windows and destruction of school properties by students or others, especially during school riot/crisis or deliberate destruction by Boko Haram. For example, News sources reported as cited in GCPEA (2020) that on September 7, 2014, Boko Haram members destroyed a school when they attacked

ISSN 2774-3918 (online), <https://ksshr.kresnanusantara.co.id>. Published by Kresna Nusantara

Copyright © Author(s). This is an open-access article distributed under the terms of the Creative Commons Attribution License (CC BY).

To view a copy of this license, visit <https://creativecommons.org/licenses/by/4.0/>.

# Kresna Social Science and Humanities Research

Proceedings of the International Conference on Sustainable Development:  
Problems, Analysis And Prospects

Buratai town, Borno State. Ogunode, Godwin and Unoaku (2021) observed that another effect of insecurity on the administration of education in Nigeria is the massive destruction of infrastructural facilities. School administration depends on the availability of infrastructural facilities to implement educational programmes. Many school facilities like classrooms, administrative block, ICT facilities, tables, chairs and desks have been destroyed by insurgencies and Boko Haram members in the Northern part of the country. Human right watch (2016) as cited in Ogunode, Godwin and Unoaku (2021) reported that Boko Haram has destroyed nearly 1,000 schools and displaced 19,000 teachers. The Education Needs Assessment found that out of 260 school sites, 28% had been damaged by bullets, shellings or shrapnel, 20% had been deliberately set on fire, 32% had been looted and 29% had armed groups or military in close proximity. Between 2009 and 2015, attacks in north-Eastern Nigeria destroyed more than 910 schools and forced at least 1,500 to close down (HRW,2016 in Ogunode, Godwin &Unoaku, 2021).

## **Corruption**

Corruption is a very big problem hindering effective school plant management in the Nigerian tertiary institutions. Some school plant manager misused and misappropriated the funds allocated to maintain and manage school plant for the sustainable development of the institutions. Ogunode&Abubakar (2021) observed that institute onal corruption is one of the major problems facing the administration of the universities in Nigeria. The entire higher educational system is engulfed in corrupt practices. The budgetary allocation for the administration of university education in Nigeria is some time diverted by officials within the system. There are many forms of corruption in the universities in Nigeria. Some of them include sex for marks, bribery to get position, NYSC mobilization, issuing of fake transcript, illegal employments, promotion staff, formation of cliques and groups, inflating contracts etc. Ogunode, &Abubakar, (2020), Ogbondah (2010) and Olatunde-Aiyedun (2021) agreed in their respective papers that corruption is a challenge facing the higher institutions in Nigeria.

## **Roles of Government and School Administrators in School Plant Management**

Government and school administrators have specific roles in ensuring that school plants are properly maintained. Briggs and Walson (2021) and Akinsola (2012) identified the roles as following: Funding; Procurement, and Supervision

**Funding:** The basic role of government in school plant management is to provide funds for procurement and maintenance. Considering that secondary school are no longer provided with overheads or grant as running cost, infrastructural decay becomes very common as means of funds to maintain them are not available. Government at various levels therefore needs to make adequate provision of funds in annual budgets for the provision and maintenance of school plant to enhance their durability for use in the pursuit of set objectives in schools.

Government also have a role in ensuring that funds provided for schools are accounted for to avoid misappropriation an misapplication in areas that are not necessary while school plants gets rot. This is because, adequate funding alone may not guarantee the success of school plant maintenance, rather effective management of funds is imperative to achieve desired objectives.

**Procurement:** Another role of government in school plant management is procurement of needed plant items. The low budgetary provision for the educational sector is waning on

# Kresna Social Science and Humanities Research

Proceedings of the International Conference on Sustainable Development:  
Problems, Analysis And Prospects

infrastructural development. The few available ones are in a state of disrepair due to unavailability of funds.

**Supervision:** Government and school administrators have specific roles in the supervision of school plant maintenance. The government through the ministry of education should constantly set up machineries to move around schools and take stock of school plant and their status in order to ensure that they are maintained regularly to avoid breakdown. Besides, were funds are provided to schools for the maintenance of school plant, there is need to supervise the appropriation of the funds to keep school plant functional to enhance teaching and learning. Accountability is therefore necessary in the application of funds in schools.

**Inspection and Record Keeping:** Other responsibilities of school administrators in school plant management is periodic inspection of available facilities, decentralization of maintenance, keeping record of school plant facilities that need to be maintained and seeking community support for school plant maintenance.

**Protection:** School administrators also have the responsibility of protecting school plant against fire outbreak, pest and hoodlums to keep them in functional conditions always. Fire extinguishers must be kept at strategic point in the school compound for use to avert any fire outbreak. Generating sets should be protected with welded panels, while classroom, libraries, laboratories, workshops and offices should be locked after school to avoid unnecessary use that could result to vandalization.

**Creating Awareness on Maintenance Culture:** Another responsibility of government and school administrators in school plant management according to Briggs and Walson, (2021);Ajayi (2007); and Yusuf (2008), and Ekpo and Aiyedun (2019) defined creating awareness as the mobilization and motivation of staff and students to imbibe and internalize maintenance culture to give life to school plant. Government through the ministry of education can organize sensitization programme in school on effective school plant maintenance.

**Routine Maintenance of School Plant:** Another responsibility of school administrators is to ensure routine maintenance of school plant to avoid total breakdown. School equipment should be regularly services according to manual guide. Repairs and overhaul should be continually carried out as well as to keep machines and equipment functional always.

**Prevention of Individual commercialization of School Plant:** School administrators should also avoid placing school plant as an individual money-making venture like renting school facilities for personal benefit.

## Way Forward

Based on the problems identified, the following recommendations were made:

1. Government should increase the funding of the tertiary institutions to enable the institutions acquire necessary materials resources for the development of the institution.
2. Adequate provision of school plant should be the major priority of government in all tertiary institutions. This will assist in achieving effective teaching and learning in the higher institutions.
3. All forms of corruption in the university system should be fought by the government and its anti-corruption agencies

# Kresna Social Science and Humanities Research

Proceedings of the International Conference on Sustainable Development:  
Problems, Analysis And Prospects

4. Having the school plants in the school is important in the tertiary institutions. The school manager should ensure that the plants available in the school are used for effective teaching and learning in the institutions.
5. School manage should make every efforts to preserve the available plants in the institutions and prevent wrong use of the plants, especially, by students and staff.
6. Faults detected that will affect the functionality of schools plants should be immediately rectified and dealt with on time in order to avoid total breakdown of school plant in the higher institutions.

## Conclusion

This paper discussed the problems hindering effective school plant management in Nigerian tertiary institutions. At the end of the discussion, the paper identified inadequate funding, poor maintenance culture, insecurity/internal school crisis and corruption as problems hindering effective school plant management in the Nigerian tertiary institutions. The paper also the roles of Government and school administrators in school plant management to include adequate funding, procurement and supervision of school plant. Based on the problems identified, the government should increase the funding of the tertiary institutions to enable the institutions acquire necessary materials resources for the development of the institution. Adequate provision of school plant should be the major priority of government in all tertiary institutions. All forms of corruption in the tertiary institutions should be fought by the government and its anti-corruption agencies. The school manager should ensure that the plants available in the school are used for effective teaching and learning in the institutions.

## References

1. Aiyedun, T.G. (2020). Effect of Covid-19 on Educational System in Nigeria. [https://www.researchgate.net/publication/341549578\\_EFFECT\\_OF\\_COVID-19\\_ON\\_EDUCATIONAL\\_SYSTEM\\_IN\\_NIGERIA](https://www.researchgate.net/publication/341549578_EFFECT_OF_COVID-19_ON_EDUCATIONAL_SYSTEM_IN_NIGERIA)
2. Aiyedun, E.A., Olatunde-Aiyedun, T.G. &Ogunode, N.J. (2021). Factors Hindering the Progress of Nigerian Universities in the Global Ranking of Universities. *International Journal of Development and Public Policy*, 1(6), 183–187. <http://openaccessjournals.eu/index.php/ijdp/article/view/706>
3. Akinsola, A.O. (2012). Resource utilization and internal efficiency in Nigerian secondary schools. *International journal of Sociology and Anthropology*, 4(1), 23-30.
4. Adelabu, M.A.J. (2012). Improving learning infrastructure and environment for sustainable quality assurance practices in secondary schools. *International Journal of Research Studies in Education*, 1(1), 61-66.
5. Amanchukwu, R.N. &Nwachukwu, P.O. (2015).Managing school plant for effective service delivery in public secondary schools in Rivers State of Nigeria. *Human Resource Management Research Journal*, 5(4), 95-102, doi:10.5923/j.hrmr.20150504.02.
6. Asiabaka, I.P. (2008). The need for effective facilities management in Nigeria. *New Science Journal*. <http://www.sciencepub.org>
7. Banful, E. (2004). *A Stitch in Time Saves Nine; Cultivating a Maintenance Culture in Ghana*, an Article Presented at a Seminar on Maintenance Culture in Banful, E. (2004). A



# Kresna Social Science and Humanities Research

Proceedings of the International Conference on Sustainable Development:  
Problems, Analysis And Prospects

*stitch in time saves nine; Cultivating a Maintenance Culture in Ghana*, an article presented at a seminar on maintenance culture in Ghana. March 16, 1 – 2.

8. Bastidas, P. (1998). *Maintenance manual for school buildings in the Caribbean* (online) America: organization of American States. Available Accessed on 11th of April 201 from <http://www.oas.org/CDMP/documents/schools/maintman.htm>.
9. Buys, F. (2004). *Maintenance Management in Tertiary Education Institutions in South Africa* Unpublished PhD. Thesis, Nelson Mandela Metropolitan University, South Africa.
10. Briggs, B.P. &Walson, A.O.B. (2021).Contributions of school plant management towards teaching and learning process in public secondary schools in Rivers State. *International Journal of Innovative Social & Science Education Research* 6(3):52-60
11. Ekpo, C.G. & Aiyedun, T.G. (2018). Environmental Education: Essential tool for the attainment of Sustainable Development Goals in the 21st Century Nigeria. *The Researcher: A Journal of Contemporary Educational Research*, 1(1), 124- 142.  
<http://www.researchersjournal.org/j2/papers/v1n1g.pdf>
12. Ekpo, C.G. & Aiyedun, T.G. (2019). Environmental Education: A tool for creation of awareness on adaptation to climate change in Nigeria. *IOSR Journal of Research & Method in Education (IOSR-JRME)*, 9 (6) 12-21.  
<http://iosrjournals.org/iosr-jrme/papers/Vol-9%20Issue-6/Series-5/C0906051221.pdf>
13. Federal Republic of Nigeria (2014).National policy on education (6th edition). Abuja: National educational Research council Press.
14. GCPEA (2020). *Education under Attack 2020: A Global Study of Attacks on Schools, universities, their students and staff, 2017-2019* Global Coalition to Protect Education from Attack (GCPEA), available at:<https://www.refworld.org/docid/5be9430613.html>
15. Njoku, D.C. (2004). Relationship between organizational factors and administrative effectiveness of university academic managers in Imo and Rivers State of Nigeria.Unpublished M.Ed thesis, Faculty of Technical and Science Education, Rivers State University of Science and Technology, Nkpolu, Port- Harcourt.
16. Ogbondah, L. (2010). Adequate Funding of Public Universities in Nigeria for Sustainable Development, *African journal of historical sciences in education*, 6(2), 322-323.
17. Ogunode, N.J. (20211). *Supervision of Universities in Nigeria: Problems and Suggestions*. Unpublished Article. 7-8
18. Ogunode, N. J. &Abubakar, L. (2021). Public Universities Administration in Nigeria: Challenges and the ways forward. *International Journal on Integrated Education*, 3(11), 163-169
19. Ogunode, N. J.&Abubakar, M. (2020). Higher Education in Nigeria: Challenges and the Ways Forward. *Electronic Research Journal of Behavioural Sciences*, 3
20. Ogunode, N.J, Eyiolorunse-Aiyedun, C.T. &Olatunde-Aiyedun, T.G. (2021). Educational planning in Nigeria during covid-19: problems and way forward. *Academicia Globe: Inderscience Research*, 2(07), 137–147.  
<https://doi.org/10.17605/OSF.IO/RM4SY>

ISSN 2774-3918 (online), <https://kssshr.kresnanusantara.co.id>. Published by Kresna Nusantara

Copyright © Author(s). This is an open-access article distributed under the terms of the Creative Commons Attribution License (CC BY).

To view a copy of this license, visit <https://creativecommons.org/licenses/by/4.0/>.

# Kresna Social Science and Humanities Research

Proceedings of the International Conference on Sustainable Development:  
Problems, Analysis And Prospects

21. Ogunode N. J., Godwin A. N. &Unoaku, O. C. (2021). *Effects of insecurity on school administration in Nigeria*. Middle European Scientific Bulletin, 13. Retrieved from <https://cejsr.academicjournal.io/index.php/journal/article/view/628/572>
22. Ogunode, N. J., Jegede, D., Adah, S., Audu, E. I., &Ajape, T. S. (2021) Administration of Research Programme in Nigerian Public Universities: Problems and Way Forward. *Educational Journal of History and Humanities*, 3(2), 21-32
23. Ogunode, N.J., Olatunde-Aiyedun, T.G. &Akin-Ibidiran, T.Y. (2021). Challenges preventing effective supervision of universal basic education programme in Kuje Area Council of FCT, Abuja, Nigeria. *Middle European Scientific Bulletin*, 16.  
<https://cejsr.academicjournal.io/index.php/journal/article/view/712>
24. Ogunode, N.J., Yiolokun, I.B. &Akeredolu, B.J. (2019). Nigerian Universities and their Sustainability: Challenges and Way Forward *Electronic Research Journal of Behavioural Sciences*,
25. Ojelade, I.A., Aiyedun, T.G. &Aregebesola, B.G. (2019). Environmental Education as an Instrument for awareness creation on the health effects of water contamination in Saburi Community of Federal Capital Territory (FCT), Abuja, Nigeria. *The Researcher: A Journal of Contemporary Educational Research*, 2 (1), 1- 16.  
<http://www.researchersjournal.org/j2/papers/v2n1a.pdf>
26. Olatunde-Aiyedun, T.G. (2021). Student teachers' attitude towards teaching practice. *International Journal of Culture and Modernity*, 8, 6-17.  
<http://ijcm.academicjournal.io/index.php/ijcm/article/download/59/58>
27. Olga, C.A. (2011). The Meaning of School Plant Management, [www.http:olga-schoolplanting.blosport.com.ng/2011/05](http://www.olga-schoolplanting.blosport.com.ng/2011/05).
28. Oluchukwu, S. (2002). *Challenges of Educational Planning in the 21st Century*. Port Harcourt: Ben Ray.
29. Olujide, A. (2001). *Educational Administration*. Onitsha: Lince Publishers.
30. Ololube, N. P., Kpolovie, P. J., Amaele, S., Amanchukwu, R. N. & Briggs, T. (2013). Digital Natives and Digital Immigrants: A study of Information Technology and Information Systems (IT/IS) Usage between Students and Faculty of Nigerian Universities. *International Journal of Information and Communication Technology Education*, 9(3), 42-64.
31. Orji, N.O., Ogar, S.I. & Aiyedun, T.G. (2018). Influence of jigsaw-based learning strategy on academic achievement of upper basic students' in Basic Science in Etim-Ekpo of Akwalbom State. *Abuja Journal of Arts and Social Science Education (AJASSE)*, 1(1)1-12.
32. Yusuf, M.A. (2008). School Plant Planning and Secondary School Students Learning Outcome in South West Nigeria. *An unpublished Ph.D. Dissertation, Faculty of Education, University of Ado-Ekiti, Ekiti State Nigeria*.
33. Yusuf, M.A., Ajayi, I.A. and Sofoluwe, A.O. (2013). Influence of school type and location on school plant planning in south west Nigerian secondary schools. *Academic Research International*, 4(4), 581-585.

ISSN 2774-3918 (online), <https://ksshr.kresnanusantara.co.id>. Published by Kresna Nusantara

Copyright © Author(s). This is an open-access article distributed under the terms of the Creative Commons Attribution License (CC BY).

To view a copy of this license, visit <https://creativecommons.org/licenses/by/4.0/>.