EDUCATIONAL RESOURCES AVAILABILITY AND UTILIZATION AS DETERMINANT OF STUDENTS ACADEMIC PERFORMANCE IN SOUTH WEST NIGERIA

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Abstract

Purpose: The aim of the study is to provide educational planners with relevant items of information with respect to the extent of educational resources availability and utilization in public secondary schools as it affects productivity in educational system.

Methodology: The descriptive research design of the ex post facto type was adopted for the study. The population of the study comprises all academic staff and three hundred level students in the six (6) selected public Colleges of Education in Southwest Nigeria. Purposive sampling technique was used to select six (6) public Colleges of Education in Southwest Nigeria, three (3) each from State and Federal Colleges of Education.

Findings: The study showed that a positive and significant relationship existed between resource situation and students’ academic performance in public Colleges of Education in Southwest, Nigeria. It also showed a positive and significant relationship between human and material resource situation and students’ academic performance. The findings of this study are consistent with that of Oni (1992), which found that inadequate and unqualified teachers in the school system caused low students’ academic performance since adequate and qualified teachers have been found as the drivers of effective educational system.

Unique Contribution to Theory, Practice and Policy: The study found that there was positive correlation among material, physical and human resources and students’ academic performance in public colleges of Education in Southwest Nigeria, the study thus recommends that government and policy makers in these educational institutions should place emphasis on adequate provision of these germane resources in order to enhance students’ academic performance and thus national development. College management in public Colleges of Education in Southwest Nigeria should endeavour to provide enough resources for improvisation, in case the basic physical needs of the institutions could not be adequately met. Parents are admonished to equip their children and wards in public colleges of Education in Southwest Nigeria with the necessary educational needs. Philanthropists, societies, old students association and other organization are admonished to come to the aids of governments in the provision of basic physical and material researches need of public colleges of Education in Southwest Nigeria since it had been established that government alone cannot effectively shoulder the responsibility of educational financing.

Keywords: Education, Determinants, Performance, Resources, Utilization
INTRODUCTION

Educational resources are of tremendous importance to the accomplishment of educational objectives and goals worldwide. The extent to which an educational institution attains her objectives is directly proportional to the educational resources available and their utilization (Ekundayo & Alonge, 2012). Thus, the interplay of nature and nurture on quality education and staff productivity is an important issue that cannot be overlooked by the stakeholders in education industry. The significance of education and manpower development to the growth of the country is an issue that has engaged the attention of government and other educational stakeholders over the years. This has equally been well articulated in government policies and pronouncements in the past decades. The belief in the efficacy of education as a powerful instrument of development has led many developing countries to devote their wealth to the development of educational institutions at various levels. However, the controversy over the falling standards of education in Nigeria has been on the front burner of national discourse over the past decades and it is apparent that the debates will continue for some time to come. Poor students’ academic performance has been linked to several factors which include high teacher-student ratio, shortage of good teaching staff, poor quality of educational leadership, political instability and politicization of educational programmes and inadequate essential physical facilities and equipment (Ewetan, 2015). Ekundayo and Alonge (2012) attributed the problem of downward trend in academic performance of students to a number of factors such teachers’ quality, home factors, government factors and non-provision of educational resources (human, material, financial physical resources). To them, the availability of educational resources (human and material) is very important because of its role in the attainment of educational objectives and human resources is a unique educational input necessary for the overall development of skill acquisition and literacy of the students.

According to Anderson (1991), in Ewetan and Ewetan (2015), meaningful improvements in the quality of education that students receive are determined by the quality of teachers and thus quality teaching and learning are sine qua non for students’ academic performance. In a study of the relationship between teachers’ effectiveness and students’ academic performance in public secondary schools in Delta State, Nigeria, Akiri and Ugborugbo (2009), in Ewetan and Ewetan (2015), found that effective teachers produced better performing students. Adu and Olatunundun (2007) in a study on teachers’ perception of teaching as correlate of students’ academic performance in Oyo State, Nigeria, found that the relationship between teachers’ perception and students’ academic performance is positive and significant. Ayodele and Ige (2012) examined the relationship between utilisation of teachers and students’ academic performance in senior secondary schools in Ondo State, Nigeria, and found that the effective utilization of teachers rather than its mere availability impacts students’ academic performance. Adeyemi (2008) examined teachers’ teaching experience and students’ learning outcomes in the secondary schools in Ondo State, Nigeria, and found that teachers’ teaching experience was significantly related to students’ learning outcomes.

A number of other factors relating to examination bodies, government, parents, teachers and students have also been identified. Uwadiae (2000) attributed the poor performance of students to a lack of adequate preparation, shortage of qualified teachers, inadequate teaching materials, lack of good school environment and infrastructural facilities, inability to understand questions
requiring high level thinking and shallow answers to questions due to poor command of English Language. Government is expected to create an enabling environment for effective teaching and learning to take place through the provision of necessary infrastructure, facilities and qualified manpower. The poor performance was also linked to factors such as lack of equipped laboratories, libraries, as well as population explosions in schools. Akinloye (2013) asserts that the fundamental objective of any educational institution is the accomplishment of its educational objectives, and this could be achieved when available human, material and financial resources within the educational institutions are well harnessed and judiciously used by the management.

The school facilities include both the physical and the teaching-learning facilities. Physical resources include classrooms, administrative block, libraries, laboratories, workshops, playgrounds, toilets, staff quarters, among others. The development and maintenance of school facilities in educational institutions by communities, parents and sponsors should continue to be encouraged. This is because lack of such facilities interferes with learning process. Sallis (2002) argued that an educational programme cannot be effectively implemented using only policy guidelines even if teachers were trained and committed without adequate and appropriate physical facilities such as classrooms, toilets and playing grounds.

In terms of academic achievement, Soyibo and Nyong (1984) have shown that schools with well-equipped laboratories have better results in the School Certificate Science Examinations than those that are ill-equipped. This study found that availability of laboratories had little impact on the performance of students in agriculture as majority of schools had laboratories, yet their performances in agriculture were still low despite the availability of laboratories, however, their adequacy, use of laboratories and whether laboratories are equipped or not could be determining performance in agriculture. The study established that schools that had classrooms had higher mean scores as compared to schools that did not have classrooms. It is therefore, evident that availability of classrooms is determining performance of students in secondary school agriculture. The study findings were consistent with a study conducted by Williams (1973), Ogweno (2015), who found that school buildings are very vital input to educational system; emphasizing that even though they do not teach but their use may facilitate or impede learning.

Ayodele (1999) investigated resource situation in Nigerian schools as correlate of students’ academic performance and found that inadequate resource situation in schools for teaching and learning may lead to low students’ academic achievement. The study further showed that a positive and significant relationship exists between resource situation and students’ academic performance. The findings of the study showed that there is no significant difference in the resource situation between old generation and new generation schools. The study also showed a positive and significant relationship between physical and material resource situation and students’ academic performance. The findings of this study are consistent with those of Oni (1992), which stated that the presence of unqualified teachers in the school system has the tendency to cause low students’ performance since qualified teachers have been seen as the drivers of effective educational system.

Wilkins (2002) conducted an empirical investigation on linking resources to learning. The report suggested that resource management contributed to higher academic achievement. According to the researcher, pupils’ number should be given increased emphasis as the determinants of school
budgets with the intended consequences. In a study by Fabiyi and Fagbamiye (2001) on teaching resources and teaching effectiveness in selected colleges of education in Nigeria, it was discovered that teachers’ welfare package, staff development scheme, promotion prospects are significantly related to students’ academic achievement. The researchers made use of Pearson moment correlation coefficient and multiple linear regression in data analysis. The result of the findings showed that only one out of the six institutions used for the study recorded a significant relationship between the usage of physical and material resources and teaching effectiveness.

In Japan, it has been almost a decade since MIT announced the Open Course Ware (OCW) project in the spring of 2001. Several institutions in Japan also followed and on May 13, 2005, six prestigious universities in Japan formed the Japan Open Course Consortium (JOCW) since then, 36 organisations in Japan have joined JOCW, but its public registration remains still low. According to Hylen (2006) there are two important aspects of “Openness” in thinking of open educational resources free availability on the internet and few restrictions on the use of the resource. In Asia, many national governments have supported OCW at top universities so that teachers and students at other universities can learn from the materials made public to the top universities. On the other hand, there have been many grassroots initiatives in those countries as well. China is most active in such efforts as seen in China Open Research for Education (CORE) (web cite). It was originally run by the Chinese Ministry of Education and a non-profit organization.

Problem Statement

Resource availability and utilization is an integral part of the overall management of the school. Education in a school is explored by provision of resources, their maximum utilization and management. Advances in science and technology necessitates that the school manager adopts proper methods of facilities management in order to improve the quality of teaching and learning. A direct relationship exists between the quality of school facilities, teaching and learning materials, teaching personnel and the education process. All this had not been fully captured by researchers in various studies, hence there is need to go in dept of what other researchers are yet to intimate/emphasize in their researches. One school of thought suggests that some administrators prefer building new classroom instead of maintaining the old ones, laboratories and their equipment are allowed to waste, text books and other instructional materials are allowed to rot away in the cartons instead of displaying them on the shelves for easy retrieval and usage. Another school of thought opines that professional qualification of teachers is deemed important in improving the quality teaching techniques and student performance. There is need to reiterate that resource availability and utilization encompasses human and instructional delivery which are excellent factors in determining students’ academic performance.

Objectives of the Study

1. To find out the relationship between material resource situation (Lecture Hall, laboratories, libraries and office accommodation) and students academic performance in Public Colleges of Education in Southwest Nigeria.
2. To examine the relationship between physical resources situation (laboratory equipment, instructional materials, social amenities and books and journal(s) and students’ academic performance in public colleges of education in southwest Nigeria.

3. To assess the relationship between human resource situation (Adequate manpower, quality manpower, manpower utilization and training and retraining) and students’ academic performance in Public Colleges of Education in Southwest Nigeria.

Hypotheses

Hypothesis: 1: There is no significant relationship between material resource situation (Lecture hall, Laboratories and Office Accommodation) and students’ academic performance in public colleges of education in southwest Nigeria.

Hypothesis: 2: There is no significant relationship between physical resources situation (laboratory Equipment, Instructional Materials, Social Amenities, Books and Journals) and students’ academic performance in public Colleges of Education in Southwest Nigeria.

Hypothesis 3: There is no significant relationship between human resources situation (Adequate manpower, Quality manpower Utilization and Training and Restraining) and students’ academic performance in public Colleges of Education in Southwest Nigeria

LITERATURE REVIEW

The success or otherwise of the Nigerian economy depends, to a large extent, on its educational provision. According to Oyedeji (2000), school material resources could be divided into direct teaching resources and non-teaching resources. Direct teaching resources are resources that have direct relevance to the educative process, while non-teaching resources are resources that have indirect relevance to the educative process. One would envisage that tertiary institutions in Nigeria would have enough resources allocated to them but the reverse is the case when one takes a cursory look at the availability and utilization of these resources on students’ academic performance, a yardstick by which the investment on education will be justified and which would be used to see the extent to which resource allocation helps in improving the teaching-learning process.

Ayoo (2002) carried out a study on the effects of school physical facilities on academic performance and established that availability of facilities had a direct link with performance of learners in examination. This concurs with many research findings which have shown that the success of any educational endeavour rests on the availability of physical facility on the school building. He further argued that the availability of the school building and other plans contribute to better academic performance as they enhance effective-teaching-learning activities. He further stated that well-structured school buildings aesthetic conditions, playground, latrine usually contributes to achieving high educational attainment by the students. Monari (2007) study of factors contributing to students’ poor academic performance revealed that lack of facilities and resources compromised supervision control and contributed to 71% of poor students’ academic performance. The study also revealed that only 51.2% of head teachers checked teachers’ professional records once a term. It further revealed that the majority of teachers were qualified thus attributing poor performance to poor educational facilities.
MOEST (2005) explains the importance of ensuring that there are adequate and appropriate facilities for teaching-learning so that educational programmes could be implemented effectively. Moreover, when school buildings and other facilities are poorly maintained, they would hamper the teaching and learning process and eventually affect student performance in examinations. Musau (2004) posits that lack of library facilities was one of the most serious problems standing on the way of achieving high education standard in learning institutions. According to Neill (2001), student learning outcomes in schools is largely dependent on availability and appropriate management of resources, because the students acquire skills using these resources. These resources include physical facilities such as spacious and well ventilated classrooms, adequately equipped laboratories and technical workshops, well-stocked libraries, assembly halls, recreational ground, farm land, gymnasias, health centres, well-stocked libraries, counseling rooms, staff offices and conveniently placed urinals and latrines. The material resources are made up of items of furniture, laboratory materials (consumable and non-consumable) motor vehicles, instructional tools, books, and other stationery items as well as utilities such as electric power, gas and water in the schools. These facilities play a pivotal role in the actualization of the educational goals and objectives by satisfying the physical and emotional needs of the staff and students.

**Theoretical Framework**

Digolo (2012) investigated the availability and use of teaching and learning resources for music education in secondary schools. The study was necessitated by an urge to carry out an in dept investigation on the state of teaching and learning equipment and facilities in the schools in order to establish the limitations that hinder their acquisition and utilization. The study revealed that essential teaching and learning resources for music education were either inadequate or not available at all in most of the schools. The insufficiency of the resources was established to be a serious drawback to students’ learning and achievement. Lack of competence among some music teachers hindered proper utilization of the instructional resources. Physical materials in terms of adequacy and quality have a great impact on performance of students in the examination (Ayoti, Koteng and Odhiambo, 2016).

In terms of academic achievement, Soyibo and Nyong (1984) have shown that schools with well-equipped laboratories have better results in the School Certificate Science Examinations than those that are ill-equipped. This study found that availability of laboratories had little impact on the performance of students in agriculture as majority of schools had laboratories, yet their performances in agriculture were still low despite the availability of laboratories, however, their adequacy, use of laboratories and whether laboratories are equipped or not could be a determining performance in agriculture. The study established that schools that had classrooms had higher mean scores as compared to schools that did not have classrooms. It is therefore, evident that availability of classrooms is determining performance of students in secondary school agriculture. The study findings were consistent with a study conducted by Williams (1973), in Ogweno (2015), who found that school buildings are very vital input to educational system, emphasizing that even though they do not teach but their use may facilitate or impede learning.

A number of other factors relating to examination bodies, government, parents, teachers and students have also been identified. Uwadiae (2000) attributed the poor performance of students to
a lack of adequate preparation, shortage of qualified teachers, inadequate teaching materials, lack of good school environment and infrastructural facilities, inability to understand questions requiring high level thinking and shallow answers to questions due to poor command of English Language. Government is expected to create an enabling environment for effective teaching and learning to take place through the provision of necessary infrastructure, facilities and qualified manpower. The poor performance was also linked to factors such as lack of equipped laboratories, libraries, as well as population explosions in schools.

In addition to this, studies carried out by Olarewaju (1997) showed that insufficient manpower, lack of concentration during lessons, lack of commitment and motivation to work, lack of equipment, poor attitudes of students, poor understanding of concepts, inability to study well, neglect of assignment and pleasure seeking attitude contribute to low academic achievement. Bulus (2001) observed that the problem of mass failure in public examinations is a matter of grave concern in the present millennium. Ukeji (1999) was also of the opinion that in Nigeria, decay in public examinations is particularly grave, debilitating, degenerating, deteriorating and dehumanizing.

Ogweno (2015) found that schools without laboratories had higher mean scores as compared to schools which has laboratories. From the findings, use of theoretical method does not necessarily mean that laboratories are not needed. The laboratory can be there, but they are not gainfully used, and therefore, the students will continue performing poorly. These findings were inconsistent with other studies that reported that laboratory adequacy which is a school environment factor affect the performance of students in chemistry (Raimi, 2002).

Egun and Badmus (2007) study revealed that Agricultural science as a subject was taught in the classroom theoretically without practical work and the use of relevant instructional materials. As a result of the poor method of teaching, students see the subject as difficult, hence, they develop negative attitude towards it. Similarly, in their research on reducing teachers instructional difficulties in identified content area of Agricultural science discovered that lack of relevant instructional materials is among other reasons for teachers’ difficulty in teaching certain concepts in Agricultural science syllabus.

Relevance of Theories

Proponent of theory of achievement was McClelland (1951) of Havard University. Adeyemi & Adeyemi, 2014) According to the theorist, the psychology study of the individual and the nation can contribute a great deal to the problem of economic growth. Human beings differ from one another in the strength of achievement motive. It is this difference in the strength of motivation to achieve that is important in understanding the differences in the economic growth of nations. Watson’s theory of learning exerts that the explanation of learning, understanding of brain and its functioning is very essential. This theory holds that people’s behaviour is learned by interacting with external environment stimuli. Emphasis is laid on providing conducive environment in school for efficient and permanent learning. Sufficient practice and exercise are necessary to make the boundages between stimulus-response (S-R) permanent. The theory has relationship with the current study because academic and social integration affects students’ performance and
achievement in colleges of education. Government of Nigeria should make use of the theories in order to move the country forward.

**Display of research gaps and potential hypotheses/research questions arising from the gap**

There is no significant relationship between material resource situation (Lecture Hall, Laboratories, Libraries and office Accommodation) and students’ academic performance in Public Colleges of Education in Southwest Nigeria. Having tested the hypothesis results revealed that there was a significant positive relationship between students academic performance and Lecture Hall ($r = 0.991$); students academic performance and laboratories ($r = 0.798$), students academic performance and libraries ($r = 0.970$); students academic performance and office accommodation ($r = 0.892$).

**METHODOLOGY**

The descriptive research design of the ex post facto type was adopted for the study. The population of the study comprises all academic staff and three hundred level students in the six (6) selected public Colleges of Education in Southwest Nigeria. Purposive sampling technique was used to select six (6) public Colleges of Education in Southwest Nigeria, three (3) each from State and Federal Colleges of Education. They are Federal College of Education, Osiele, Ogun State, Federal College of Education (Tech), Akoka, Lagos State, Adeyemi College of Education, Ondo, Ondo State, Osun State College of Education, Ila-Orangun, Osun State, Ekiti State College of Education, Ikere-Ekiti, Ekiti State and Emmanuel Alayande College of Education, Oyo State. Purposive sampling technique was also used to select only three hundred level students in the six selected public Colleges of Education in Southwest, Nigeria. Simple random sampling technique was used to select one hundred and fifty (150) three hundred level participants from each of the six selected public Colleges of Education, making a total of nine hundred students (900) students. Simple random sampling technique was also used to select one hundred (100) academic staff each from the six selected public Colleges of Education, making a total of six hundred (600). The total sample for the study is therefore one thousand and five hundred (1,500) participants. Two self-designed questionnaires tagged Academic Staff and Educational Resource Situation Questionnaire (ASERSQ) for academic staff and Educational Resource Situation and Students’ Academic Performance Questionnaire (ERSSAPQ) for students were used to collect the needed data for the study. To ensure that the instrument for this study properly capture the expected inputs, the instrument was given to two experts in Measurement and Evaluation to assess its face and content validity. The reliability of the research instrument was conducted through test and retest method. The exercise was done by administering the questionnaires to academic staff and three hundred level students in Federal College of Education (Special), Oyo, (the institution is not chosen as sample) at an interval of four weeks. Their responses were analysed using Pearson product moment correlation and reliability co-efficient of 0.72 and 0.74 were obtained, which are considered sufficient for the instrument. Research questionnaire was administered by the researcher and trained research assistants to ensure effective administration of the questionnaires. Regression analysis and Pearson product moment correlation (PPMC) were used to analyse the collected data from the respondents.
FINDINGS

The hypotheses were formulated and tested. The results of the findings were summarized based on the hypotheses.

**Hypothesis 1:** There is no significant relationship between material resource situation (Lecture Hall, Laboratories, Libraries and Office Accommodation) and students’ academic performance in public Colleges of Education in Southwest Nigeria.

**Table 1: Correlation matrix of the relationship between material resource situation and students’ academic performance in public Colleges of Education in Southwest Nigeria**

<table>
<thead>
<tr>
<th>Variables</th>
<th>Students' Academic Performance</th>
<th>Lecture Hall</th>
<th>Laboratories</th>
<th>Libraries</th>
<th>Office Accommodation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Students' Academic Performance</td>
<td>1</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Lecture Hall</td>
<td>0.991*</td>
<td>1</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Laboratories</td>
<td>0.798*</td>
<td>0.805*</td>
<td>1</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Libraries</td>
<td>0.970*</td>
<td>0.979*</td>
<td>0.784*</td>
<td>1</td>
<td></td>
</tr>
<tr>
<td>Office Accommodation</td>
<td>0.892*</td>
<td>0.927*</td>
<td>0.740*</td>
<td>0.861*</td>
<td>1</td>
</tr>
</tbody>
</table>

*denotes significant at 0.05 level of significance

Results from Table 1 show significant positive relationship between Students' Academic Performance and Lecture Hall (r = 0.991); Students' Academic Performance and Laboratories (r = 0.798); Students’ Academic Performance and Libraries (r = 0.970); Students’ Academic Performance and Office Accommodation (r = 0.892).

**Hypothesis 2:** There is no significant relationship between physical resource situation (Laboratory Equipment, Instructional Materials, Social Amenities and Books and Journals) and students’ academic performance in public Colleges of Education in Southwest Nigeria.
Table 2: Correlation matrix of the relationship between physical resource situation and students’ academic performance in public Colleges of Education in Southwest Nigeria

<table>
<thead>
<tr>
<th>Variables</th>
<th>Students' Academic Performance</th>
<th>Laboratory Equipment</th>
<th>Instructional Materials</th>
<th>Social Amenities</th>
<th>Books and Journals</th>
</tr>
</thead>
<tbody>
<tr>
<td>Students’ Academic Performance</td>
<td>1</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Laboratory Equipment</td>
<td>0.795*</td>
<td>1</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Instructional Materials</td>
<td>0.954*</td>
<td>0.866*</td>
<td>1</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Social Amenities</td>
<td>0.318*</td>
<td>0.520*</td>
<td>0.423*</td>
<td>1</td>
<td></td>
</tr>
<tr>
<td>Books and Journals</td>
<td>0.840*</td>
<td>0.797*</td>
<td>0.890*</td>
<td>0.536*</td>
<td>1</td>
</tr>
</tbody>
</table>

*denotes significant at 0.05 level of significance

Results from Table 2 show significant positive relationship between Students' Academic Performance and Laboratory Equipment (r = 0.795); Students' Academic Performance and Instructional Materials (r = 0.954); Students' Academic Performance and Social Amenities (r = 0.318); Students' Academic Performance and Books and Journals (r = 0.840).

**Hypothesis 3:** There is no significant relationship between human resource situation (Adequate Manpower, Quality Manpower, Manpower Utilisation and Training and Retraining) and students’ academic performance in public Colleges of Education in Southwest Nigeria.

Table 3: Correlation matrix of the relationship between human resource situation and students’ academic performance in public Colleges of Education in Southwest Nigeria

<table>
<thead>
<tr>
<th>Variables</th>
<th>Students' Academic Performance</th>
<th>Adequate Manpower</th>
<th>Quality Manpower</th>
<th>Manpower Utilisation</th>
<th>Training and Retraining</th>
</tr>
</thead>
<tbody>
<tr>
<td>Students’ Academic Performance</td>
<td>1</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Adequate Manpower</td>
<td>0.878*</td>
<td>1</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Quality Manpower</td>
<td>0.532*</td>
<td>0.527*</td>
<td>1</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Manpower Utilisation</td>
<td>0.646*</td>
<td>0.659*</td>
<td>0.340*</td>
<td>1</td>
<td></td>
</tr>
<tr>
<td>Training and Retraining</td>
<td>0.708*</td>
<td>0.630*</td>
<td>0.461*</td>
<td>0.400*</td>
<td>1</td>
</tr>
</tbody>
</table>

*denotes significant at 0.05 level of significance
Results from Table 3 show significant positive relationship between Students' Academic Performance and Adequate Manpower \((r = 0.878)\); Students' Academic Performance and Quality Manpower \((r = 0.532)\); Students' Academic Performance and Manpower Utilisation \((r = 0.646)\); Students' Academic Performance and Training and Retraining \((r = 0.708)\).

**Discussion of Findings**

The study showed that a positive and significant relationship existed between resource situation and students’ academic performance in public Colleges of Education in Southwest, Nigeria. It also showed a positive and significant relationship between human and material resource situation and students’ academic performance. The findings of this study are consistent with that of Oni (1992), which found that inadequate and unqualified teachers in the school system caused low students’ academic performance since adequate and qualified teachers have been found as the drivers of effective educational system.

This is also in line with the submission of Ekundayo and Alonge (2012) that educational resources are of tremendous importance to the accomplishment of educational objectives and goals worldwide. According to them, the extent to which an educational institution attains her objectives is directly proportional to the educational resources available and their utilization. Thus, the interplay of nature and nurture on quality education and staff productivity is an important issue that cannot be overlooked by the stakeholders in education industry. Ayodele (1999) investigated resource situation in Nigerian schools as correlate of students’ academic performance and found that inadequate resource situation in schools for teaching and learning may lead to low students’ academic achievement.

Adeogun and Osifila (2008) linked the inadequate provision of educational resources to be a major contributor to the poor quality of education in educational institutions. This brings to fore the relevance of educational resources to students’ academic performance. Okebukola (2008) confirms that the place of physical resources in any educational process cannot be overemphasized but unfortunately according to him, many of the Nigerian higher institutions of learning are faced with classrooms and offices not befitting a public secondary school. Akomolafe (2005) is also of the view that availability of physical resources builds up the confidence in the instructors. Adeboyje (2000), in Oyekan (2014), opines that material resources are very important and indispensable in the educational process and therefore must be provided in adequate quantity and quality so as to enhance job and academic environment for better results in the education system. Salami (2007) affirms that the availability and conditions of social amenities is very paramount to achievements of set goals.

According to Anderson (1991), in Ewetan and Ewetan (2015), meaningful improvements in the quality of education that students receive are determined by the quality of teachers and thus quality teaching and learning are sine-qua-non for students’ academic performance. In a study of the relationship between teachers’ effectiveness and students’ academic performance in public secondary schools in Delta State, Nigeria, Akiri and Ugborugbo (2009), in Ewetan and Ewetan (2015), found that effective teachers produced better performing students. Adu and Olatundun (2007), in a study on teachers’ perception of teaching as correlate of students’ academic performance in Oyo State, Nigeria, found that the relationship between teachers’ perception and
students’ academic performance is positive and significant. Ayodele and Ige (2012) examined the relationship between utilisation of teachers and students’ academic performance in senior secondary schools in Ondo State, Nigeria, and found that the effective utilization of teachers rather than its mere availability impacted students’ academic performance. Adeyemi (2008) examined teachers’ teaching experience and students’ learning outcomes in the secondary schools in Ondo State, Nigeria, and found that teachers’ teaching experience was significantly related to students’ learning outcomes.

An Overview of Educational Resources in the Developed Countries and Developing nations

Educational resources are used in a learning environment to help and assist with people’s development and learning. They were designed to reinforce learning and in some cases allow people to put their knowledge to the test. Educational resources are brilliant for teachers and educators to help them deliver the best quality lessons. A developed country is a sovereign state with mature economy and technologically advanced infrastructure compare to other nations. A developed country is determined by a number of factors: political stability, infrastructure, social welfare programs, gross domestic product (GDP) level of industrialization. Human development index, income per capital, freedom and living standards of the general population are all indices of a developed countries. Countries that are not yet developed are called developing countries. A good examples of developed countries are Norway, Australia, Switzerland, Netherlands, United States of America (USA), Germany, New Zealand. A few examples of developing countries include Argentina, Brazil, Indian, Iran, Iraq, Indonesia and China. Under developing countries are countries that are characterized by widespread chronic poverty and less economic development than other nations e.g (Ghana, Ivory Coast, Nigeria, Kenya, Zimbabwe, Cameroon.

Open educational resources (OER) are part of a “range of processes” employed by researchers and educators to broaden access to scholarly and creative conversations in the developed countries. The 5R activities mentioned by Wiley David (2007) are:

- Retain: the right to make, own and control copies of the content (e.g download, duplicate, store, and manage)
- Reuse: the right to use content in a wide range of ways (e.g in a class, in a study group, on a website, in a video)
- Revise: the right to adapt, adjust, modify, or alter the content itself (e.g translate the content into another language)
- Remix: the right to combine the original or revised content with other material to create something new (e.g incorporate the content into a mashup)
- Redistribute: the right to share copies of the original content, your revisions, or your remixes with others (e.g give a copy of the content to a friend).

In African countries (Kenya, Ghana and South Africa) operates the open educational resources (OER) on differentiation. **Tablet** is the least used device in Kenya and Ghana

**Creation:** Kenya and Ghana are not satisfied with the speed, cost and stability of internet connection. Kenya and Ghana create basic and intermediate educational resources.
Sharing: More people from Kenya share these educational resources as compared to Ghana. Most respondents from Kenya and Ghana do not create advanced Educational resources Sources: 4th Go-GN seminar Banff Canada, 19-24 April 2015. In the opinion of Okeke (2019), Open Educational Resources in the Nigeria context is new, though scholars are making use of multimedia devices for networking. In the Nigeria Context (OER) is new though scholars are making use of multimedia devices for networking. It is a place to have Education Skill Fare where people come together and demonstrate skills called International Educational Management Network (IEDUMAN)

Human Resource and Students’ Academic Performance

Education is a globally recognized basic human right thus it is a form of investment that contributes to development of both individuals and the society. It is generally believed that the basis for any development must begin with the development of human resources. It remains the main avenue for social economic development and social mobilization in any society (World Bank, 2009). Samuel (2003), in Ibukun, Oyetakin and Akinfolarin (2012), notes that governments’ investment in education is anchored on the maxim that the end justifies the means and the principle of prime beneficiaries. In spite of governments’ scarce resources and competing projects of other areas of society, heavy investment in the procurement and utilization of human and material resources have shown that it occupies an important position in national development. Over the years, there has been increased provision of educational opportunities and, the cumulative effects of economic and socio-political instability in the country have necessitated the proper planning of government investment in education.

Teacher characteristics such as years of teaching experience have been investigated to determine their effect on student outcomes. Ladebo (2005) found that teachers in the subject area that they are assigned to teach produce greater gains in student achievement. However, teacher experience is a topic of potential concern to policymakers, because experienced teachers often try to move to urban schools and classrooms with a more privileged student body and higher resources. Thus, if teacher experience is related to student achievement, and more experienced teachers are able to some extent select the schools in which they teach, or even their teaching assignments within a school, poor students and students at risk of educational failure may end up being doubly disadvantaged because they are more likely to be taught by inexperienced teachers. Greenwald, Hedges, and Laine (1996), in Tella (2008) found that teaching experience had a positive and significant effect on student achievement. Vela (2003) found evidence that although teaching experience appears to be related to student achievement, the relationship may not be linear; students whose teachers had fewer than 5 years of experience had lower levels of achievement.

The search for efficient and effective delivery of instruction to students has always been major concern of educators. Among major factors that have significant role to play in teaching and learning processes are instructional materials. Instructional material could be explained as devices through which knowledge, skills, attitude, ideas, beliefs and values got transmitted to the learner by the teacher in order to ease teaching–learning process. Akanbi (1988), in Awolaju (2016), defines instructional materials as materials designed to enrich the teaching and learning processes and hence contribute to better learning. They help the teacher to convey the intended message
effectively and meaningfully to the learners so that the learners receive, understand, retain and apply the experience gained to reach overall educational goals. The importance of instructional materials in teaching and learning is too obvious to be overemphasized.

Research findings have shown that the success of any educational endeavour rests on the availability of physical facilities, especially the school building. Writing on its importance, Olutola (1982) noted that the availability of the school building contribute to good academic performance as they enhance effective teaching-learning activities. A study done by Zinnah and Adam (2003) declared that many of the traditional ways of teaching are no longer fully adequate unless correctly accompanied with appropriate instructional strategies. Comparing schools in developing countries with what is obtained in industrialized world, in terms of facilities, materials, utilization, and provision.

**Open Educational Resources (OER)**

The university initiated high quality multiple media distance courses in a new venture called Open Learn. The open university is making its courses available worldwide on the web as OERs (http://www.open.acrdk/openlearn). Distance learning courses, online educational resources are obtainable through Information and Communication Technologies (ICTs). The availability and reality of ICTs, however, can also be unequal between different countries. Therefore, Open Educational Resources (OERs) are shareable assets. The origin and development of (OERs) is discussed in detail by a number of authors Smith & Casserly, 2006, Hylen 2006; Downes, 2006, Geser 2007, Wiley, 2006, Wiley, 2007. Prior to Open learn, the majority of (OERs) were developed at campus based institutions where learning and teaching often relies on lecturers input to course materials. The open university distance learning methods by contrast already embody the lecturers in the form of supposed open learning e.g university based in south African and other college in the United Kingdom. Open learn is funded by the William and Flora Hewlett foundation and launched on October 25, 2006. The term OER itself covers a wide range of assets. Textual OER, however, are the most widely available shareable assets in OER repositories Wiley, (2007).

**CONCLUSIONS AND RECOMMENDATIONS**

**Conclusion**

Education is a fundamental human right as well as a catalyst for economic growth and human development. Education is valued because it contributes to the national development through the provision of an appropriate human resource that helps to stimulate productivity and eliminate hunger, poverty, disease and ignorance. It also liberates man from socio-political forces which weigh upon him and mould a new personality at global level. Thus, the success or otherwise of the Nigerian economy depends, to a very large extent, on its educational provision. Most developed countries have invested enormous amount of time, energy and money in providing qualitative education to their citizens as it is a force that has eradicated ignorance and poverty from most societies. As a result, premium is placed on the provision of this essential ingredient in national development. This provides reasonable justification for the huge investment of resources in the provision of education.
Learning outcomes are influenced by many factors and therefore many interacting factors such as social and economic factors may cause the poor performance of students in educational institutions. Some interacting factors that may determine students’ academic performance are availability and utilisation of teaching and learning resources such as laboratory, classrooms, textbooks and library facilities. The facilities in any school have been observed as a very powerful factor to quantitative education. The poor performance has also been linked to factors such as lack of equipped laboratories, libraries, as well as population explosions in schools.

**Recommendations**

Based on the study findings and the conclusion, the researcher derived the following recommendations:

The study found that there was positive correlation among material, physical and human resources and students’ academic performance in public Colleges of Education in Southwest Nigeria, the study thus recommends that governments and policy makers in these educational institutions should place emphasis on adequate provision of these germane resources in order to enhance students’ academic performance and thus national development. College management in public Colleges of Education in Southwest Nigeria should endeavour to provide enough resources for improvisation, in case the basic physical needs of the institutions could not be adequately met. College management in public Colleges of Education in Southwest Nigeria should endeavour to organize training and retraining for lecturers to enhance their skills and knowledge, be able to effectively utilize the available resources, and to be able to adapt and utilise improvised materials in order to improve the academic performance of students.

Parents are admonished to adequately equip their children and wards in public Colleges of Education in Southwest Nigeria with the necessary educational needs to enhance their academic performance. Students in public Colleges of Education in Southwest Nigeria should be ready to adapt to improvisation of some physical materials to acquire the requisite knowledge and skills towards advancing national development. Societies, philanthropists, old students’ associations and other organizations are admonished to come to the aids of governments in the provision of basic physical and material resources need of public Colleges of Education in Southwest Nigeria, as it has been established that governments alone cannot effectively shoulder the responsibility of educational financing.
REFERENCES


Okebukola, P. (2008). ‘Repositioning UniAbuja for academic excellence’. Being a paper delivered by Prof. Peter Okebukola, Former Executive Secretary, National Universities Commission (NUC) at The Stakeholders’ Forum of the University of Abuja.

Okeke, I. (2019) Educational Resource Centre is key to Teacher’s Success in Nigeria. Businessday January. 20
http://businessday.ng


