# AVAILABILITY AND UTILISATION OF ICT RESOURCES IN THE TEACHING OF OFFICE TECHNOLOGY AND MANAGEMENT FOR ENSURING QUALITY IN TERTIARY INSTITUTIONS IN OGUN STATE

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**Abstract**

*This study assessed the availability and utilisation of ICT resources in the teaching of office technology and management for quality in tertiary institutions in Ogun State. To achieve the aim of the study, three research questions and three null hypotheses guided the study. The population of the study consists of 2410 respondents comprising of 65 OTM lecturers and 2345 final year undergraduates of the five tertiary institutions offering OTM in Ogun State. The sample consisted of 268 respondents, including 235 students and 33 lecturers. The selection was made using proportionate sampling methods, which involved sampling 50% of the lecturers and 10% of the students. Data collection was conducted using a validated questionnaire that produced a Cronbach alpha reliability rating of 0.76. An analysis of the acquired data was conducted using mean and standard deviation to address the research questions, and t-test to evaluate the hypotheses. The observations indicated that while internet, projector, electronic scanner, application software, and cassette recorder are accessible for the instruction of OTM courses, they are not adequately used in the teaching of office technology and management education courses to ensure the quality of the curriculum. It was also found that there is no significant difference in the opinion of lecturers and students on availability and utilisation of ICT resources in the teaching of OTM courses for quality of product in tertiary institutions in Ogun State.The study however recommended that Ogun State Government through management of tertiary institutions should provide and make available more ICT resources needed for teaching and learning of OTM courses in order to ensure quality in tertiary institution and OTM Lecturers should ensure that the available ICT resources are fully utilised for teaching and learning of OTM in order to ensure quality in tertiary institutions in Ogun State.*

***Keywords**: Availability, Utilisation, ICT Resources and Quality of OTM Products*

## Introduction

Office Technology and Management (OTM), also referred to as Secretarial Education, is a vocational business education programme that is offered in tertiary institutions such as universities, polytechnics, and colleges of education, designed purposely to educate and train students to become secretarial teachers and office administrators. OTM education is primarily concerned with the acquisition and mastery of office-related skills needed to perform in the





business and technological organisations (Nosakhare, 2023). It is a course of study that is designed to equip the students with the appropriate skills and competencies needed to take up a career in office occupation and business (Amoor & Udoh, 2008; Lasisi, 2021). Office Technology and Management is an educational curriculum designed to cultivate the necessary skills in the learner (Nwabufo et al., 2020). The capabilities encompass keyboarding, ICT, general office operational procedures, shorthand, and other related abilities. Entrepreneurship is a field within vocational and business education that equips students for both paid work and self-employment (Nnaji, 2020). It then means that OTM education is an educational programme for competent and efficient performance which emphasizes the knowledge, skills, competencies, attitudes and technicalities that learners (the would-be secretaries)will be expected to display on completion of their training (Mshelia & Orheruata, 2023; Udoudom & Usoro, 2013). Ugwu (2018) stressed that secretarial education which is now regarded as OTM is a programme of study that provides students with adequate skills, information and competencies needed to function well in office occupation and be self-reliant as an office manager or manager. OTM as an aspect of business education programme is offered in tertiary institutions in Nigeria,

Tertiary education is the education offered after secondary education in institutions like polytechnics, colleges of education, universities as well as institutions that offer correspondence courses. The primary objective of higher education is to develop both physical and intellectual abilities that empower individuals to be self-sufficient and contribute effectively to society (Adebisi, 2014). To be a useful member of the society, one need to acquire skills and knowledge from various disciplines offered in tertiary institutions including office technology and management. Acquisitions of relevant skills that will make an individual useful to the society after graduation depend on the quality of products of Nigerian tertiary institutions (Jimoh et al., 2017). This therefore means that the success or otherwise of any tertiary institution programme depends largely on the quality of its graduates.

Quality assurance is a concept that describes the totality of the management practices, processes and controlled measures put in place by an institution to promote and ensure quality in its operations and products (Udoudom et al., 2013, Machumu & Sipora, 2014). Consequently, quality assurance in education system is an umbrella concept for a lot of activities that are designed to improve the quality of input, process and output of the educational system (Jimoh et al., 2017).This means that the efficiency of the product of educational institution is the result of inputs viz., teachers, classrooms, laboratories, libraries, computers, consumable materials, equipment, infrastructural facilities etc., as well as the process (instructional delivery) such that where the input and process are faulty, the output will be faulty (Ikechukwu & Okoro, 2023; Onyesom & Ashibogwu, 2013).

The aims of quality assurance in relation to Office Technology and Management include ensuring that at least the provisions of the minimum academic standards are attained, maintained and enhanced; assuring employers and other members of the society that all graduates of OTM education in all institutions have attained an acceptable level of competence in their areas of specialisation; and certifying to the international community that the academic programmes offered in OTM education are of high standards and their graduates are adequately trained for employment and postgraduate studies (Omoniyi & Elemure, 2020; Udoudom et al. 2013).Hence, one of the means through which quality assurance of OTM graduates can be ensured in this current technological era is by the provision and utilisation of Information and Communication Technology (ICT) resources for instructional delivery in tertiary institutions.

Information and Communication Technology, ICT, simply relates to those advanced technologies in accessing, gathering, processing, manipulating, distributing, storing, presenting and transmitting of data using computer hardware and software, telecommunications, and digital electronics (NOUN, 2008). ICT refers to various forms of technologies that are used to create, store, share, transmit, or exchange information; technologies or resources like computer system, radio, television, video, DVD, telephone and software as well as services associated with these technologies such as video-conferencing and electronic mail (Jimoh et al., 2017). Furthermore, Tinio (2003) argued that ICTs encompass a wide range of technological instruments and resources employed for the purposes of communication, creation, distribution, storage, and management of information. The most significant about ICT is the increasing convergence of computer-based, multi-media and communications technologies and rapid rate of change that characterises both the technologies and their uses (Enebeli, 2024; Mandara & Paul, 2012).Experts have expressed that ICT in the education process has been divided into two broad categories namely: ICTs for Education and ICTs in Education (Enu et al. 2018). ICTs in education refer to the creation of ICT expressly for the goal of teaching and learning, whereas ICTs for education involve the use of generic parts of ICT in classroom instruction (Olakulehin, 2007). In order to accomplish the aim of OTM in tertiary institutions and as well ensure quality of products in this global age, the systems must function in line with the application of ICT resources in teaching and learning.

Today, effective teaching activities require the use of ICT facilities in line with subject and pedagogical procedures to impart necessary skills to the learners. The integration of ICT in teaching is a central matter in ensuring quality of business education which includes OTM (Okolocha & Nwadiani, 2015). The benefits of ICT utilisation in teaching and learning for quality assurance have been expressed by experts. For instance, the use of ICT resources in instructional delivery arouses the interests and active participation among learners in OTM which in turn contribute to quality assurance of the program (Ezenwafor & Nwachukwu, 2020; Mandara & Paul, 2012).

Through the use of ICT, students can have lessons presented with presentation software, simulate situations, build their own knowledge, improve their knowledge base, explore authentic issues, work with peers and experts across the globe, select the mode they prefer and work at their own pace (Agbo, 2015). Mandara & Paul (2012) noted that when ICT are use appropriately, it helps to expand OTM students access to information, strengthen the importance of the programme to increasingly digitalise workplace, and raise the programme quality; assists in making teaching and learning more engaging and active by connecting theory to real practical life. Impliedly, these outlined benefits of ICT to education showed that a systematic quality assurance in the teaching and learning of OTM courses is possible with utilisation of ICT resources.

However, over the years, the concerns and challenges in Office Technology and Management programme in tertiary institutions in Nigeria have been the quality of the graduates in relation to technological advancement in the labour market (Okolocha & Nwadiani, 2015). Ezenwa for and Soneye (2017) posit that most business education lecturers in tertiary institutions in Nigeria lack adequate pedagogical knowledge for effective utilisation of ICT resources for teaching. Also, Ezenwa for and Nwachukwu (2020) reported that few ICT resources are greatly utilized while the rest are moderately and rarely utilized for OTM instruction. Consequently, it is unexcitingly common to see most OTM graduates enrol in computer or ICT centres to acquire those ICT skills which ought to have been mastered during their learning days in the tertiary institutions(Agede, 2020; Mandara & Paul, 2012).





The successful implementation and use of ICT resources for educational purposes in schools is essentially contingent upon the presence and ease of access to those resources (Asabere& Ahmed, 2013; Molotsi, 2022). According to Gunter and Gunter (2015), teachers who do not have access to ICT resources are unlikely to utilise them for classroom instruction. Aktaruzzaman et al. (2011) and Schoeman et al. (2022) argue that the proliferation of ICT tools, their user-friendly interface, and the wide range of information available enable teachers to explore a global realm outside the confines of the classroom. According to Okolocha and Nwadiani (2015), ICT application in tertiary institutions falls below expectation because that few ICT resources available were rarely utilized. Agede (2020) expressed that the non-availability of some ICT resources on campuses hamper educator sutilisation of ICT resources in teaching while Yushau and Nannim (2020) reported that ICT facilities were not utilised in teaching office education students. Meanwhile, ensuring quality assurance of OTM products in this technological era depends on availability and utilization of ICT resources. A major gap in most tertiary institutions particularly in Ogun State is the issue of non availability and poor utilization of ICT resources and little studies have conducted in Ogun State to assess the availability and utilisatin of ICT resources in quality assurance of OTM products. It is on this note that the researcher deemed it fit to assessed the availability and utilisation of ICT resources for quality of office technology and management products in Ogun State.

**Purpose of the Study**

The major objective of the study was to assess the availability and utilisation of ICT resources for quality of office technology and management products in Ogun State. Specifically, the study sought to:

1. determine the extent of availability of ICT resources for teaching of OTM courses for quality of the programme in tertiary institutions in Ogun State.
2. assess the extent of utilisation of ICT resources for teaching of OTM courses for quality of the programme in tertiary institutions in Ogun State.
3. identify the factors hindering effective utilisation of ICT resources in the teaching and learning of OTM courses for quality assurance of the programme in tertiary institutions in Ogun State.

**Research Questions**

1. What are the ICT resources available for the teaching of OTM courses for ensuring quality in tertiary institutions in Ogun State?
2. To what extent are ICT resources utilised for teaching of OTM courses for ensuring quality in tertiary institutions in Ogun State?
3. **What are**the factors hindering effective utilisation of ICT resources in the teaching and learning of OTM courses for ensuring qualityin tertiary institutions in Ogun State?

**Research Hypotheses**

The following null hypotheses were formulated and tested at 0.05 level of significance;

1. There is no significant difference in the mean response of OTM lecturers and students on the extent of availability of ICT resources for teaching of OTM courses for quality in tertiary institutions in Ogun State.
2. There is no significant difference in the mean response of OTM lecturers and students on the extent of ICT resources utilisation for teaching of OTM courses for quality in tertiary institutions in Ogun State.

3. There is no significant difference in the mean response of OTM lecturers and students on the factors hindering effective utilisation of ICT resources in the teaching and learning of OTM courses for quality in tertiary institutions in Ogun State.

**Methodology**

The study employed a descriptive survey research design. The population of the study consists of 2410 respondents comprising of 65 OTM lecturers and 2345 final year undergraduates of the five tertiary institutions offering OTM in Ogun State. The sample comprised of 268 respondents (235 students and 33 lecturers) which was selected using proportionate sampling techniques.50% of the lecturers' and 10% of the students'population were randomly selected. This action aligns with the submission of Uzoagulu (2011) that 50 of population less hundred is representative while 10% of population less than 3000 is representative. A structured questionnaire consisting of 38 items developed and validated by experts was used for data collection. Research question one used a modified four-point Likert response scale of *Highly Available*, *Available*, *Moderately Available* and *Not Available*; research question two used a modified four-point Likert response scale of *Highly Utilised*, *Utilised, Moderately Utilised* and*Not Utilised*; while research question three used a four-point Likert response scale of *Strongly Agree*, *Agree*, *Disagree* and *Strongly Disagree*. Croonbach alpha was adopted in determining the reliability of the instrument. The questionnaire was administered to 70 respondents (50 students and 10 lecturers) in Lagos state University (a location outside the geographical scope of the study) and the analysis yielded a reliability coefficient of 0.76.Data collected were analysed using descriptive statistics of mean and standard deviation to answer the research questions and t-test to test the null hypotheses at 0.05 level of significance.

**Results**

**Research Question One:** What are the ICT resources available for the teaching of OTM courses for ensuring quality in tertiary institutions in Ogun State?

**Table 1:** Mean Rating on Extent of ICT Resources Availability for Teaching of OTM Courses

| S/N | Extent of ICT Resources Availability | Mean | Remark |
|---|---|---|---|
| 1. | Computer in the laboratory | 3.63 | Available |
| 2. | Interactive board for instruction | 2.09 | Not Available |
| 3. | E-library for both students and lecturers | 2.18 | Not Available |
| 4. | Internet service for students and lecturers | 3.18 | Available |
| 5. | Video and audio conferencing | 2.27 | Not Available |
| 6. | Projector for lecture presentation | 3.00 | Available |
| 7. | Light pen | 2.19 | Not Available |
| 8. | Application software | 3.09 | Available |
| 9. | Cassette recorder | 3.18 | Available |
| 10. | Electronic scanner | 3.00 | Available |
| 11. | Local area network to access internet | 2.20 | Not Available |
| | **Grand Mean** | **2.72** | **Available** |

The result of data analysis on Table 1 above showed that items 1, 4, 6, 8, 9 and 10 with mean rating above 2.50 are the ICT resources available for teaching OTM courses in tertiary institutions in Ogun State. Other ICT resources on the table(items 2, 3, 5, 7 and 11) with mean rating below 2.50 are not available for teaching OTM courses. The grand mean of 2.72 which is higher than the cut off point of 2.50 showed that most of the ICT resources such as computer in the laboratory, internet service for students and lecturers, projector for lecture presentation, application





software, cassette recorder and electronic scanner are available for teaching of OTM courses in tertiary institutions in Ogun State.

**Research Question Two:** To what extent are ICT resources utilised for teaching of OTM courses for ensuring quality in tertiary institutions in Ogun State?

**Table** 2: Mean Rating on Extent of ICT Resources Utilisation for Teaching of OTM Courses

| S/N | Extent of ICT Resources Utilisation | Mean | Remark |
|---|---|---|---|
| 1 | Use computer to access students feedback | 2.91 | Utilised |
| 2 | Use interactive board for instructional delivery | 1.09 | Not Utilised |
| 3 | Use e-library to share lecture content to students | 1.27 | Not Utilised |
| 4 | Use Internet service to search for materials | 2.08 | Not Utilised |
| 5 | Use video and audio conferencing for knowledge sharing | 2.00 | Not Utilised |
| 6 | Use overhead projector for lecture presentation | 3.00 | Utilised |
| 7 | Light pen to write manuscript | 1.08 | Not Utilised |
| 8 | Use application software to teach keyboarding | 3.00 | Utilised |
| 9 | Use power point to plan lecture presentation | 2.09 | Not Utilised |
| 10 | Use e-mail to distribute assignment and get feedback from students | 1.99 | Not Utilised |
| 11 | Use search engine to download information | 3.00 | Utilised |
| 12 | Use film strip application as teaching aids | 2.00 | Not Utilised |
| 13 | Use tape recorder and headphone for shorthand instruction | 3.00 | Utilised |
| 14 | Use electronic typewriter to develop students speed | 3.82 | Utilised |
| 15 | Use spread sheet for grading students script | 3.73 | Utilised |
| | **Grand Mean** | **2.40** | **Not Utilised** |

The result of data analysis on Table 2 showed that items 1, 6, 8, 11, 13, 14 and 15 with mean rating above 2.50 are the ICT resources utilised for teaching OTM courses in tertiary institutions in Ogun State. Other ICT resources on the table (items2, 3, 4, 5, 7, 9, 10, and 12) with mean rating below 2.50 are not utilised for teaching OTM courses. The result revealed that most of the ICT resources are not utilised for teaching of OTM courses in tertiary institutions in Ogun State. Out of 15 items, 7 are positive while 8 are negative and you have a grand mean of not utilised. The average grand mean is 2.50 and your grand mean here is 2.40 which mean that the grand mean is below the average.

**Research Question Three:** What are the factors hindering effective utilisation of ICT resources in the teaching and learning of OTM courses for ensuring quality in tertiary institutions in Ogun State?

**Table** 3: Mean Rating on Factors Hindering ICT Resources Utilisation for Teaching of OTM Courses

| S/N | Factors Hindering ICT Resources Utilisation in OTM | Mean | Remark |
|---|---|---|---|
| 1. | Irregular power supply | 3.91 | Agreed |
| 2. | Poor funding of tertiary institution | 3.00 | Agreed |
| 3. | High cost of maintenance | 3.09 | Agreed |
| 4. | Lecturers' ICT incompetence | 1.82 | Disagreed |
| 5. | Management attitude to ICT utilisation | 2.00 | Disagreed |
| 6. | Lack of training programme for OTM lecturers | 3.00 | Agreed |
| 7. | Neglect of lecturers' welfare | 1.18 | Disagreed |
| 8. | Lack of technical support | 3.00 | Agreed |
| 9. | High cost of ICT equipment | 3.00 | Agreed |
| 10. | Non availability of some ICT resources | 3.08 | Agreed |
| 11. | Inadequate ICT education and orientation for lecturers | 3.18 | Agreed |
| 12 | Frequent change in the model of some ICT resources | 3.09 | Agreed |
| | **Grand Mean** | **2.78** | **Agreed** |

The result of data analysis on Table 3 showed the respondents agreed to statements in items 1, 2, 3, 6, 8, 9, 10, 11 and 12 as some of the problem sencountered in the utilisation of ICT resources for teaching OTM courses because they showed mean rating above 2.50 cut off point. The result showed that lecturers' ICT incompetence, management attitude to ICT utilisation and neglect of lecturers' welfare are not part of the problems affecting the utilisation of ICT resources for teaching OTM courses because items 4, 5 and 7 revealed mean rating below 2.50.

**Hypothesis One:** There is no significant difference in the mean response of OTM lecturers and students on the extent of availability of ICT resources for teaching of OTM courses for quality of the programme in tertiary institutions in Ogun State.

**Table 4:** T-test Analysis of Mean Rating of Lecturers and Students on ICT Resources Availability for Teaching of OTM Courses

| Variables | N | Mean | Std. Dev | Df | T-value | Sig. (2-tailed) | Decision |
|---|---|---|---|---|---|---|---|
| Lecturers | 33 | 27.83 | 2.13 | 266 | 0.39 | 0.69 | NS |
| Students | 235 | 27.72 | 2.01 | | | | |

The result of data analysis in Table 5 above revealed T-value of 0.39and a significance value of 0.69. The computed significance value of 0.69 is greater than the alpha significance of 0.05 at which it is being tested. Therefore, the null hypothesis of no significant difference is hereby accepted and this means that there is no significant difference in the mean rating of lecturers and students on the availability of ICT resources for teaching OTM courses for quality assurance in tertiary institutions.

**Hypothesis 2:** There is no significant difference in the mean response of OTM lecturers and students on the extent of ICT resources utilisation for teaching of OTM courses for quality of the programme in tertiary institutions in Ogun State.

**Table 5:** T-test Analysis of Mean Rating of Lecturers and Students on ICT Resources Utilisation for Teaching of OTM Courses

| Variables | N | Mean | Std. Dev | Df | T-value | Sig. (2-tailed) | Decision |
|---|---|---|---|---|---|---|---|
| Lecturers | 33 | 36.10 | 2.64 | 266 | 0.22 | 0.83 | NS |
| Students | 235 | 36.03 | 2.64 | | | | |

The result of data analysis in Table 5 above revealed T-value of 0.22and a significance value of 0.83. The computed significance value of 0.83 is greater than the alpha significance of 0.05 at which it is being tested. Therefore, the null hypothesis of no significant difference is hereby accepted and this means that there is no significant difference in the mean rating of lecturers and students on ICT resources utilisation for teaching OTM courses in tertiary institutions.

**Hypothesis 3:** There is no significant difference in the mean response of OTM lecturers and students on the factors hindering effective utilisation of ICT resources in the teaching and learning of OTM courses for quality assurance of the programme in tertiary institutions in Ogun State.

**Table 6:** T-test analysis of Mean Rating of Lecturers and Students on Factors Hindering ICT Resources Utilisation for Teaching of OTM Courses





| Variables | N | Mean | Std. Dev | Df | T-value | Sig. (2-tailed) | Decision |
|---|---|---|---|---|---|---|---|
| Lecturers | 33 | 33.38 | 1.49 | 266 | 0.04 | 0.97 | NS |
| Students | 235 | 33.37 | 1.52 | | | | |

The result of data analysis in Table 6 above revealed a computed significance value of 0.89 which greater than the alpha significance of 0.05 at which it is being tested. Therefore, the null hypothesis of no significant difference is hereby accepted and this means that there is no significant difference in the mean rating of lecturers and students on factors hindering ICT resources utilisation for teaching of OTM courses in tertiary institutions in Ogun State.

**Discussion of Findings**

The findings of the research question one revealed that most of the ICT resources are available for teaching of OTM courses in tertiary institutions in Ogun State because the grand mean is below the mean cut off point of 2.50. This result may be attributed to the fact that most organisation including tertiary institutions in Ogun have embraced the use of ICT for job performance because of the technological advancement and spread which helps in effective teaching and learning of OTM. Also, most of the available ICT resources are inevitable for the provision of educational service in tertiary institution particularly in aiding lecturers' functionality for effective teaching and learning. This finding is in consonance with the finding of Okorieocha et al. (2019) who reported that majority of ICT facilities are available to high extent in tertiary institutions. The finding contradicts the recent reports of Agede (2020) found that availability of ICT facilities for quality instructional delivery in universities is significantly low except for internet-connected computers and institutional cybercafé. Also, Word et al. (2022) reported that less than 25% of colleges of education in southwest Nigeria are provided with ICT resources for instructional delivery. Similarly, Epelle et al. (2022) reported that the extent of Information and Communication Technology availability in teaching Business Education courses in tertiary Institution in Rivers State is relatively low. This shows the scenario of ICT availability is better in Ogun State compare to what happened in other states.

Research question two found that ICT resources are not utilised for teaching of OTM courses in tertiary institutions in Ogun State because the grand mean is below the mean cut off point of 2.50. Low extent of ICT resources utilisation may be attributed to various challenges confronting our tertiary and society such as irregular power supply, frequent change in the model of some ICT resources, Lack of training programme and orientation for OTM lecturers on the usage of new model, poor maintenance culture and lack of technical support for lecturers. However, utilisationof ICT resources have been reported to aid and facilitate instruction in schools and classrooms thereby, relating the curricula content with real world challenges. This is in consonance with the submission of Adepoju (2019) that ICT resource application in Nigerian campuses fall below expectation and it affect teaching and learning. The result also agrees with finding of Epelle et al. (2022) that the utilization of information and communication technology in teaching business education courses in tertiary institutions in Rivers State is also low. This finding is in consonance with that of Okolocha & Nwadiani (2015) which states that ICT resources are rarely utilised for teaching business education courses in both colleges of education and universities. This finding buttressed the assertion that despite the mandatory inclusion of ICT literacy in the curriculum for both lecturers and students at all tertiary institutions, it seems that many institutions are not fully utilising the potential of ICT to enhance student learning (Chilaka et al., 2019).

The findings of research question three revealed that respondents agreed that some factors hindering effective utilisation of ICT resources in teaching of OTM courses include: non availability of some ICT resources, poor funding of tertiary institutions, high cost of ICT resources, change in model of some ICT resources, irregular power supply, high cost of maintenance, lack of technical support among others. This development is not a surprise because our society is faced with the problem of leadership who fail at all time to provide basic facilities and resources for education. The failure of government to make available enough fund for running of tertiary institution is a major obstacle in the provision and utilisation of ICT resources. This finding aligns with the finding of Igboke and Adebanji (2023) that the challenges to teaching of ICT related courses in Office Technology and Management (OTM) programmes in colleges of education are non availability of teaching facilities and human resources related. Similarly, this result align with the report of Okunoye and Okunoye (2022) that technological factors that hinder adequate ICT facilities include, low Internet connectivity bandwidth, unreliable telecommunication network, expensive hardware and software, expensive ICT facilities, unstable power supply and inadequate ICT facilities for networking while them anagerial factors causing hindrance include, insufficient funding, poor policy on ICT adoption, inadequate ICT budgeting and lack of good maintenance of ICT facilities.

The result of hypotheses revealed that there is no significant difference in the opinion of lecturers and students on availability and utilisation of ICT resources,and factors hindering effective utilisation of ICT resources in the teaching of OTM courses for quality assurance of the programme in tertiary institutions in Ogun state. This means that both lecturers and students are on the same page regarding availability, initialisation and challenges of ICT for OTM programmes in tertiary institutions. This finding is in agreement with that of Bupo & Ndinechi (2015) that there is no significant difference in the mean rating of business education students and lecturers on utilisation of e-learning facilities in tertiary institutions. It also aligns with the finding of Ela (2021) that there is significant difference between lecture and students rating regarding on the proficiency of lecturers and that of students in the utilization of e-learning facilities in tertiary institutions. The result is somewhat related to the report of Amiaya (2013) that there was no significant difference between the mean responses of lecturers and students on ICT resources available for OTM programme. The finding of Etonyeaku et al. (2014) that there was no significant difference in the mean ratings of lecturers and students on availability of ICT resources is also in tandem with the result of the study.

**Conclusion**

Based on the findings of the study, it was concluded that some ICT resources are available for teaching OTM courses and they are utilised to a low extent for teaching OTM courses in tertiary institutions in Ogun State. Though ICT resources utilisation in teaching of OTM courses has significant influence on quality of OTM products especially in this technological era, but some distinctive factors ranging from technological to managerial based are hindering the effective utilisation of ICT resources. It was inferred that both lecturers and students hold the same view regarding the availability and utilisation of ICT resources in Ogun State which further substantiate that there is a low extent of availability and utilisation of ICT resources in tertiary Institutions in Ogun State.

**Recommendations**

Based on the findings and drawn conclusion, the following recommendations are made:

1. Ogun State Government through management of tertiary institutions should provide more ICT facilities for teaching and learning in order to ensure quality of tertiary institution product.
2. OTM Lecturers should ensure that the available ICT resources are fully utilised for teaching and learning of OTM in tertiary institutions in Ogun State.
3. Government should provide enough funding for tertiary institutions in Ogun State because it is one of the major identified challenges affecting availability and utilisation of ICT resources in tertiary institution in the state.
4. OTM departments and units of tertiary institutions should develop sustainable preventive and corrective maintenance culture by servicing and repairing the available ICT resources and provide another source of power so utilisation will not be a challenge.

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