STATUS OF OFFICE TECHNOLOGY AND MANAGEMENT STUDENTS IN ACQUISITION OF COMPETENCY REQUIRED IN INFORMATION AND COMMUNICATION TECHNOLOGY IN COLLEGES OF EDUCATION, OYO STATE, NIGERIA

BY

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Abstract
The study investigated the status of Office Technology and Management students (OTM) in acquisition of competency required in Information and Communication Technology (ICT). To achieve the objectives of the study, three research questions were raised and answered while two hypotheses were formulated and tested at 0.05 level of significance. The study adopted descriptive research design. The population for the study consisted of one hundred and forty-eight (148) Business Education (Office Technology and Management option) students, there was no sampling due to manageable size of the population. The questionnaire was face-validated by three experts from the Department of Business Education, Tai Solarin University of Education, Ijagun, Ogun State. Test-retest reliability method was adopted to establish the reliability of the instrument with the co-efficient of r is equal to 0.78. The questionnaire was administered to one hundred and forty-eight (148) respondents and all were retrieved and data collected were subjected to analysis. Frequency and percentages were used to analyse respondents' bio-data, mean and standard deviation were used to answer research questions while t-test statistic was used to test the hypotheses. The findings of the study revealed that new office technological equipment are available for students' use thereby benefited from the availability of the equipment. It is equally revealed that respondents faced challenges in the effective utilization of ICT tools. Based on the findings, it was recommended among others that, new technologies should be effectively used by the Office Technology and Management (OTM) students and government should make provision for funds for the timely procurement of appropriate Information and Communication Technology (ICT) equipment.
Key words: Office Technology and management (OTM), Information and Communication Technology (ICT), competency, skill.

Introduction

The current trend in Office Technology and Management has made Information Technology indispensable in the modern age (Abuya, 2014). As the reliance on technology continues to expand in office, the roles and chances of Office Manager has greatly evolved. Office automation and organizational restructuring have led professional Office Managers to assume responsibilities that were once reserved for managerial staff. Office Technology and Management creates awareness, develops the potentials in man to subdue and harness the resources in his environment for the betterment of himself and his society (Abuya, 2014). According to Ofili and Idris (2016), Information and Communication Technology (ICT) is defined as computer based tools used by people for information and communication processing needs of an organisation. It encompasses the computer hardware and software, the network and several other devices (video, audio, photography camera, etc.) that convert information such as text, images, sound and motion into digital form.

Information and Communication Tecchnology can also be referred to as diverse set of technological tools and resources used to communicate and to create, disseminate, store and manage information. These technologies include computers, the internet, broadcasting technologies (radio and television) and telephone (Iyiola, 2017). Adomi and Kpangban (2010) defined Information and Communication Technology as electronic technologies use for information storage and retrieval. It covers all forms of computer and communication equipment and software used to create, design, store, transmit, interpret and manipulate information in its various format which include personal computers, laptops, tablets, mobile phones, transport systems, television and network technologies.

With this, Information and communication Technology can simply be referred to as technologies that provide access to information through telecommunication medium. The rapid change in the technology of office work through the use of machines to do the work that was previously done by hand explained what we call office technology/automation. In other words, the use of machines such as computers, electronic mail system, among others, is called technology. According to Ekpenyong (2008) defined Office Technology as the use of new inventions or devices in an office to transform, or change the process of office work. Advances in Information and Communication Technology and increased computerization have upgraded secretarial work, as they have led to a decrease in the quantity of more routine and mundane work, and to an increase in the quality and accuracy of the work produced by office managers.

Office Technology and Management Education is a component of Business Education that provides knowledge and skills for would-be office managers/secretaries to perform efficiently and effectively in the world of work. It also involves acquisition of skills, knowledge and competencies that make the recipient proficient in secretarial profession. According to Aliyu (2006), Office Technology and Management as a course is offered in Colleges of Education, Polytechnics and the Universities, primarily to educate and train students to become competent professional secretaries. Okoro and Amagoh (2008), described Office Technology and Management as an efficient, effective, productive and functional education which leads to self-employed, self-reliance, paid employment and consequently, self-actualization. The major aspect of the work of Office Technology and Management students and lecturers is Office Management. In the past, the course was referred to as Secretarial Studies. Although,

Secretarial Studies has changed to a new rebrand name called Office Technology and Management which has only change the course in nomenclature but not in scope. This was done to enable the students have knowledge of the new technologies in this Information and Communication era, since the world is changing to a global village.

Previously, the requirement for Office Technology and Management students and the career structure of a secretary in the public sectors in Nigeria stresses shorthand/typewriting speeds, though the new Office Technology and Management syllabus has brought reforms which replaced shorthand/typewriting with computer. Despite the huge academic and ICT-based content of the new Office Technology and Management (OTM) syllabus, the availability and utilization of Information and Communication Technology appeared to be at its lowest ebb and that is why Office Technology and Management students are probably facing big challenges in Information and Communication Technology. With this, school managements should not only be concerned in teaching the courses in the curriculum but should concentrate also in the information of a framework of policy for the development of the Office Technology and Management workshop with modern and up to date Information Technologies.

Statement of the Problem
The rapid and tremendous development of Information and Communication Technology has posed a lot of fear and challenges to Office Technology and Management students in Nigeria tertiary institutions due to the inadequate and unavailability of some Information and Communication Technological devices in Office Technology and Management laboratories which are to provide the secretarial students with the knowledge, skills and competencies needed in the advanced era of Information and Communication Technology. Other critical issues requiring immediate attention include inadequate number of trained lecturers, poor societal perception, poor industrial/institutional collaboration, incessant strike actions and proper utilization of modern ICT (Ejeka & Ebenezer-Nwokeji, 2016). Hence, this study examined the Status of Office Technology and Management students in acquisition of competency required in Information and Communication Technology.

Purpose of the Study
The main purpose of this study was to survey into the Status Office Technology and Management (OTM) students in the acquisition of competency required in Information and Communication Technology in Oyo State colleges of education. Specifically the study sought to:
1. Identify Information and Communication Technology (ICT) equipment available for use by Office Technology and Management (OTM) students.
2. Examine the benefits of Information and Communication Technology (ICT) to Office Technology and Management (OTM) students.
3. Ascertain the challenges faced by Office Technology and Management (OTM) students in acquisition of competency required in Information and Communication Technology (ICT).

Research Questions
The following research questions were raised to guide the study:
1. What are the Information and Communication Technology (ICT) equipment available for use by Office Technology and Management Students (OTM)?
2. What are the benefits of Information and Communication Technology (ICT) to Office Technology and Management (OTM) students?
3. What are the challenges faced by Office Technology and Management (OTM) students in acquisition of competency required in Information and Communication Technology (ICT)?

Research Hypotheses
Two null hypotheses were formulated for the study. The hypotheses were tested at 0.05 level of significant.
$H0_1$: There is no significant difference in the mean responses of male and female respondents on the equipment available for use by Office Technology and Management (OTM) students.
$H0_2$: There is no significant difference in the mean responses of male and female students on students' related challenges in acquisition of competency required by Office Technology and Management (OTM) students in Information and Communication Technology (ICT).

Methodology
The study adopted descriptive research design. The total population of the study comprised One hundred and forty-eight (148) 300level students of Business Education department (Office Technology and Management option) from three (3) Colleges of Education in Oyo state, Nigeria. There was no sampling because the size of the population is manageable. The researcher chooses to examine the entire population, because the size of the population is manageable to carry out the study. The instrument for data collection for the study was a structured questionnaire developed by the researcher titled: Status of Office Technology and Management (OTM) students in acquisition of competency required in Information and Communication Technology (OTM). The questionnaire contains thirty (30) items with two sections (A and B). Section A dealt with demographic data of the respondents. Section B was divided into three (3) parts: (1-3). First part covers research question 1 and consists of ten (10) items which were used to determine the Information and Communication Technology (ICT) equipment available for use by Office Technology and Management (OTM) students. Second part covers research question 2 and consists of ten (10) items which were used to determine the benefits of Information and Communication Technology (ICT) to Office Technology and Management (OTM) students. Third part consists of ten (10) items which were used to determine the challenges faced by Office Technology and Management (OTM) students in acquisition of competency required in Information and Communication Technology. Items on first part were placed on a four-point rating scale of Very Highly Available (VHA), Highly Available (HA), Available (A) and Not Available (NA). Items in second and third part were place on a four-point rating scale of Strongly Agree (SA), Agree (A), Disagree (D) and Strongly Disagree (SD). The items were scored as follows: VHA = 4, HA = 3, A = 2, NA = 1 and SA = 4, A = 3, D = 2, SD = 1. The instrument on the Status of Office Technology and Management Students in the Acquisition of Competency Required in Information and Communication Technology (ICT) in Oyo State Colleges of Education was face and content validated by three experts in the Department of Business Education Tai Solarin University of Education. Test-retest reliability method was used

in testing the reliability of the research instrument of reliability index of 0.78. This shows that the instrument was reliable. Data were analyse using mean, and standard deviation and T-test statistics. All the hypotheses were tested at 0.05 level of significance. Decision rule: the following boundary limits were used for item option of research instruments. Very Highly Available (VHA) (3.50 – 4.00), Highly Available (HA) (2.50 – 3.49), Available (A), (1.50 – 2.49), Not Available (NA) (0.00 – 1.49). For research question two, and three, any item with a mean score of 2.50 and above was regarded as Agreed (A) while any item that is less than the mean score of 2.50 was regarded as Disagreed (D). For the hypotheses, if the observed p-value is less than the fixed p-value (0.05), the null hypothesis is rejected. On the other hand, if the observed p-value is greater or equal to the fixed p-value (0.05), the null hypothesis is accepted.

Results

Research Question 1: What are the Information and Communication Technology (ICT) equipment available for use by Office Technology and Management students?

Table 1: Mean and Standard Deviation of responses on the ICT equipment available for use by OTM students

S/N	Availability of Items	Mean	Standard Deviation	Remarks
1.	Computer	3.56	.76	VHA
2.	Printer	3.21	.79	HA
3.	Scanner	2.89	1.12	HA
	Photocopier	3.20	1.04	HA
.				
5.	Laminating Machine	2.71	1.16	HA
6.	Paper Shredder	2.68	1.20	HA
7.	Telephone	3.06	1.12	HA
8.	Paper Cutter or Trimmers	2.64	1.12	HA
9.	Binding Machines	2.68	1.15	HA
10.	Multimedia Projector	2.84	1.16	HA

Source: Field Survey, 2021

Table 1 above shows the extent of the availability of ICT equipment available for use by OTM students. The table revealed that all the ten (10) ICT items are available indicating with the mean scores of 2.50 and above. The standard deviation of 0.76 to 1.20 all indicated that the respondents were close in their responses.

Research Question 2: What are the benefits of Information and Communication Technology (ICT) to Office Technology and Management students?

Table 2: Mean and Standard Deviation of responses on the benefits of   Information and Communication Technology (ICT) to Office Technology and Management students

S/N	ITEMS	Mean	SD	Remark
1.	ICT enables students to be well informed and acquainted with information and facts on current issues.	3.47	.72	Agreed
2.	The use ICT makes it easier for OTM students to carry out research works into new opportunities.	2.94	1.09	Agreed
3.	ICT makes communication easier and quicker	3.13	.98	Agreed

	in business.			
4.	ICT helps to have security of confidential information and trade merits.	2.89	1.11	Agreed
5.	The use of ICT enables secretaries to flow very well in technological ideas	3.16	1.02	Agreed
6.	Through the use of ICT gadgets such as computer, smart phone, video conferencing etc. the work place has both physically and length-wise been expanded.	3.11	.95	Agreed
7.	The use of ICT has made it possible for secretaries to facilitate group work regardless of geographical location.	3.01	.99	Agreed
8.	With the use of ICT meetings can be held with people through video conferencing.	3.02	1.03	Agreed
9.	The use of ICT allows the flows of Information and Communication.	3.05	1.09	Agreed
10.	ICT helps secretaries in information processing.	2.83	1.16	Agreed

Source: Field Survey, 2021

Table 2 above reveals that all the mean scores were all above the cut-off point of 2.5 which indicated that all the respondents believed that they have one way or the other benefited from the use of ICT. The standard deviation of 0.72 to 1.16 all indicated that the respondents were close in their responses.

Research Question 3: What are the challenges faced by Office Technology and Management students in acquisition of competency required in Information and Communication Technology (ICT)?

Table 3: Mean and Standard Deviation of responses on the Challenges faced by OTM students in acquisition of competency required in (ICT).

S/N	ITEMS	Mean	SD	Remark
1.	Inadequate of modern teaching ICT aids	3.41	.857	Agreed
2.	Incessant strike action	2.62	1.09	Agreed
3.	Poor supervision during practical classes	2.76	1.13	Agreed
4.	Poor career counseling	2.78	1.23	Agreed
5.	Inadequate classrooms and laboratories	3.03	1.00	Agreed
6.	Poor utilization of e-learning	2.91	1.07	Agreed
7.	Low institution and industry partnership	2.85	1.07	Agreed
8.	Inadequate supply of ICT equipment and facilities	2.79	1.12	Agreed
9.	Inadequate of relevant textbooks	3.04	1.03	Agreed
10.	Unstable electricity supply in the school environment	2.90	1.01	Agreed

Source: Field Survey, 2021

Table 3 above shows that all the mean scores were all above the cut-off point of 2.5 which indicated that all the respondents faced problems in use of (ICT).. The standard deviation of 0.85 to 1.23 all indicated that the respondents were close in their responses.

Test of Hypotheses

H0₁: There is no significant difference in the mean responses of male and female respondents on the equipment available for use by Office Technology and Management (OTM) students.

Table 4: Mean and Standard Deviation of responses on the significant difference in the mean responses of male and female respondents on the equipment available for use by Office Technology and Management (OTM) students.

S/N	Gender	N	Mean	Std. Dev.	Df	T-Value	Decision
1.	Male	39	2.97	1.07	146	0.23	NS
2.	Female	109	2.93	1.05			

The analysis of data in Table 4 reveals that there are 39 male and 109 female respondents in the study. The table shows the mean and standard deviation of male and female responses ($\bar{x}$=2.97, SD=1.07) and ($\bar{x}$=2.93, SD=1.05). There was no significant difference in the mean responses of male and female respondents on the equipment available for use by Office Technology and Management (OTM) students (t_{146}=P>0.05). This, therefore, means that hypothesis one was accepted. This implies that male and female respondents do not differ in their responses regarding the availability of equipment for use by Office Technology and Management Students.

H0₂: There is no significant difference in the mean responses of male and female students on students' related problems in acquisition of competency required by Office Technology and Management (OTM) students in Information and Communication Technology (ICT).

Table 5: Mean and Standard Deviation of responses on the significant difference in the mean responses of male and female respondents on students' related problems in acquisition of competency required by Office Technology and Management (OTM) students in Information and Communication Technology.

S/N	Gender	N	Mean	Std. Dev.	Df	T-Value	Decision
1.	Male	39	2.25	1.07	146	0.26	NS
2.	Female	109	2.20	0.67			

The analysis of data in Table 5 reveals that there are 39 male and 109 female respondents in the study. The table shows the mean and standard deviation of male and female responses ($\bar{x}$=2.25, SD=1.07) and ($\bar{x}$=2.20, SD=0.67). There was no significant difference in the mean responses of male and female respondents on students' related problems in acquisition of competency required by Office Technology and Management (OTM) students in Information and Communication Technology (t_{146}=P>0.05). This, therefore, means that hypothesis two was accepted. This implies that male and female respondents do not differ in their responses regarding the students' related problems in acquisition of competency in Information and Communication Technology.

Discussion of findings

Base on research question 1, it was revealed from the findings that new office technology equipments are available for use by the students (respondents) in their various colleges. This goes in line with Sannie (2009) asserted that in modern offices, there are different types of office

machines and equipment, which the personnel e.g. managers, supervisors, secretaries, clerks, etc use in discharging their duties and functions.

Research question 2 findings indicated that the use of ICT makes Office Technology and Management (OTM) students to carry out research works into new opportunities, ICT also makes communication easier and quicker in business, ICT helps to have security of confidential information and trade merits. All these revealed that Office Technology and Management (OTM) students benefit from the use of Information and Communication Technology (ICT). This was supported by Iyiola (2017) who asserted that with the use of ICT gadgets such as computer, smart phone, video conferencing etc. the work place has both physically and length-wise been expanded.

Research question 3 revealed that Office Technology and Management (OTM) students faced the challenges such as incessant strike action, irregular power supply and inadequate or unavailability of Information and Communication Technology (ICT) equipments in Office Technology and Management (OTM) workshops. This view was supported by Abuya (2014), who stated that though new innovations and technologies are being introduced on daily basis, but there are still certain challenges that are being faced in Nigeria and generally the developing countries in the course of coping with the global demand.

Based on hypothesis 1, it was revealed that there is no significant difference in the mean responses of male and female respondents on the equipment available for use by Office Technology and Management (OTM) students. This findings correlates with Aromolaran (2003) who opined that in the recent past manual methods was used in processing documents, however, with the invention of modern equipment and the advent of Information and Communication Technology, many office equipment, machines and tools replace the obsolete equipment and tools.

Hypothesis 2 revealed that there is no significant difference in the mean responses of male and female students on students' related challenges in acquisition and competency required by Office Technology and Management (OTM) students in Information and Communication Technology (ICT). This findings correlates with Abuya (2014) who stated that though new innovations and technologies are being introduced on daily basis, but there are still certain challenges are being faced in Nigeria tertiary institutions.

Conclusion

Based on the findings of the study, it was concluded that the availability of new office technology tools available for use by the students had benefited them a lot in preparing them for the world of work. It has also made them be well informed and acquainted with information and facts on current issues. Also, with the introduction of these sophisticated technological (electronic) office equipment, Office Technology and Management (OTM) students need to meet the challenges by acquiring new skills and competencies for efficient operations in the electronic office as these new skills and competencies are from information and communication technology (ICT)).

Recommendations

Based on the conclusion of the study the following recommendations were made:

1.   New technologies should be effectively utilized in training institutions to train students in

other to prepare them for office career.

2. Government should also as a matter of urgency make provision for funds for the procurement of necessary modern equipment for meaningful education to take place in this modern day.
3. Office technology and management lecturers should up-date themselves on how to apply the new technologies when teaching. They should also be retrained to enable them acquire and up-date their skills in Information and Communication Technology (ICT).
4. Government should provide incentives for lecturers to enhance their commitment towards the work.
5. Priority should be placed on the stability of electricity in order to allow students to make use of Information and Communication Technology (ICT) tools at their lecture periods.
6. The curriculum of Office Technology and Management (OTM) should be tailored towards modern Information and Communication Technology (ICT) so as to equip the students with modern technologies they will need in the world of work.

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