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Availability and Use of ICTs in Collection Management in University Libraries in the South-South Zone of Nigeria

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Abstract

*T*his research work examined the availability and use of Information Communication Technology in Collection Management in Nigerian University Libraries in South –South Zone. Libraries in Federal Universities were used as case study. The respondents constituted the professional and para-professional librarians drawn from the six federal universities. The questionnaire was the major instrument used for data collection. The results from the study revealed that: the Management of Federal Universities have recognized the need for ICT and have made efforts to provide ICT facilities for their libraries which are used for Collection Management as well as other services. It also found that the ICT facilities are used basically for selection and acquisition of materials as against weeding activities. The Findings also reveal that staff of all of the Federal University Libraries studied face analogous restraints in the application of ICT to collection Management procedures. Based on the findings it was recommended that the Federal Government should urgently improve the generation and distribution of power in the country because every sector of the economy relies on it; University Management should as a matter of priority ensure that their libraries are stocked with up to date ICT facilities and that staff are trained regularly so as to upgrade their skills.

Key Concepts: *Availability, Use, ICT, University Libraries, Collection Management.*

Introduction

All federal institutions of learning are funded by the federal government in Nigeria. These institutions also known as ivory towers are established to primarily engage in teaching, learning, community service and research. This in effect amounts to transmission of knowledge to the coming generation and research in diverse fields of endeavor so as to discover solutions to the myriad problems plaguing mankind. The libraries servicing these institutions are as old as the institutions themselves as they have to provide enough information resources in various formats to cater for the academic and research needs of students and scholars. Academic libraries are libraries found in institutions of higher learning like Colleges of Education, Polytechnics, Universities and Research institutions. The major aim of establishing them is to serve the academic needs of the institution in terms of research, teaching and learning, community development/extension services as observed by Nwosu (2000) cited in Bua and Yawe,(2014). The primary role of a library is to disseminate information and with the avalanche of information in this era, the library has to re strategise and map out new ways of information handling so as to get maximum results. Many authors agree that University libraries are indispensable to the functioning of universities and to the achievement of their academic missions. To achieve this feat, the university library aspires to capture and hold the interest of the academic community's reading; to produce intelligent users of all types of documents; and to cultivate in users an appreciation of libraries as academic institutions.(Adegbile, 2014) They are charged with the basic responsibility of meeting the information needs of scholars and students in the pursuit of their academic goals however in order to achieve all the above listed, there is, a behind the scene activity that must take place before the information resources are made available for consultation by the patrons. One of such is called collection management. Collection Management activities presuppose collection building, evaluation etc and subsequent activities to manage the collection in order for it to be rich both qualitatively and quantitatively.

The emergence of Information and Communication Technology has affected every facet of human endeavour and specifically affects the services and functions of University libraries. Presently for the university library to be able to satisfy her users, it must embrace ICT fully and apply it in totality in all of its service areas. This research work will focus on the availability and Use of ICT in the area of collection management in University Libraries in the South South Zone with an emphasis on Federal University Libraries.

Statement of Problem

Considering the huge benefits that are accruable from applying ICT in library and information services, some Nigerian university libraries still experience some difficulties in the effective and efficient use of ICT facilities in the library. Effective collection management which is achievable through the application of ICT is likely to transform library services as they are offered to clients. Users nowadays are increasingly becoming

dissatisfied with traditional library services and thus criticise it as being deficient and note that these may be connected to a deficient collection management. Thus, this study seeks to identify the ICT facilities available in Federal University Libraries in the South-South zone as well as to ascertain if ICT facilities are applied to collection management procedures in these libraries.

Area of Study

This research covered all the Federal Universities in the South –South Zone of Nigeria. The University Libraries here comprise of the following:

- Nyong Essien Library, University of Uyo, Akwa Ibom State
- Federal University Library, Otuoke, Bayelsa State
- University of Calabar Library, Cross River State
- University of Petroleum Resources Library, Effurun, Delta State
- John Harris Library, University of Benin, Edo State
- Donald Ekong Library, University of Port Harcourt, Rivers State

Source: Nigerian Universities Commission (2013)

Purpose of the Study

The purpose of this study was to examine the availability and use of ICTs in Collection Management in Federal University Libraries in South-South zone of Nigeria. The specific objectives were:

- to ascertain the availability of ICT facilities in Federal University Libraries in South-South zone of Nigeria;
- to identify the collection management procedures where ICT is applied to in Federal University Libraries in South-South Zone of Nigeria;
- to determine the ICT facilities that are used in Collection Management procedures in the Federal University Libraries in South-South Zone of Nigeria;
- to assess the constraints of ICT application to Collection Management procedures in Federal University Libraries in South-South zone of Nigeria.

Research Questions

This study sought answers to the following research questions:

- What are the ICT facilities available in Federal University Libraries in the South-South Zone of Nigeria?
- What collection management procedure is ICT applied to in Federal University Libraries in South-South Zone of Nigeria?

- What ICT facilities are used in carrying out collection management procedures in Federal University Libraries in the South-South Zone of Nigeria?
- What are the constraints to the application of ICTs in collection management in Federal University Libraries in South-South zone of Nigeria?

Significance of the Study

This study sets up a practical foundation for enhanced library and information effectiveness and efficiency in Nigerian University libraries in the south-south zone by employing ICTs in its entire collection management procedure . It emphasises that management of university libraries should take up and implement library friendly policies which would eventually harness the benefits of ICT for effective collection management processes which would in turn lead to improved service delivery.

Literature Review

In the present era with the development of information and communication technology, libraries need to use various types of technologies to aid them in performing their various functions such as collection management. It has become a phenomenon that is so pervasive that nearly all academic libraries in Nigeria have begun applying IT. Over the years, advances in the area of IT have offered Library and Information Centres more efficient ways of acquiring, organizing, storing and disseminating information. Nkanu and Okon (2010) state that ICTs have offered Nigerian Libraries more efficient ways of acquiring, organizing, storing and disseminating or transmitting information.

It can be inferred from the above that IT in libraries comprises all the electronic infrastructure and facilities employed by libraries to improve and provide efficient services. Such facilities, in broad term, consist of hardware, software and communication links between the service outlets of different libraries to facilitate the sharing of common resources; especially the library networks.(Issa, Ayodele, Abubakar and Aminu, 2011). On the other hand, Information and Communication technology (ICT) is defined as a diverse set of technological tools and resources used to communicate and to create, disseminate, store and manage information (Blurton,(1999) cited by Ivwighreghweta,(2013).

Ayodele (2002) cited in Afolabi and Abidoye (n.d) defined ICT as an electronic based technology generally used to retrieve, store, process and package information as well as provide access to knowledge. Nwachukwu (2004) as cited by Afolabi and Abidoye (n.d) explained that information and communication technology (ICT) is the application of computers and other technologies to the acquisition, organisation, storage, retrieval and dissemination of information while Afolabi and Abidoye (n.d) point out that information and communication technology is the use of electronic devices such as computers, telephones, internet, satellite system to store, retrieve and disseminate information in the form of data, text image and others. From all the definitions of ICT

given above, it is clear that Information and Communication technology plays an important role in the complex process of information handling.

From all the concepts of ICT and IT discussed so far, it is obvious that the terms are equivalent as they refer to the same concepts. IT implies communication, therefore, the two terms will be used interchangeably in this paper. According to Adegbile, (2014) collection management subsumes collection development and also includes the allocation of book fund and the balance between books, journals, and conservation; the disposition of stock between open and closed access, between different media and between branches of the library and stores and finally the monitoring and encouragement of collection. Singh (2004) as cited by Adegbile (2014) observed that collection management is much more than collection building. It is managing the use, storage and organisation of the collection and making it accessible to users.

Explaining further on the concept of collection management Adegbile (2014) asserts that there are two primary objectives of collection management. These are: to procure library materials which support the academic needs of the University from vendors capable of supplying in the shortest time possible materials which are of high quality and are competitively priced; and to apply high standards of selection for all non-serial material donated to the libraries and goes further to list the activities involved in collection management processes such as: selection; acquisition; cataloguing, press marking & labeling; stamping; placing among others.

The organization of information/knowledge is an essential preliminary to its effective exploitation and dissemination. As the quantity of knowledge expands, the need to organize it becomes more pressing. A vast number of different means of organizing information have been devised and exploited since the earliest times. With the vast output of new information and ever-increasing degree of specialization in all areas of human knowledge, heavy demands are being placed on library information storage and retrieval systems, which can be scarcely met by the traditional methods except with the use of IT devices. The improvements and changes in computing and telecommunications and the integration of the two fields have had a huge role to play in the methods of information processing and dissemination in academic libraries; thus improving the quality of use to which such libraries are put.(Issa, Ayodele, Abubakar and Aminu, 2011).

It is obvious that ICTs if introduced and properly utilised in collection management activities would completely revolutionise the university libraries functions and enhance the variety of services offered to its clients. Rana (2009) cited in Krubu and Osawuru (2011) posited that ICT holds the key to the success of modernising information services. Libraries are transformed from book centred to information centred institutions and emphasis is shifting from book collection and storage to access and provision of electronic information services. (Atinmo,2000 cited in Nkanu and Okon, 2010). Krubu and Osawuru (2010) in addition opined that the applications of information and communication technology are numerous but mainly it is used in converting the existing paper print records in the entire process of storage, retrieval and dissemination. Nwalo (2000) cited in Krubu and Osawuru (2011) asserted that many libraries in developing

countries are gradually converting from manual to computerised routines. The benefits of ICT in a library system are self evident and overwhelming. Okolo (2002) cited in Emojorho (2009) observed that the library needs ICT in order to give efficient services to its users. Not only is the speed of its operation high, the volume of its output is correspondingly large. When ICT is used in the library, there is economy of labour and operating cost. The accelerated adoption and use of ICT means that bibliographic databases, full-text documents, and digital library collections are always available to users Emojorho, (2009) citing Chisenga (2004). Emojorho (2009) citing Olorunsola (1997) asserted that, "the use of information technologies ... has had a far–reaching effect ... [in] ... that provision of information can be made more effective and efficient with the use of electronic information resources." Emojorho (2009) citing Scott (1995) states that knowing how to find information and having good research skills, especially online searching skills, are particularly critical for university and special libraries that cultivate autonomous learners.

Emojorho,(2009) citing Odofuwa (2006) asserts that advances in ICT have progressively reduced the cost of managing information. It is enabling individuals and organizations to undertake information related tasks much more efficiently. Such advances have equally introduced innovations in products, processes and organization structures. Some of the benefits of applying ICT to Library processes have been listed as:

- ICT provides libraries with capabilities for the location of information, storage and retrieval of information, and dissemination of information.
- Internet access enables libraries to locate information stored in other computers around the world. With online search facilities, information stored at different locations can be easily retrieved. Through the use of web pages, e-mail, and CD-ROM, libraries disseminate information.
- Computers are also used to automate manual library functions. Acquisitions, cataloguing, circulation, and serials control are now automated, with much library software available in the market. Online public access catalogues (OPAC) have replaced the card catalogue. (Etebu, 2010).

The introduction and adoption of ICT heralds the dawn of a new era as the world is now transformed into a global village where information is produced, processed and consumed in nano seconds. ICT when applied to our traditional methods of performing library services reduces incidences of bias and human error, among others. Currently, ICT facilities have been provided in most Nigerian University Libraries (Womboh and Abba, 2008), however the desired impact on library operations like collection management for example can merely be experienced when they are not effectively utilised. Onoriode and Ivwighreghweta (2011) listed modern technology for library to include computers i.e. desktop, laptop, i-phone, i-pad etc, peripheral like keyboard, speakers, bar code readers, printers etc. network equipment and cables like Cat-5, coaxial, fiber optics and their various connectors, routers, switches, satellite and their modem. They also stressed that software like operating system (OS), application and

utilities software are part of modern technologies used in academic libraries. Online networks, for example, could be used in expedited book selection, book ordering, and book processing, using data from large databases like the OCLC and the Library of Congress. (Emojorhor and Nwalo, 2009). The advent and use of ICT has made it possible for remote libraries to access the huge databases of big libraries in developed countries for the adopting or adapting their bibliographic data for their own library use; and indeed the online catalogues have transformed the landscape of cataloguing and classification. (Adeleke and Olorunsola, 2009)

Suffice to note that Adediji (2001), Egberongbe (2003), Adeleke and Olorunsola (2009) citing Adeyemi (2001) stressed that large amounts of cataloguing data available in the databases of the Online Computer Library Center(OCLC) World-Cat and the Library of Congress (LC) Online Catalog, have saved libraries from the repetitive nature of catalogue information in all libraries. To expatiate further on this issue, the Online Computer Library Center which is well known as (OCLC) has a huge database that contains almost all works that have been published and the main capability of the OCLC which is of immense benefit to libraries around the world is the "WorldCat"(World Catalogue).This is a union catalogue that is produced and maintained by OCLC and its member libraries. Among other benefits, the "WorldCat" is accessed via the Internet by cataloguers for bibliographical data in cataloguing and classification. Cataloguing and Classification are essential parts of collection management procedures.

The emergence of internet as the largest repository of information and knowledge, changed role of library and information science professionals from intermediary to facilitator, new tools for dissemination of information and shift from physical to virtual services environment and extinction of some conventional information services and emergence of new and innovational web based.(Krubu and Osawuru, 2010). However, if ICT facilities are made available in the libraries and are not properly used, then the benefits derivable in providing library services like collection management will be negligible, and such libraries will still grapple with performing collection management services in the traditional way.

With the installation of the ICT in the library, there will be simultaneous access for many people at the same time, and library users will have self-service to replace the unreliable service they may have received from library staff. Furthermore, Nkanu and Okon.(2010) declare that ICT has now made Nigerian Libraries to become more effective and efficient in the performance of various tasks in relation to acquisition, cataloguing and classification, indexing, serials control, processing circulation and so on. The above declaration goes to show that ICT is fundamental to all library services especially collection management procedures.

In conclusion therefore, any university library without a functional ICT connectivity will eventually become extinct and obsolete.(Womboh and Abba,2008). Faced with this new scenario, individuals and organizations in modern society must learn new things and discard old habits and perspectives. They must retool and re strategise. If they fail to do these things, they may lose ground, decline in relevance, and face the

possibility of extinction. (Emojorho and Nwalo.2009) This is particularly true of library and information personnel whose role in an academic institution is to provide support to the teachers who must impart the skills needed to keep pace with the rest of the world and prepare for the future (Emojorho and Nwalo.(2009) citing Anao (2003). Furthermore university libraries can be transformed into a new information services unit, providing electronic cataloguing, OPAC, electronics acquisition/serials control, electronic inter-library loan and calculation functions (Ogunsola, 2004). The afore listed are part of the collection management processes which goes to show that availability and use of ICT in the aforementioned procedures will make the work faster and reduce cost.

Methodology

The study was descriptive, based on an ex-post-facto design. The population consisted of all professional and para-professional staff of the above listed University libraries. The entire population of 380 targeted professional and para- professional librarians in the six federal universities served as the study sample. A questionnaire was used to collect data. Data are presented in figures and tables and analysed using statistical percentages. Census sampling technique was used in the study. The rationale for using the above named sampling technique was because the population was a small number and the subjects were easily accessible. In this research the raw figures were converted to percentages and tabulated. The responses were analyzed according to their relevance to the research questions.

Table 1: Distribution of respondents based on their cadre in the six federal University Libraries

S/N	University	Staff		Total
		Professional staff	Para-professional staff	
1	UNIUYO	27	83	110
2	FEDERAL UNIVERSITY, OTUOKE	6	6	12
3	UNICAL	13	57	70
4	UNIVERSITY OF PETROLEUM RESOURCES	9	22	31
5	UNIBEN	27	60	87
6	UNIPORT	20	50	70
	Grand Total	102	278	380

Table 1 shows that 102 (27%) of the respondents are professional librarians while 278(73%) of the respondents are the para-professional librarians.

Table 2: ICT Facilities Available In The Six Libraries

S/N	UNIVERSITY	COMPS	INTERNET ACCESS	SCANNERS	CD-ROM DATABASES	DATABASES	EMAIL	PRINTER	OPAC	GEN
1	UNIUYO	Y	Y	Y	Y	Y	Y	Y	N	Y
2	FEDERAL UNIVERSITY OTUOKE	Y	Y	N	Y	Y	Y	Y	N	Y
3	UNICAL	Y	Y	Y	Y	Y	Y	Y	N	N
4	UNIVERSITY OF PET.RESOURCES	Y	Y	Y	Y	Y	Y	Y	N	Y
5	UNIBEN	Y	Y	Y	Y	Y	Y	Y	Y	Y
6	UNIPORT	Y	Y	Y	Y	Y	Y	Y	Y	Y

Y-YES, N-NO

The findings from Table 2 revealed that ICT facilities such as computers, internet access, scanners, CDROM databases, online databases, email, printer and backup generator are available in almost all the libraries studied with the exception of Federal University, Otuoke which does not have scanners and the table also shows that Online public Access Catalogue (OPAC) is available in Uniport and Uniben. It is clear from the table that Unical Library does not have a backup generator.

Table 3- Table showing Collection Management activities performed with ICT facilities in the six libraries.

S/N	UNIVERSITY	COLLECTION MANAGEMENT ACTIVITIES						
		SELECTION	ACQ	CAT AND CLASS	DISSEM-INATION	PRESER-VATION	WEEDING	SEARCH/RETRIEVAL
1	UNIUYO	Y	Y	N	Y	Y	N	Y
2	FEDERAL UNIVERSITY OTUOKE.	Y	Y	N	Y	Y	N	Y
3	UNICAL	Y	Y	N	Y	Y	N	Y
4	UNIVERSITY OF PET.RESOURCES	Y	Y	N	Y	Y	N	Y
5	UNIBEN	Y	Y	Y	Y	Y	N	Y
6	UNIPORT	Y	Y	Y	Y	Y	N	Y

Y- ICT USED, N-ICT NOT USED

Table 3 illustrated that all the federal universities studied use ICT mostly for selection and acquisition purposes, dissemination, preservation and search/retrieval purposes while 2 (33.3%) of the libraries studied use ICT for Cataloguing and Classification of information resources in contrast, none of the libraries use ICT for weeding purposes.

Table 4:ICT Facilities used for Collection Management procedures

S/N	Univ.	Comp.	Internet	Scanner	CD-Rom db	Online databases	Email	Printer	OPAC	Gen.
1	UNIUYO	Y	Y	Y	Y	Y	Y	Y	N	Y
2	FEDERAL UNIVERSITY OTUOKE	Y	Y	N	Y	Y	Y	Y	N	Y
3	UNICAL	Y	Y	Y	Y	Y	Y	Y	N	Y
4	UNIVERSITY OF PET.RESOURCES	Y	Y	Y	Y	Y	Y	Y	N	Y
5	UNIBEN	Y	Y	Y	Y	Y	Y	Y	Y	Y
6	UNIPORT	Y	Y	Y	Y	Y	Y	Y	Y	Y

Table 4 discloses that all university libraries use computers, internet access, scanners, CD-ROM databases, Online databases, email, Printer and generator for collection management procedures aside from Federal University, Otuoke, that does not have a scanner and it is evident from Table 4 that out of all the Federal University libraries studied, only Donald Ekong Library, Uniport and John Harris library, University of Benin uses OPAC in its collection management procedures. Finally, it is also evident from the responses above that UNICAL Library does not have a backup generator which can provide backup electrical power supply in case of power outage.

Table 5: Constraints to the application of ICT to Collection Management procedures

S/N	University	Poor funding	Epileptic power supply	Lack of trained/ skilled staff	Insufficient ICT facilities	Lack of technical know how
1	UNIUYO	Y	Y	Y	Y	Y
2	FEDERAL UNIVERSITY OTUOKE	Y	Y	Y	Y	Y
3	UNICAL	Y	Y	Y	Y	Y
4	UNIVERSITY OF PET.RESOURCES	Y	Y	Y	Y	Y
5	UNIBEN	Y	Y	Y	Y	Y
6	UNIPORT	Y	Y	Y	Y	Y

Result from Table 5. indicated that all of the six libraries under study face comparable constraints listed in the questionnaire. In other words, they are hampered by the same set of factors in their application of ICT to collection management procedures.

Discussion of Findings

The findings of this study revealed that all federal University libraries in the South-South Zone of Nigeria have indeed fully realized the great potential inherent in ICT as all the six universities studied have most of the ICT facilities on ground. This assertion is supported by Womboh and Abba (2008) who opined that ICT facilities have been provided in most Nigerian University Libraries and by Nkanu and Okon (2010) who added that ICTS have made Nigerian Libraries to become more effective and efficient in the performance of various tasks in relation to acquisition, cataloguing and classification, indexing, serials control, processing, circulation and so on.

As indicated by the tables, ICT in majority of the university Libraries studied is used mostly for selection, acquisition, dissemination, search and retrieval functions while none so far uses it for Weeding Functions and only two out of the six libraries studied use it for Cataloguing and Classification purposes.

The overall picture shown here is that ICT application to collection management procedures is at an advanced stage with the potential of delivering enhanced services to users. However, it is to be noted that there is still room for improvement especially in the areas of applying ICT to Cataloguing, Classification and Weeding activities. Findings also disclosed that with exception of University of Port Harcourt and University of Benin, no other Federal University in the South South operates a functional OPAC service. This presents a dismal picture and much needs to be done in this aspect to fully automate the other federal University Libraries in the South South Zone of Nigeria. This study shows that all the libraries studied experience similar constraints in the application of ICT to collection Management procedures and if this situation is left unchecked, it would seriously hamper effective service delivery to the library patrons and would in the long run render University Libraries redundant as foreseen by Womboh and Abba,(2008) that any University Library without a functional ICT connectivity will eventually become extinct and obsolete.

Conclusion

This study looked at the Availability and Use of ICT in Collection Management in University Libraries in South- South zone of Nigeria with a focus on Federal Universities in the zone. Every vocation is making positive advancements due to its exploitation of technological innovations and the university libraries must be part of the change if they must still remain relevant in the scheme of things. The findings show a high level of availability and minimal use of ICTs for collection management. The data also revealed that mere availability of ICT facilities does not guarantee their use for collection management in the libraries, but availability coupled with sufficient power supply and eager personnel who are willing to accept the ICT method of collection management.

Recommendations

The following recommendations are made:

- The Federal Government should step up efforts to improve electric power supply
- The University Management should ensure that their libraries are stocked with functional ICT facilities;
- The Library Management should make certain that software used to provide library services such as collection management are regularly updated to the latest versions;
- The Library management should emphasize on the utilization of ICT facilities for collection management;
- Professional Librarians manning the collection development units should be sponsored to workshops and conferences so as to hone their skills.

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