

Acquisition of Digital Library Skills by Library Staff in Benue State, Nigeria

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Abstract

This study sought to find out the extent of digital library skills possessed and the methods used in training the staff of academic libraries in Benue state to acquire the skills. Descriptive survey design was used for this study and 8 tertiary institutions in the state (three universities, two colleges of education, two polytechnics, and one monotechnic) were considered. Total enumeration method was used to study the whole population of 248 library staff (professionals and paraprofessionals) of the 8 institutions using structured questionnaire. Mean and charts were used for the analysis of data in answer to the research questions. It was found that, the staff acquired all the basic skills required to work in a digital library through self efforts and sponsorship by the library. It recommended however that, those competencies be improved upon. Libraries and the mother institutions were to increase their involvement in the training of staff in different fora to acquire and improve their skills.

Keywords: Digital library, academic libraries, digital library Skills, Benue State, Nigeria

1. Introduction

There has been a global trend in information resources management among libraries and information centres with emphasis drifting from paper to electronic resources. This is as a result of the advances in information technology through the ages. The flexibility of use of electronic based information materials, have placed them in preference over print forms of information resources which are characterized by higher cost, delay in delivery, bulkiness etc to their disadvantage. Many libraries have therefore transformed and are transforming their resources through digitization process from paper to electronic sources.

Libraries use digital resources for better services and for satisfying diverse users' needs (Adegboire, 2011). They enjoy the advantage of no physical boundary, round the clock availability, multiple accesses (a number of users can access the same material at the same time) as well as preservation and conservation (can be reproduced several times without wear and tear). Other advantages are: space saving, networking ability, cost saving and very friendly user search and retrieval interface (LISwiki, 2010).

Staff of libraries and information centres are therefore expected to develop their skills at least to a minimal level to be able to operate in the digital environment. Computer skills like typesetting, saving in storage devices, retrieving information saved in the computer & other (secondary) storage devices, scanning and uploading data and images, printing data, sending ordinary & attached e-mails etc are necessary basic skills needed to operate in the digital environment.

The paper discusses acquisition of digital library skills by staff of academic libraries in Benue state. It focuses particularly on skills acquired by staff of academic libraries in Benue state and the training methods used by the staff to acquire digital library skills.

2. Theoretical Framework

The work is premised on self-efficacy theory to support and strengthen the work "acquisition of digital library skills by academic library staff".

2.1 Self-Efficacy Theory

Self-efficacy theory was formed in 1977 by a Canadian Psychologist, Albert Bandura. ((Apalachian State University, (2005), Wikipedia, 2011). The focus of the theory is on how an individual demonstrates his or her ability to perform a particular job or task. It is a person's judgement of his or her capabilities based on mastery criteria and assessment of their abilities to perform specific tasks in relation to goals and standards rather than in comparison with others' capabilities (Wikipedia, 2010). It is an individual's belief in his or her ability to successfully perform a specific task (Sote and Aramida, 2010). Staff training and consequent acquisition of digital library skills is likely to increase self efficacy which in turn influences ICT acceptance. ICT self-efficacy focuses on what an individual believes he or she can accomplish with digital resources.

Understanding the theory will avail the academic library management the opportunity to know what type of training method to recommend to which category of staff at any particular time. Staff with weak self efficacy (those with little or no confidence in their ability to use ICT resources, uncomfortable with their computer skills or uncomfortable using electronic resources) may be exposed to the resources practically and at a remedial level. Those with high efficacy level may be exposed to higher or more advanced tasks and training

modules.

3. Literature Review

According to the digital library federation (1998)

Digital Libraries are organizations that provide the resources, including the specialized staff, to select, structure, offer intellectual access to, interpret, distribute, preserve the integrity of, and ensure the persistence over time of collections of digital works so that they are readily and economically available for use by defined community or set of communities.

Similarly, Lesk (1997) considered digital library as a collection of digital materials of different forms and the application of services which are made available over networks. Reitz (2005) defined digital library as a library in which a significant portion of the resources are available in machine-readable format as opposed to print or microform, accessible by means of computers. The digital content of the library, according to her may be locally held or accessed remotely through computer networks.

They are characterized by a collection of multimedia and other types of resources, availability of materials in a computer processable form, use of digital technology to acquire, store, preserve and retrieve information, global access to the entire collection through a network, and the presentation of information through an electronic means, (LISwiki, 2010).

Digital libraries have several advantages over the traditional library. According to LISwiki (2010), digital libraries have the advantage of absence of physical boundary, round the clock availability and multiple access. Others are better access, ease of retrieval, space and cost saving, ability to provide link to similar or related resources etc.

Effective functioning of digital libraries require adequate planning and implementation of programmes, sustained funding, sufficient and realistic infrastructure, adequate power supply, positive attitude of staff, appropriate technical skills etc (Amkpa and Abba, 2009). Skills required for effective operation and functioning of the digital library, according to Ugwuanyi (2009) includes the knowledge of computer operations such as turning computer on, opening a folder, copying a file from one disc to another, scanning etc. Also important, according to him are mastery of the use of application softwares such as creating a new word processor document, printing of documents, ability to use the World Wide Web (WWW), sending e-mail messages, taking part in an on-line discussion or chatting (teleconferencing), sending e-mail attachments etc. These, and other skills, if possessed by library staff, will place them in a better position to search, identify and retrieve information resources from remote sources for the users and thus serve them better.

Examining the state of ICT literacy among academic librarians in Enugu state, Ugwuanyi, (2009) in a study sought to among other things, determine the level of ICT literacy skills/competencies possessed by librarians and training methods mostly adopted by academic librarians for the acquisition of ICT literacy skills/competencies. The study found that, though most respondents possess computer literacy, ICT literacy among academic librarians was low. Formal educations, informal education, colleagues, training at workplace, attending workshops/seminars were found ideal for acquisition of ICT skills.

Ezeani, (2010) studied network literacy skills of academic librarians for effective services delivery at University of Nigeria with the intent of finding out the level of proficiency of use of Internet by librarians in UNN among others. The study found that, librarians were in tune with traditional surfing skills of sending e-mails, downloading information from the Internet, and often use the Internet on daily and weekly basis.

In a study conducted by Ugwu and Ekere (2010) on the training needs of librarians for digital library projects, it was found that, competency-based training approaches were found more important than formal training in skills acquisition for digital library projects.

4. Research Objectives

1. To ascertain the extent of digital library skills possessed by staff of academic libraries in Benue state.
2. To ascertain the methods used in training the staff of academic libraries in Benue state to acquire digital library skills.

5. Research Questions

1. What extent of digital library skills possess do staff of academic libraries in Benue state possess?
2. Through what training methods do staff of academic libraries in Benue state acquire digital library skills?

6. Methodology

Descriptive survey design was used for this study. The study was done in Benue State and covers all the 8 tertiary institutions in the state (three universities, two colleges of education, two polytechnics, and one

monotechnic). Total enumeration method was used where the whole population of 248 library staff (professional and paraprofessional) was studied using structured questionnaire. It was validated by three authorities two of which were from the field of library and information science while the other was an authority in measurement and evaluation unit of Science Education department, University of Nigeria, Nsukka. The researcher administered the questionnaire instrument himself in each institution visited, with the aid of a research assistant appointed from that school. Two weeks were used for the exercise. Descriptive statistics particularly mean and charts were used for the analysis of data in answers to the research questions. A criterion mean value of 2.5 and above served as a guide for considering a response as positive or negative. While the values of 2.5 and above were considered positive, less than 2.5 were considered as negative. Specifically, for each research question, real limit of numbers was used to determine the decision level as follows: Not Applicable: 0.00 – 1.49; Small Extent: 1.50 – 2.49; Large Extent: 2.50 – 3.49; Very Large Extent: 3.50 & above.

7. Data Presentation and Discussion

7.1 Research Question 1: What extent of digital library skills possess do staff of academic libraries in Benue state possess?

Table 1: Staff responses on extent of skills possessed by staff of academic libraries in Benue state

S/N	ICT Skills (Tasks)	VLE	LE	SE	NA	Mean (x)	Decision
i.	Typesetting using word processing package e.g. Ms word	71	78	24	22	3.02	LE
ii.	Saving information or data in “my documents or desktop” (internal hard disc)	67	77	28	23	3.00	LE
iii.	Saving/storing data on storage device (CD-ROM, flash drive etc).	53	67	36	39	2.69	LE
iv.	Scanning and uploading images	43	58	48	46	2.50	LE
v.	Retrieving information saved in the computer & other (secondary) storage devices	60	73	30	32	2.83	LE
vi.	Printing data	61	71	31	32	2.83	LE
vii.	Use of PowerPoint package for presentation	44	58	44	49	2.50	LE
viii.	Searching information on the internet	62	65	34	34	2.80	LE
ix.	Saving internet files in storage devices	51	59	44	41	2.62	LE
x.	Accessing databases on CD-ROMS, DVDs	49	55	41	50	2.52	LE
xi.	Sending ordinary & attached e-mails	61	55	36	43	2.69	LE
xii.	Downloading information from the Internet	61	65	37	32	2.80	LE

Key: (VLE- Very Large Extent, LE- Large Extent, SE- Small Extent, NA- Not Applicable)

Table 1 shows the extent of ICT skills acquired by staff of academic libraries in Benue state. The staff, according to the result possessed a large extent of the skills especially items i and ii whose mean score was 3.02 and 3.00 respectively indicating that, the staff possess the skills of typesetting using word processing and saving information or data in “my documents or desktop” better than the others skills.

The result of this study as revealed in table 4 indicates that, the staff claimed to have possessed all the skills listed. This is in line with Ugwuanyi (2009) who suggested in his study that, library staff should know various computer operations such as turning computer on, opening a folder, copying a file from one disc to another, scanning etc. He/she should also master the use of application software such as creating a new word processor document, print out a document and operate in a networked environment. However, Choi and Rasmussen (2006) in their study found that, librarians need skills and knowledge in technology such as digital library architecture and software, technical and quality standards, web markup languages, database development, management and web design skills (in Ngwuchukwu, 2010). The staff of academic libraries in Benue State possess ICT skills but largely at an average level of large extent rather than very large extent. This is likely because of inadequate support from parent institutions. If the institution is highly involved, the staff would likely have acquired a very large extent of the skills. There is therefore the likelihood that skills learnt by the staff on their own without much support from the institution may hardly be sustained especially if the facilities are not available in their offices to put what they learnt in practice. Lack of conscious efforts at the place of work to develop and sustain the skills is likely to cause the digital library skills, which are volatile to fade away.

7.2 Research Question 2. Through what training methods do staff of academic libraries in Benue state acquire digital library skills?

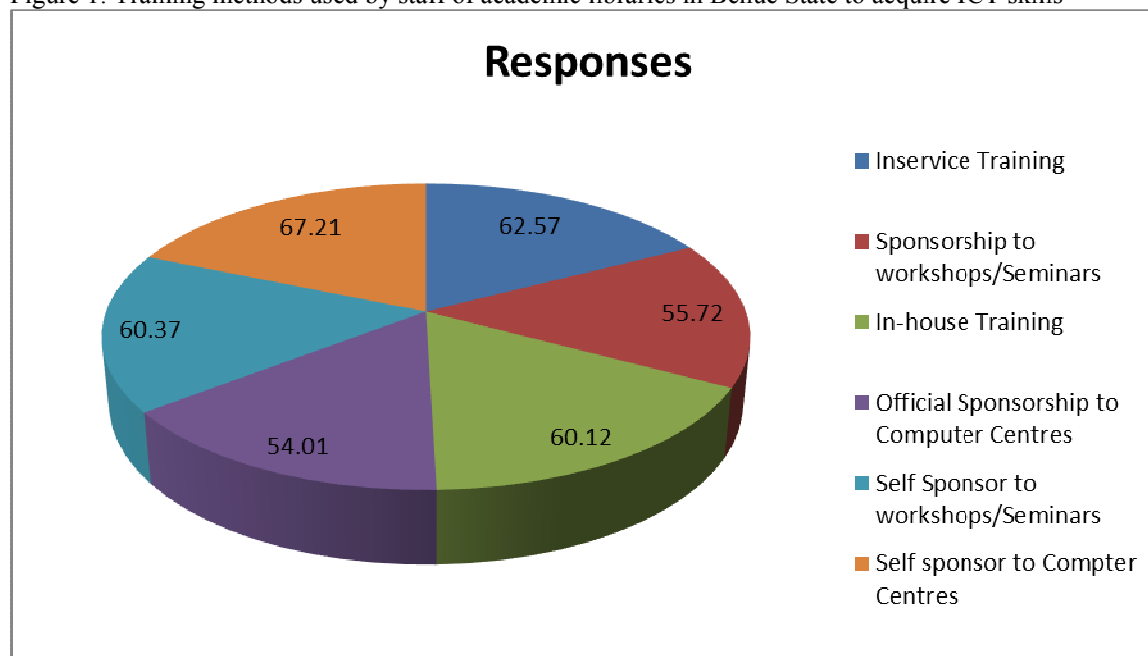
Table 2: Training methods used by staff of academic libraries in Benue State to acquire ICT skills

S/N	Training Methods	SA	A	D	SD	Mean (x)	Degree (0 ⁰)	Decision
i	In service training to acquire more education officially	38	64	63	30	2.56	62.57	A
ii	Sponsorship by the library to workshops/seminars	22	57	70	46	2.28	55.72	D
iii	In house training (inviting experts to teach ICT Skills)							
	In house training (inviting experts to teach ICT Skills)	34	56	70	35	2.46	60.12	D
iv	Official sponsorship to acquire computer/ICT skills	22	40	90	43	2.21	54.01	D
v	Self sponsor to workshops/seminars on ICTS	30	62	72	31	2.47	60.37	D
vi	Self sponsor to learn computer/ICT skills	44	84	42	25	2.75	67.21	A

Key: SA- Strongly Agree, A- Agree D- Disagree, SD-Strongly Disagree, S/N- Serial Number

Table 2 shows the training methods used by staff of academic libraries in Benue State to acquire ICT skills. Results show the mean scores of 2.56 and 2.75 in favour of in-service training to acquire more education officially and self sponsor to acquire computer/ICT skills. Items ii - iv indicate the mean values of 2.28, 2.46, 2.21 and 2.47 respectively showing average disagreement with these options.

Figure 1: Training methods used by staff of academic libraries in Benue State to acquire ICT skills



The chart is a reflection of the data presented in table 2 above where self sponsor to learn computer/ICT skills (67.21⁰) and in-service training to acquire more education officially (62.57⁰) are the highest.

The result of the study as presented by table 2 shows that, staff of academic libraries in Benue state acquire their ICT skills mostly through self sponsor to learn the skills either in computer/ICT centres or in workshops and seminars on ICTs.

This is in line with Wombo and Abba (2009) who collaborated that, staff should not wait for official sponsors before embarking on ICT training but that, they should make personal efforts so that they will not be left out of the ICT train and so that the train will not leave them behind and keep them out of jobs (in Amkpa and Abba (2009). This suggestion also agrees with the proposition of Aguolu and Aguolu (2002), Amkpa and Abba (2009) and Ugwu and Ekere (2010) that, given the fact that the cost of training is enormous and only few employers could afford to send staff on training on a regular basis, library staff should consider the possibility of improving their careers through seminars, conferences, workshops, refresher courses and through a conscious study of new developments in the field. Akintunde (2006) is of the opinion that, library staff should borrow a leaf from staff of most library schools that had to develop themselves by paying for training and purchasing their personal computers and sometimes software.

Aguolu and Aguolu (2002) however recommend on-the-job training for new recruits from library schools. Also, opposing the views on self training above, Abdullahi and Haruna (2008) found out that, ICT training and development programme like orientation/induction courses should be sponsored by university libraries. The introduction of ICTs in libraries has brought with it some form of fear in many librarians that, it will throw them out of jobs. This is likely to be the reason many staff get involved in self training to acquire ICT

skills.

8. Conclusion

The modern day library is a deviation from the old traditional practice mainly because of the introduction of electronic resources which have reshaped the entire information management system making it rather easier to process, store and disseminate. In order to prosecute effective service delivery in the electronic age, librarians who are information managers need to have at least minimal skills in working with the technology through which information processing and retrieval are carried out in the electronic age.

This study shows that, the staff of libraries in tertiary institutions in Benue state-Nigeria have acquired to a large extent some of the basic competencies that are required to function in a digital library environment. While some of them acquire the skills through their personal efforts by financing their training, others had their training sponsored by the institutions. The librarians themselves, mother institutions as well as government who is the owner and responsible for the funding of these institutions are expected to get involved in improving the digital skills of library staff so as to offer better information services

9. Recommendations

The study recommends:

- The need for the staff to improve competencies better in the areas of information search, saving and retrieval of data, scanning and uploading, as well as e-mailing since these skills are favorable to information retrieval and dissemination and central in one's ability to assist users to obtain information in all libraries that use electronic resources.
- The involvement of libraries and mother institutions in assisting the staff to acquire and improve competencies in skills that will make them function more effectively in the digital library environment.
- Libraries should improve in their human development policies by increasing sponsorship of their staff to workshops and to computer training institutes as well as organizing in house training for the staff.

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