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## ICT KNOWLEDGE AND SKILLS REQUIRED FOR RECRUITMENT OF ACADEMIC LIBRARIANS IN THE DIGITAL AGE

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#### **Abstract**

The paper examined the ICT knowledge and skills required for recruitment of the librarians in academic and research libraries. Survey approach was adopted drew sample of 24 respondents from four academic and four research libraries in Ilorin, Kwara State, Nigeria. The sample comprised of head of libraries, the deputy and one senior person. Data was gathered through interview. The results demonstrated that the basic ICT required for recruitment of librarian into the academic and research libraries at the digital age are the specific ICT skills useful and relevant to each unit of the library and the general skills such as word processing, spreadsheets/excel, knowledge of databases, files folders, power point presentations, email/internet, hardware/software, web design and management, mobile technology and social media skills. Similarly, it was unveiled that word process skills is the most ICT skill academic and research libraries usually target because the skill is relevant in every units and departments in the library. Major reasons crucial to the conduct of interview before recruitment into academic and research libraries is to determine the fit in terms of whether or not the recruited librarians will be able to cope with the integration of technologies into library practices and be able to use the technologies to render services to the satisfaction of the digital age library users. The prominent problems resulted from the poorly conducted recruitment exercise into the libraries at the digital age are poor library services that result to lack of satisfaction by the users and low productivity, lack of understanding of the refined routine activities in the library, low patronage by the library patrons,

waste of resources and redundancy, poor conduct between staff and superior officers and eventually under-utilisation of ICTs procured by the libraries to render effective and efficient services to the users. It was recommended that recruitment into academic and research libraries should not be compromised and any candidate that does not possess the required ICT skills or not performing to expectation during recruitment should not be considered.

Keywords: Academic Library, Research Library, ICT Skills, ICT Knowledge, Digital Age, Digital Era, Technology

#### Introduction

It is a common saying that Information Communication Technology (ICT) has revolutionized almost every human activity including the activities in the libraries be it academic or research. This is what Thamaraiselvi<sup>11</sup> observed that made him to emphatically state that 'as the information technologies are changing day-today and growing at a tremendous speed, the knowledge society is becoming more complex, competitive and dependent on technological changes and information explosion. The need for e-information services to the users are also growing and becoming very essential. No doubt, whether we like it or not, technology will continue to change, and libraries and librarians have to use the changing technology to provide the best access and service to their patrons. The information revolution and the pervasive thinking that everything is available on the Web have created new challenges to the traditional library professional ethics. Acquiring and providing access to electronic knowledge resources require library professional to change their role from traditional librarian to information scientist by learning and applying new skills to understand the evolving technologies to manage and provide quality online information service to the patrons of the knowledge society. With this in mind, it presupposes that libraries orientation as far as the issue of recruitment and hiring of new librarians in academic and research libraries will have to change. The whole essence of this is for both libraries to engage in the recruitment of librarians that will be functional in this new information environment.

As put forward by Gremmels<sup>7</sup>, "librarians have both witnessed and embraced a good bit of change in the last 30 years, and it is true that the shift from print to digital collections, the economic downturn that began officially in December, 2007, and rapidly changing user behavior have accelerated the process. With pinched funding and transformations in core library functions, libraries are also making changes in staffing and organization". As maintained by Defa<sup>2</sup> recruitment of new employees is a critical element in any academic library's development into a top performing organization. As pointed out by Defa<sup>2</sup>, good recruitments do not just happen, because finding and selecting the right person takes hard work, planning and preparation to ensure a successful search, hire, and retention. It is critical for academic and research libraries to review and assess their processes and procedures, and thoroughly understand the world that they are in when it comes to recruitment and employment. The opportunity to bring someone into a high-performing organization or to look for a specific skill set to improve organizational effectiveness should be embraced and actively pursued<sup>2</sup>. People within organizations are the most critical resource in any professional activity because the quality of the work depends on the qualities of

those employed. There is no doubt the fact that wrong recruitment decision can adversely impact an organization for years. However, done well, recruitment greatly enhances an organization's ability to select, hire and retain the most qualified candidate for any position.

It is unfortunate that most academic and research libraries currently do not follow the procedure and guidelines for recruitment of librarians into the libraries. The people that have the necessary and relevant skills to function effectively in meeting the information needs of the digital age users are not given opportunity to serve. This is because most of them do not know people in the high authority who can recommend them and more so, do not have money to spend as bribe for them to be given the job. The recourse is that, it is the dullard that are having their way into the library. The consequence is that most libraries are now under-performing as a result of wrong recruitment and hiring of personnel.

No doubt, the information/library users in this age are very smart and lack patience. They are digital savvy and they want to get the information they need as at when they need them without delay. But the big question is, are the librarians on ground in both academic and research libraries equal to the task? Has the recruitment process not been compromised? There is no doubt that this issue of recruitment is causing so much trouble for most libraries as due process is no longer followed. The whole process has been politicized. However, a functional library will need to recruit functioning librarians who have good working knowledge of different ICTs and can make use of them to render services that will satisfy users' needs. It is on this note that the researcher consider the fact that there is need for a study such as this, to unravel the necessary ICTs skills needed to be possessed by the librarians in the digital age. In the light of this, the current study examined ICT knowledge and skills required for recruitment of the librarians in academic and research libraries.

#### **Objectives of the Study**

The broad objective of this study is to examine the ICT knowledge and skills required for recruitment of the librarians in academic and research libraries. The specific objectives of the study are to:

- 1. Identify the basic ICT skills require by a Librarian seeking employment in academic and research libraries.
- 2. Find out whether or not academic and research libraries usually go beyond the target ICT knowledge and skills in recruitment of new librarians.
- 3. Determine why it is crucial to interview new librarian before given them job in academic and research libraries.
- 4. Identify the problems created by poorly conducted recruitment exercise of librarian without ICT knowledge into the academic and research libraries.

#### **Research Questions**

To achieve bot the broad and the specific objectives in this study, the following research questions were developed and answered in the study.

- 1. What are the basic ICT skills require by a Librarian seeking employment in academic and research libraries?
- 2. Do academic and research libraries usually go beyond the target ICT knowledge and skills in recruitment of new librarians?
- 3. What is the crucially of conducting interview for the new librarian before given them job in academic and research libraries?
- 4. What are the problems created by poorly conducted recruitment exercise of librarian without ICT knowledge into the academic and research libraries?

#### **Literature Review**

ICT skill standards define the professional job-related knowledge, skills, and abilities required to succeed in the digital-age workplace. They can be used as a foundation tool for developing LIS curriculum, profiling jobs, recruiting and evaluating librarians, and designing academic and professional certification.

They can be used alone or in conjunction with other input, such as that from a subject matter expert, industry advisory committee, professional organization, existing academic or vendor-specific curriculum, or accrediting organization<sup>4</sup>. ICT skill standards create a common-language framework for librarians, educators, industry, and other stakeholders to develop the educational and training tools necessary to prepare LIS students in training and incumbent librarians for today's workplace challenges as well as those that lie ahead. ICT skills can be used for a number of purposes:

Most competitive industrialized nations have evolved a well-established professional skill standards system. Applying skill standards to development of curriculum results in courses and programs whose outcomes can be assessed across a range of contextual technical and foundation performance criteria<sup>8</sup>. This results in employees who are prepared to function effectively in the technology- and information-based workplace. There are numerous benefits to IT skill standards. Companies communicate their performance expectations to their employees, educational institutions reform their curriculum to match workplace needs, and the skills gap between workplace expectation and student preparation can be closed<sup>4</sup>.

Academic librarians are responsible for acquiring, organising, managing and distributing library resources, and ensuring that library provision meets the needs of all its users. As academic librarians are responsible for providing support to academic departments, job vacancies may demand a degree that is relevant to a particular subject area. It is observed that academic and research libraries seek librarians with excellent organisational and interpersonal skills. Other key

skills include: strong ICT skills and familiarity with the use of databases and the internet, teamworking and management skills, assessment of resources and library users' needs, presentation and verbal communication skills; subject-specific knowledge or expertise in a particular function, for example ICT resources or resource ordering.

As far back as 2006, Farkas<sup>5</sup> has been of the opinion that librarian jobs require technological skills. The researcher identified the skills to include HTML skills, knowledge of scripting languages, the ability to deal with the back-end of the OPAC, the ability to translate library services into the online medium, the ability to troubleshoot basic computer and printer problems, or just a good healthy knowledge of emerging technologies, it has become increasingly important that librarians keep up with technology and have certain basic skills. It is assumed that many will agree with this supposition<sup>5</sup>. However, it is not clear if librarians actually possess these ICT skills required for recruitment in this particular dispensation.

Some related studies are worthy of reference at this point. These for instance include Chidi and Nwachukwu¹ examined the extent of digital library skills possessed by the librarians and the methods used in training the staff of academic libraries in Benue state to acquire the skills. Descriptive survey design was used for the study eight participating tertiary institutions (three universities, two colleges of education, two polytechnics, and one monotechnic). Total enumeration method was used to study the whole population of 248 library staff (professionals and paraprofessionals) using structured questionnaire as instrument for data collection. Mean and charts were used for the analysis to provide answer to the research questions. The results demonstrated that, the staff acquired all the basic skills required to work in a digital library through self-efforts and sponsorship by the library. Based on the findings, the study recommended that, the identified competencies should be improved upon and libraries and the mother institutions should increase their involvement in the training of staff in different fora to acquire and improve their skills.

Emiri<sup>3</sup> discussed the contemporary digital literacy skills (DLS) among librarians in university libraries the 21st century in Edo and Delta States of Southern Nigeria. The study was guided by six objectives and research questions and one hypothesis. The design of the study is descriptive survey and the population consists of all librarians from university libraries in the aforementioned states in Nigeria. The instrument used to generate data is the questionnaire and the date generated was analyzed using simple percentages and frequency count for research questions and SPSS version 14.0. The findings show that electronic mailing, social networking, use of PDAs, mobile phones and internet surfing are the major DLS amongst librarians. It was also discovered that librarians acquired DLS through colleague's assistance, trial and error, IT programmes and formal education while librarian's level of use of DLS is low amongst other findings. Researcher recommends that management of university libraries should provide training for librarians so as to help update their knowledge in application of digital skills and digital skill competence should be giving more attention during recruitment of librarians amongst others.

Raju<sup>9</sup> reported a preliminary study which was part of a wider study aimed at developing a comprehensive skills statement which would provide an objective framework against which professional LIS practitioners in the modern academic library environment in South Africa may both measure their existing competencies and also identify the need for further skills acquisition.

The research question guiding this preliminary investigation was: What key knowledge and skills are required for LIS professionals to effectively and efficiently practice in a digital era academic library in South Africa? The triangulated findings (using content analysis of job advertisements and semi-structured interviews) from the preliminary investigation were used to ascertain an initial picture of key knowledge and skills sets required for LIS professionals in this environment. The preliminary findings were proved useful in teasing out some of the parameters for the wider study targeting the development of a comprehensive skills statement for higher education libraries in South Africa. The study report has relevance for the academic library context in other parts of the world as well including Nigeria.

Shingwe & Ocholla<sup>10</sup> conducted a study that investigate whether the need for IT skills has had influence on job titles and job requirements in South Africa libraries. A newspaper scan for LIS related job adverts over a period of three years 2009-2011 was conducted on a weekly newspaper, The Sunday Times which has an extensive section of career/job advertisements. Four hundred and thirty-six library job adverts were analysed and of these 50 had core IT titles or requirements. The results revealed that IT has a significant influence on the LIS job market in South Africa. These jobs range in requirements from basic computer literacy to advance (networking, database administration, web development) IT skills. The study recommended that South Africa LIS schools and the work sector should intensify formal and informal IT education and training in order to meet the demands of the current job market.

From the synopsis of the empirical studies above, it is evidence that ICT has altered the traditional academic library beyond recognition. The dramatic changes have impacted significantly on the knowledge and skills requirements for LIS professionals practicing in this environment. While there have been studies in other parts of the world particular in South Africa which have investigated the knowledge and skills requirements for the digital era academic library environment, hitherto in Nigeria to date limited comprehensive study has actually examined this area in the Nigerian context.

#### Methodology

This section discusses the method adopted to carry out the study including the design, population and sample, the instrument for data collection, procedure of administration, data analysis, and presentation of results.

#### Design

The study adopts a pure qualitative method using a purposive approach. This approach was chosen to allow the researcher to gather in-depth information from the sample. Moreover, the approach was chosen because it is the most prominent approach used in previous related studies, because it is inexpensive especially when it is self-administered, and because it is useful when describing the opinion and perspective of the population.

#### **Population and Sample**

The population for this study comprised of head of library/director, their deputy and one senior/principal librarian who are always involved in recruiting new personnel in their respective

library. These three respondents were chosen purposively from each of the four academic and four research libraries in Kwara State, Nigeria. The detail is in table 1.

**Table 1: Sample Selection** 

S/N	Name of Library	No of Respondents
1.	Academic Library 1	3
2.	Academic Library 2	3
3.	Academic Library 3	3
4.	Academic Library 4	3
5.	Research Library 1	3
6.	Research Library 2	3
7.	Research Library 3	3
8.	Research Library 4	3
	Total	24

#### **Data Collection Instrument**

Data on this study was collected through interview, the development of which was informed by the objectives of the study.

#### **Procedure for Data Collection**

The entire 24 respondents who participated in the study were interviewed in their respective library. Those who were not on ground when the interview was conducted with those that did not have time to grant the interview were given a print copy of the interview guide which contained all the interview items. Each respondent was interview for 30 minutes. The interview exercise took a week. The respondents were assured of confidentiality of the information they supplied and were given voluntary opportunity to participate in the study. The entre 24 respondents indicated their interest in taking part in the study.

#### **Data Analysis**

The qualitative data collected through interview was analysis thematically. The detail is contained in the following section.

#### **Results**

### Basic ICT skills require by a Librarian seeking employment in academic and research libraries

To achieve the objective, respondents were asked to comment on the various ICT skills required for recruitment of new librarian to academic and research libraries. The results reveal that many ICT skills are required and these wholly dependent on the unit in which new librarian is being recruited. For catalogers, respondents were of the opinion that they now need to provide enhanced access to the new resources. This is because they now process not only books, but also CD-ROMs, computer discs, and multi-format items. Catalogers must make informed decisions on matters

such as linking to electronic journals and managing holdings hooks to various databases. Catalogers today create records that accommodate multiple means of accessing a particular resource. Patrons are coming to expect records that include print holdings, microforms, and direct links to an electronic version of the item. Records must successfully interact with not only the library OPAC, but also with a growing variety of indexes, full-text services and browsers. In other words, the catalogers as found out in this study need to have understanding and possess the skills to function in these identified areas. Dublin Core metatag system is a skill that did not exist just a few years ago but is now rapidly growing in importance as an additional role for librarians, therefore, a cataloger must be skillful in it.

Aside of that, a respondent has this to say "technology has impacted nearly every facet of library work meaning that selectors must now deal with providing user access to digitized resources without "owning" the resources". In the light of this, the general ICTs skills required for the recruitment of librarians into any unit of the library must possess skills such as online information gathering and information retrieval, skills to operate library software both commercial and open source, skill to operate CD-ROMs, OPAC, skills to set up projector for the use of power point presentation when there is conference holding in the library. Other general ICTs skills identified by the respondents are classified as:

**Table 2: General Skills Required for Recruitment by Librarian** 

S/N	General Skills	Specific Skills
1.	Word Processing	Formatting documents
		Saving documents
		Printing documents
		Creating document
2.	Spreadsheets/Excel	Creating spreadsheets
		Producing graphs
		Using formulae
3.	<b>Power Point Presentation</b>	Creating presentation
		Formatting slides
		Saving presentation
4.	Databases	Creating/formatting databases
		Creating formatting queries
		Creating formatting forms and reports
5.	Files/Folders	Creating folders
		Copying files
6.	Email/Internet	Sending email
		Attaching files to emails
		Using search engines
		Printing web pages
		Online information gathering
7.	Hardware/Software	Providing instruction on novel hardware e.g.
		scanner, colour printer
8.	Web design and management	Creating and designing web site
		Managing and maintaining website

		Creating and managing blog
9.	Social Media/Mobile Technologies	Use of social networking Facebook, twitter,
		WhatsApp etc. to reach out to users,
		24/7 call a librarian
		Telephone reference service

### Academic/Research Libraries and the Target ICT Knowledge and Skills in Recruitment of New Librarians

To achieve this objective, the respondents were asked to indicate whether or not academic and research libraries have some skills that they specifically target before recruiting new librarian. An overwhelming majority 21 out the 24 respondents indicated they have such ICT skill target. The ones generally mentioned are the basic skills such as word process, Microsoft excel and simple trouble shooting. It was explained that each librarian is require to be skillful in using word process as a general-purpose computer application that is useful to all librarians irrespective of the department in the library. Moreover, two respondents emphasized for instance that "any librarian must be able to engage in simple trouble- shooting since all activities in the library now involve the use of computers". In relation to this, one of the respondents put succinctly "Many libraries and directors of libraries valued their librarian as someone who went beyond books and had expertise in ICT for teaching and learning (super person, expert teacher, challenger, connector, digital Information leader, manager). This included the librarian providing professional development and coaching for staff, for instance in implementing a new learning management system, use of digital technologies available in the library, embedding ICT in learning and managing a system-wide ICT certificate credential for staff. In some cases, librarians should have played the dual role of teaching learning and ICT coordinator". In other words, another respondent pointed out that: "The librarian must be valued as someone who is up-to-date with ICT developments. He/She must be somebody who knows what is coming so that he/she can inform the rest of the team around changes in digital pedagogies, digital information and to keep ahead of the users, with things like the iPad, all that digital technology that users are just so familiar with. His/her job is to basically keep up-to-date and almost ahead of where the users are at with the technology, i.e. being a digital information leader".

### The Cruciality of Conducting Interview for the New Librarian before given them Job in Academic and Research Libraries

To achieve the objective, respondents were asked to give the reason(s) why it is crucial to interview librarian before given them job in the academic and research libraries in the digital era. The results reveal that the common reasons are to be able to determine their fit, in terms of whether or not they will be able to cope with the integration of technologies into library practices and be able to use technologies to render services to the satisfaction of the digital age library users. Other reasons are: to understand their capability and make them justify their certificate, to discover their ICT skills, compare the certificate with the knowledge they possess, predict performance, employ good hands, determine level of understanding of library as a professional career, and to ascertain the skills and level of knowledge in librarianship. When explaining the crucially of interview in

recruitment of new librarians, one respondent has this to say "the recruited librarians must fit with the culture and working group and identify with the values of the organization because librarians do not solely work with colleagues in the library but rather represent the library, departments and committees across the university. Therefore, intangibles such as communication style, attitudes, and values must align with those valued by the library. And this must be discovered during the interview exercise". Explaining this further, the respondent maintains that "it is important for this to discover some of these intangibles, because it the interviews that allow library staff to witness candidates interacting with a variety of personality types"

Another respondent adds to it by saying that "interview is crucial because the search committee is responsible for personnel selection and must determine whether a candidate is a good fit for both the library and the wider campus community "The determination of the good fit can be later after the candidate has been employed. If the candidate is not performing, it be difficult to throw out such a person, because that may contravene the conditions that have been signed by both parties (i.e. the library and the candidate) bridging that could lead to litigation.

### Problems Created by Poorly Conducted Recruitment of Librarian without ICT Knowledge into the Academic and Research Libraries

To achieve the objective, the respondents were asked to indicate the problems created by poorly conducted recruitment exercise into the academic and research libraries. The common problems identified by most of the respondents include: poor library services and low productivity in the library, lack of understanding of the refined routine activities in the library, low patronage by the library patrons, incompetence, waste of resources and redundancy, poor service to users and poor conduct between staff and superior officers. The most damaging problems as identified by one of the respondents is that 'the mediocre now finds their way into the library, destroy the system and render it useless because they are underperforming.

#### **Discussion of Findings**

The basic ICT required for recruitment of librarian into the academic and research libraries at the digital era are the specific ICT skills useful and relevant to each unit of the library and the general skills such as word processing, spreadsheets/excel, power point presentations, databases, files folders, email/internet, hardware/software, web design and management, mobile technology and social media skills. The finding is supported by Chidi & Nwachukwu¹ report which demonstrated that the library staff in their study acquired all the basic skills required to work in a digital library through self-efforts and sponsorship by the library. In addition, the result is corroborated by the report of a study by Raju9 and Shingwe & Ocholla¹0 both of whose reports indicated that the requirements for recruiting librarians in this age range from basic computer literacy to advance (networking, database administration, web development) IT skills. This confirms that ICTs skills are highly necessary the librarians in the discharge of their duties to the library clientele in this age.

The current study also demonstrates that word process skills is the most ICT skill academic and research libraries usually target because the skill is relevant in every units and departments in the library. This result is in consonant with finding reported by Emiri<sup>3</sup> that electronic mailing, social networking, use of PDAs, mobile phones and internet surfing are the major DLS amongst librarians. In this case, the major digital library skills identified by Emiri<sup>3</sup> could also include skills such as word process skill and when talking about the major ICT skills somehow, word process will always be included.

Major reasons crucial to the conduct of interview in the process of recruitment into academic and research libraries are to determine the fit of the candidates in terms of whether or not they will be able to cope with the integration of technologies into library practices and be able to use technologies to render services to the satisfaction of the digital age library users. This is not a coincidence considering the fact that it has earlier be mentioned in Gasper and Brown<sup>6</sup> study that interview is highly essential in the recruitment of librarian; because through it, the fit candidates are identified.

#### Conclusion

The paper has examined the ICT knowledge and skills required for recruitment of the librarians in academic and research libraries and specifically identify the basic ICT skills require by a librarian seeking employment in academic and research libraries; find out whether or not academic and research libraries usually go beyond the target ICT knowledge and skills in recruitment of new librarians; determine why it is crucial to interview new librarian before given them job in academic and research libraries; and identify the problems created by poorly conducted recruitment exercise into the academic and research libraries. The results have demonstrated that the basic ICT required for recruitment of librarian into the academic and research libraries at the digital era are the specific ICT skills useful and relevant to each unit of the library and the general skills such as word processing, spreadsheets/excel, power point presentations, databases, files folders, email/internet, hardware/software, web design and management, mobile technology and social media skills. Similarly, it was revealed that word process skills is the most ICT skill academic and research libraries usually target because the skill is relevant in every units and departments in the library. Major reasons crucial to the conduct of interview before recruitment into academic and research libraries is to determine the fit in terms of whether or not the recruited librarians will be able to cope with the integration of technologies into library practices and be able to use technologies to render services to the satisfaction of the digital age library users. The prominent problems resulted from the poorly conducted recruitment exercise into the libraries at the digital age are poor library services that result to lack of satisfaction by the users and low productivity, lack of understanding of the refined routine activities in the library, low patronage by the library patrons, waste of resources and redundancy, poor conduct between staff and superior officers and eventually underutilisation of ICTs procured by the libraries to render effective and efficient services to the users.

#### Recommendations

The study recommends based on the findings and conclusion that recruitment into academic and research libraries should not be compromised. Any candidate that does not possess the required ICT skills or not perform to expectation during recruitment should not be considered. Therefore, candidate with the specialized skills that will add value to the services of the library or that will bring new skills that no one has never have in the library should be recruited.

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